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Kavamaliqiyikkut

Ministère de l'Exécutif et des Affaires Intergouvernementales

Department of Executive & Intergovernmental Affairs

March 17, 2011

Mr. Ryan Barry  
Director, Technical Services  
Nunavut Impact Review Board  
P.O. Box 1360  
Cambridge Bay, NU  
X0B 0C0

**via Email to:** [info@nirb.ca](mailto:info@nirb.ca)

**RE: Information Requests for the Baffinland Iron Mines Corporation, Mary River Project,  
Draft Environmental Impact Statement.**

Dear Mr. Barry:

On behalf of the Government of Nunavut (GN), I would like to thank the Nunavut Impact Review Board (NIRB) for the opportunity to submit Information Requests (IRs) to Baffinland regarding the Draft Environmental Impact Statement (DEIS) submission for the Mary River Project Proposal.

The following Information Requests for the Baffinland Iron Mines Corporation Mary River Project (Appendix A) are sought to provide clarity and additional information within identified areas of the DEIS. The information requests provided relate to the mandates of Government of Nunavut departments and agencies.

Again, we thank NIRB for providing the Government of Nunavut with the opportunity to submit Information Requests to Baffinland. The GN looks forward to continued participation in review of the Environmental Impact Statement for Baffinland's Mary River Project. Should you have any questions pertaining to this submission or the GN participation in the Review process, please contact me at (867) 975-6026 or at [mduchaine@gov.nu.ca](mailto:mduchaine@gov.nu.ca).

Thank you,

Marie Duhaîne  
Avatiliriniq Coordinator  
Executive and Intergovernmental Affairs  
Government of Nunavut

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	1
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 1, Section 6.1</p> <p>Residual Effects Assessment – NSA Boundaries</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 6.1 uses the term NSA, but does not define the acronym or provide a map indicating the spatial boundaries for it. The Glossary defines the NSA as the Nunavut Settlement Area, although it is not evident where the NSA is located relative to the Mary River Project. A map showing the full extent of the NSA should be provided.</p>		
<b>Rationale:</b>	<p>Knowledge of the location and extent of the NSA relative to the Project is essential to determine and assess the potential effects of the Project on it.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	2
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 1, Section 6.4.1</p> <p>Identification of Valued Components</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 6.4.1 states that "<i>the VSECs and VECs for the Project are presented in Tables 1-13.1 and 1-13.2</i>". However, there are no such tables in Volume 1. Volume 1 should be revised to include these two tables.</p>		
<b>Rationale:</b>	<p>A comprehensive list of VSECs and VECs is necessary to understand the relationships between VSECs/VECs from the various disciplines, as well as to determine the potential for impacts shared between them.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	3
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 3, Section 2.1.6 Appendix 10D-6 - Borrow Pit and Quarry Management Plan</p> <p>Aggregate Sources</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Sections 2.1.6 indicates that a number of aggregate pits and quarries will be required for construction, and refers the reader to Appendix 10D-6 with regards to their management and closure. However, Appendix 10D-6 does not indicate whether re-vegetation is to be included as part of the reclamation of these facilities, or when reclamation will be undertaken relative to the timing of the overall Project. Please provide the details of aggregate pits and quarries revegetation and closure plans, and their scheduling.</p>		
<b>Rationale:</b>	<p>Assuming that the need for aggregates will be limited primarily to the Construction Phase, rehabilitation of the exhausted and/or abandoned pits and quarries during Operations may be possible. This would reduce the length of time that these areas remain un-vegetated, and provide an opportunity to apply lessons learned from pit/quarry rehabilitation to the eventual closure of the mine.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	4
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 3, Section 2.1.13</p> <p>Ongoing Geotechnical Programs and Environmental Studies</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 2.1.13 indicates that environmental studies will continue during the Construction Phase, and will revolve around the proposed project infrastructure and new drill locations, moving from a focus on documenting baseline conditions to an emphasis on monitoring. It is unclear who will be undertaking these studies and what the scope of the monitoring activities will be. A detailed description of the monitoring program is required, as well as the role that it will play in a comprehensive Adaptive Management Plan. Please provide the requested information.</p>		
<b>Rationale:</b>	<p>The collection of baseline data is typically undertaken as part of the environmental assessment process, and usually undertaken by an external consultant. Construction monitoring may be undertaken internally and, if so, requires the appropriate staffing and/or qualified department to do so. As one of the purposes of environmental monitoring is to inform adaptive management (e.g., what construction management changes need to be made in the event of undesirable effects during construction), it needs to be clear what mechanisms the proponent will have in place to monitor and address negative effects during construction.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	5
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 3, Section 2.4.8 Appendix 10D-8 - Road Management Plan  Site access roads/dust emissions		
<b>Issue/Concern or Information Deficiency and Request:</b>	Section 2.4.8 indicates that roads will be sprayed with dust suppressants to reduce fugitive emissions and refers the reader to Appendix 10D-8. Section 3.2.1 of the Road Management Plan identifies the use of water or other dust suppressants, but does not indicate what these "other dust suppressants" might be. Volume 5.0 (Atmospheric Environment) suggests the use of calcium chloride as a dust suppressant. Clarification is requested as to what other dust suppressants have been considered, and what conclusions were made regarding potential impacts on vegetation.		
<b>Rationale:</b>	Being as dust suppression would be undertaken in the summer, and during the short growing season, it is important to understand what potential impacts, if any, dust suppressants other than water might have on vegetation along roadsides.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	6
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 3, Section 2.7, p. 73		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The airstrip at Steensby Inlet Port and the Mine Site will be equipped with appropriate lighting, compliant with Transport Canada standards. There is little information regarding the nature of these lighting systems and how and for how long these systems would be used. There is also no discussion of the potential impact of the lighting systems on wildlife in the area.</p> <ul style="list-style-type: none"> <li>• Please provide an assessment of the potential impacts from lighting on wildlife, with references to relevant scientific literature and/or case studies.</li> <li>• Please clarify if the Milne Inlet airstrip will also have similar lighting systems; and if so, please assess the potential impacts on wildlife.</li> </ul>		
<b>Rationale:</b>	The proponent's assessment regarding how wildlife will react to bright lighting associated with airstrips in previously undisturbed regions such as the north Baffin is required for a comprehensive assessment.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	7
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Vol. 3, Section 3.5.3, p. 101		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It is calculated that approximately 9-10 kilometres of railway will be occupied by trains at all times, and that any three kilometre stretch will be occupied by trains every four hours. The DEIS does not include an assessment of how the frequency of train movements will affect caribou and caribou movements in the area. Please provide an assessment of how high frequency train movements may impact caribou and other wildlife, including potential effects of noise, vibration, and visual stimuli. Please provide an assessment of the likely effectiveness of the proposed mitigation measures (i.e., over/underpasses), including a discussion regarding how the frequency of trains may affect caribou and other wildlife usage of over/underpasses to cross the railway tracks.</p>		
<b>Rationale:</b>	<p>The frequency of trains across the railway will cause noise, visual, and other effects that may impact caribou and other wildlife in the region. There is limited understanding of how this component of the Project will impact caribou and other wildlife in the north Baffin. In addition, the use of over/underpasses as mitigation for caribou movement is not well understood in a high-traffic volume environment.</p>		



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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	8
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Vol. 3, Section 3.5.3.4		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The Project Description references snow fences that may be installed along portions of the railway that are susceptible to blowing and drifting snow. Please provide further information regarding:</p> <ul style="list-style-type: none"> <li>• The potential locations for snow fences,</li> <li>• The expected maximum length of fencing,</li> <li>• The potential impact of fencing on wildlife movements throughout the region, including caribou.</li> <li>• A discuss regarding snow fencing may impact wildlife usage of over/underpasses.</li> </ul>		
<b>Rationale:</b>	The location and length of snow fencing could cause an impact to wildlife movement throughout the region. The potential effects of this project component must be further described in the DEIS.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	9
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 3, Section 4.2 Appendix 10G - Preliminary Mine Closure and Reclamation Plan</p> <p>Progressive Rehabilitation</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 4.2 indicates that research studies will be undertaken during operations to examine the re-vegetation of disturbed areas using local vegetation trials and that the findings from the vegetation trials may be incorporated into updates of the Mine Closure and Reclamation Plan. It is not clear whether the proponent will be actively planting disturbed sites, or whether re-vegetation will be through natural dispersion. Please clarify. In addition to the findings of re-vegetation from the site, the Mine Closure Plan should include a thorough literature review of re-vegetation studies and experiences in Arctic environments. Please provide additional details as outlined regarding the closure plans and specific activities, as well as scheduling.</p>		
<b>Rationale:</b>	<p>A more robust knowledge base will aid in the development of an effective reclamation strategy, thereby reducing the length of time that disturbed lands remain un-vegetated. All possible sources of information should be considered in the development of the Mine Closure and Reclamation Plan.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	10
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Pg. 141 "All identified archaeological sites with potentially direct effects are proposed to have been mitigated and/or staked and flagged in advance of construction"		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide proposed detailed mitigation plans and timelines associated with the mitigation in reference to construction timelines and provide details relating to the construction activities which will take place in the vicinity of the archaeological sites (bulldoze , graters, explosives).		
<b>Rationale:</b>	The statement as-is does not provide enough detail to ensure that the archaeology will be properly mitigated well enough in advance of Baffinlands' construction plans, nor does it provide enough information to asses if the proposed mitigation is sufficient, considering specific effects of different construction techniques. While table 4-9.2 and associated text might have been aimed at addressing this issue, there is not enough detail in the table or associated text to draw appropriate conclusions.		

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<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	11
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 4, Pg. 142            "Snow ploughing and dust suppression equipment will not leave the road right of way except to deliver snow to storage areas or to create snow berms to prevent snowdrifts on the road. Snow will not be blown over a distance greater than 30 m and dust suppression spraying will not extend beyond the road right of way. The Roads Management Plan (Appendix 10D-8) will include procedures for snow storage areas or snow berms to avoid any identified archaeological sites."</p> <p>Appendix 10D-8 - Road Management Plan</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	The road management plan does not indicate where the snow storage areas or snow berms will be located. Please provide this information so that CLEY can be confident that the archaeological sites within the affected areas have been properly mitigated.		
<b>Rationale:</b>	The above stated activities pose a threat to archaeological sites; CLEY needs to determine if proper mitigation is being planned.		

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<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	12
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4 Section 9.0 - Cultural Resources		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Figure 4-9.1 shows the areas surveyed and identified archaeological sites from all these activities, at a 1:1,000,000 scale. This figure and its legend do not indicate areas surveyed.</p> <p>Please provide a map indicating all areas that were surveyed.</p>		
<b>Rationale:</b>	<p>CLEY requires details relating to the areas surveyed to establish if the work has been adequately conducted – preferably a spread sheet of the track log off the hand held GPS unit; however, Figure 4-9.1 with the addition of the areas surveyed as a Geo PDF would suffice.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	13
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 4D - Cultural Resources Baseline Summary Report Pg. 11		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Page 11 of Appendix 4D states that photos were reviewed by a qualified archaeologist for the presence of archaeological or land use features.</p> <p>Please identify how many of these sites were verified on the ground by an archaeologist and whether site forms were submitted for those sites.</p>		
<b>Rationale:</b>	Official designation of archaeological sites is important to ensure the ability of the GN to protect them and to adequately evaluate the mitigation proposal.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	14
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 4D - Cultural Resources Baseline Summary Report, Pg. 12  Archaeological Investigation And Mitigation Methods		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide more details on the investigation and mitigation methods used within the project areas. A site by site description is desirable but not necessary.		
<b>Rationale:</b>	These "methods" are almost directly out of a published Government of Nunavut document and do not provide any insight as to specific methods applied by the proponent		

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<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	15
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 4D - Cultural Resources Baseline Summary Report Pgs. 25- 26		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>"A system of uninterrupted navigational markers was found stretching from Sites OcFs-3 and OcFs-4 on the east shore of 10 km Lake towards the west shore and Ikpikitturjuaq Bay."</p> <p>It is unclear if a site form has been submitted for this site. Please clarify</p>		
<b>Rationale:</b>	Official designation of archaeological sites is important to ensure the ability of the GN to protect them. Owing to the restrictions relating to the scale at which archaeological sites can be mapped in documents available to the public CLEY uses site form data to map site location in reference to mining footprint.		



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<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	16
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 4D - Cultural Resources Baseline Summary Report Pg. 32		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It is stated that certain areas will be "posted as off limits".</p> <p>Please provide details as to what this means and how this would be enforced.</p>		
<b>Rationale:</b>	The limited detail does not allow CLEY to assess if this is adequate mitigation.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	17
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 5, Section 1.1.1 – 1.1.8  Atmospheric Environment – Climate		
<b>Issue/Concern or Information Deficiency and Request:</b>	<ul style="list-style-type: none"> <li>• Please identify the degree of accuracy for measurements taken, and also identify how wind-blown snowfall data for Environment Canada is collected. The report mentions how difficult it is to measure and that models are often used to calculate wind-blown snowfall.</li> <li>• Please provide Baffinland's definition of "Ecozone", and how this term is used in the DEIS. Further, to assist with understanding the importance of Ecozones, please differentiate between the Northern Arctic and the Arctic Cordillera Ecozones.</li> <li>• Please provide a table or graph that outlines all collected data (temperature, precipitation, evaporation, wind speed, snow depth and solar radiation) for the various monitoring station sites.</li> <li>• Please clarify whether averages for conditions measured are for the life of each station where data was collected.</li> </ul>		
<b>Rationale:</b>	Information requested would provide a greater confidence in the baseline climate data, and help reviewers thoroughly understand the assessment and conclusions		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	18
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 5, Section 1.2</p> <p>Atmospheric Environment – Climate</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It is unclear if the approach to this section is to discuss the effects of climate on the project or if it is to discuss the effects of the project on the climate. Please clarify.</p> <p>There needs to be an explanation in the methodology on how results from modelling are going to be compared to the Project and how climate variables (e.g. temperature, precipitation etc.) could affect the Project.</p>		
<b>Rationale:</b>	<p>GCM's were used to show predictions of climate change to the area in and around the Project and results reported but there was no reference to how these changes, whether it be an increase or decrease, will affect the Project with the exception of changes to sea ice and changes to sea levels.</p>		

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<b>Reviewer's Department:</b>	Executive & Intergovernmental Affairs (EIA)	<b>Information Request #:</b>	19
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 5, Section 1.3</p> <p>Atmospheric Environment – Climate</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Given that Nunavut's greenhouse gas (GHG) emissions total is expected to increase by 64% – 123% due to the Project, a greenhouse gas emissions management plan is warranted.</p> <ul style="list-style-type: none"> <li>• Describe the project design measures that will be aimed at the reduction of greenhouse gas emissions</li> <li>• Describe additional mitigation and follow-up measures that would be undertaken as part of an overall GHG emissions management plan.</li> </ul>		
<b>Rationale:</b>	<p>Despite emissions from the project being considered very small on a national level, the emissions from the project are predicted to more than double overall territorial emissions. A project-specific management plan needs to be developed to address this increase in emissions.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	20
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 5, Section 3.1		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide the rationale for limiting baseline studies to the three main project areas (Mary River Mine Site, Milne Inlet, Steensby Inlet) and for the exclusion of communities within the RSA. Specifically, increased air flights departing and arriving at employee-source communities will lead to increased noise levels. Please provide an assessment of the potential affects from increased noise due to air traffic in these communities.		
<b>Rationale:</b>	Noise effects will not only be felt within the project development area, but will also be felt in communities experiencing increased air transport. Despite existing anthropogenic sources of noise within communities, the potential for any increases as a result of the project and its activities should be identified and quantified with an analysis of the resulting effects.		

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<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 5, Section 3.2		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please provide the rationale for the use of the Alberta Energy Resources Conservation Board (ERCB) Directive 038 guidelines. Justify their applicability to a treeless environment.</p> <p>In addition, identify which past and current development projects in Nunavut were used as examples for the analysis, and how the projects were used in the effects analysis.</p>		
<b>Rationale:</b>	<p>The most significant difference between most of Nunavut and other habitats in Canada is the absence of trees and forest community complexes. In the absence of forest assemblages the transmission of sound across landscapes can increase significantly. The extreme cold found in the North Baffin may also contribute to excessive noise transmission due to the decreased air density. The research conducted by the Alberta Energy Resources Conservation Board may be more appropriate for an area with a differing ecosystem than is found in the North Baffin.</p> <p>Current and past projects provide matter-of-fact information and data on the types and quantities of noise emissions experienced at the project and surrounding areas. This information provides the opportunity for analysis for realistic and pragmatic noise modeling of the potential impacts on Nunavummiut and wildlife.</p>		

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<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide an assessment of the potential for the bioaccumulation and biomagnifications of metals in the terrestrial and aquatic environments. DoE is concerned that a comprehensive review of foodwebs and the effects of contaminants on those foodwebs has not sufficiently been carried out.		
<b>Rationale:</b>	Contaminants will affect water quality and the rate of bioaccumulation and biomagnifications of metals in the terrestrial and aquatic environments, which may have potential impacts on wildlife and wildlife habitat.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	23
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please identify the long term effects of the disruption of vegetation coverage in the PDA on permafrost and subsequently on project infrastructure.		
<b>Rationale:</b>	<p>The loss of vegetation can cause ground subsidence by altering the albedo, absorption, and local hydrology in permafrost regions (Linell, 1973; Nelson and Outcalt, 1982). Ground subsidence can potentially damage project infrastructure. An analysis of the effects caused by vegetation loss would allow for a more thorough review and would provide greater confidence in conclusions drawn.</p> <p>References:</p> <p>Linell, K.A. 1973. Long-term effects of vegetation cover on permafrost stability in an area of discontinuous permafrost. In: Permafrost: North American contribution [to the] Second International Conference. [Prepared for] Organizing Committee of Canada and United States Planning Committee. National Academy of Science.</p> <p>Nelson, F. E. and Outcalt, S. I. 1983, A frost index number for spatial prediction of ground-frost zones, In: Permafrost-Fourth International Conference Proceedings, vol. I, National Academy Press, Washington, DC, pp. 907-911.</p>		



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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	24
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.0 Appendix 6D - Ecological Land Classification</p> <p>ELC Mapping</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.0 indicates that the proponent developed an ELC system for assessing vegetation in the RSA, and illustrates vegetation communities in the RSA on Figure 6-3.1. Appendix 6D describes the methodology used to develop the ELC system. Although the information in Appendix 6D is very detailed, it fails to provide a definitive list of the ELC Units developed through the process or a corresponding map. As such, it is unclear how the information from Appendix 6D (or from Appendix 6C – Baseline Vegetation Report, Section 4.1 or its Appendix E1 – Vegetation Classification System) was used to develop the map and vegetation classifications presented in Figure 6-3.1. Appendix 6D should be revised to include a summary of the results of the ELC modelling process, including a definitive list of the “final” ELC units to be used in the assessment and the corresponding map. A description of how the ELC model was verified with IQ is requested.</p>		
<b>Rationale:</b>	<p>It is important that the information provided in Appendix 6D be clearly linked to Section 3.0 in a transparent manner. Accurate ELC and vegetation mapping are critical components to the vegetation assessment, as they “standardize” vegetation communities across the RSA. Verification using IQ may also add value and make the model more relevant to local conditions.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	25
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 3.2, Pg. 53		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please identify the specific tasks that will be carried out to ensure the "physical and chemical stability" of the revegetation plan.		
<b>Rationale:</b>	The Department of Environment requires an analysis of the disturbance to tundra ecosystems to ensure the suitability and effectiveness of the revegetation plan.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	26
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.2.1.2</p> <p>Vegetation Health – Dust (TSP) thresholds</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.1.2 states that there are no known dust deposition thresholds specific to effects on vegetation and, as a result, references thresholds on the magnitude of effects on vegetation health developed for the High Lake Project in western Nunavut. The High Lake Project thresholds were Low (1.0–4.6 g/m<sup>2</sup>/a), Moderate (4.6–50 g/m<sup>2</sup>/a) and High (50–200 g/m<sup>2</sup>/a). However, these thresholds were revised to Low (0–5.0 g/m<sup>2</sup>/a), Moderate (5.0–60 g/m<sup>2</sup>/a) and High ≤ 60 g/m<sup>2</sup>/a in order to align TSP deposition thresholds with the categories used for the Mary River Project's air quality monitoring. No justification is provided as to why the TSP deposition thresholds need to be in line with the Air Quality monitoring, and clarification is requested to justify the deviation from the High Lake Project TSP deposition thresholds.</p>		
<b>Rationale:</b>	<p>Deviation from established TSP deposition thresholds may result in underestimating the potential impact of dust deposition on vegetation. Scientifically-supported thresholds must be applied in order to conduct an accurate assessment of potential effects.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	27
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Sections 3.2.1.3 &amp; 3.2.2.3</p> <p>Culturally Valued Vegetation</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.1.3 identifies blueberry, crowberry, and mountain sorrel as valued plant species in the RSA, but states that the distribution of crowberry and mountain sorrel (and likely the 15 other valued species mentioned in Section 3.2 – Culturally Valued Vegetation, and described in Section 4.5 of the Vegetation Baseline Report) could not be modeled. Clarification is requested as to why these species could not be modeled and why other means of determining their distribution (e.g., the vegetation sampling plots and IQ) were not implemented.</p> <p>There is also no discussion of the location of priority areas for these plant species by local communities. Figure 6-3.5 only indicates where blueberry habitat may be located, but not the locations of important harvesting areas. As such it is difficult to determine whether the habitat that will be affected (as described in Section 3.2.2.3) is significant. A more thorough description of areas that are of importance for culturally valued vegetation is required.</p>		
<b>Rationale:</b>	<p>Considering only blueberry from a suite of 18 identified species of value may bias the assessment of Culturally Valued Vegetation, and may result in underestimating the potential impact of the Project on plant species that are important to local traditional livelihoods.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	28
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.2.2.1</p> <p>Vegetation Abundance and Diversity – Natural re-vegetation</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.2.1 indicates that disturbed terrestrial habitat will not be reseeded during construction, operation or closure, and that natural re-vegetation of the terrestrial habitat will be allowed to occur. This appears to contradict Section 4.4 of the Vegetation Baseline Report, which recommends the use of local/regional plant stocks and seed sources for any re-vegetation being done on the Project. Section 3.2.2.1 also states that natural re-vegetation (in concert with cleaning soils from equipment brought to the site) will reduce the likelihood of invasive plant species getting established within the RSA due to Project development activities. Clarification is requested on two matters:</p> <ol style="list-style-type: none"> <li>1. Why was natural re-vegetation selected as the preferred method of restoring disturbed sites? What alternatives to natural re-vegetation were considered and how were they evaluated to determine the preferred alternative?</li> <li>2. There is no clear link between this form of "passive" re-vegetation and reducing the likelihood of invasive species becoming established. More information is required to support the proponent's claim that their approach will result in the satisfactory control of invasive plant species. It could be argued that more active forms of restoration (e.g., ecological restoration supported by invasive species management) would provide greater benefit in the control of invasive and exotic species.</li> </ol>		
<b>Rationale:</b>	<p>Section 3.2 indicates that the effects to vegetation will be long-term (page 53). Relying solely upon natural re-vegetation may result large areas of habitat being sterile and/or unusable by people and wildlife beyond the life of the Project. As part of the review of the final EIS, it will important to understand whether all reasonable alternatives have been considered.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	29
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.2.2.1</p> <p>Vegetation Abundance and Diversity – Effects on linkage functions</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.2.1 summarizes the predicted loss of terrestrial habitat and vegetation community types in Tables 6-3.3 and 6-3.4, respectively. Although the data provided in these tables are useful in determining the amount of each community type that will be affected, the section falls short in illustrating the overall effect on vegetation communities and the linkages between them. This could be improved through the inclusion of a map showing the location of vegetation communities that will be affected, which could be similar to other maps provided in Section 3 (i.e., Figures 6-3.2, 6-3.3 and 6-3.4). Please provide such a map.</p>		
<b>Rationale:</b>	<p>Understanding the location of disturbances to vegetation communities and the linkages between them will form a critical part of assessing the cumulative effects on vegetation and associated ecological functions of the Project on a regional basis.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	30
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.2.2.2</p> <p>Vegetation Health – Metals in Dust</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.2.2 states that <i>"additional metals that could be introduced to soils from dust deposition do have the potential to affect plant vegetation over time"</i>. Two of these, arsenic and manganese, are predicted to be an order of magnitude higher than screening levels (high magnitude). It is predicted that the effects from metal toxicity, if any, will occur primarily to the more sensitive vegetation classes. However, there is no indication to what the possible effects may be on vegetation, the potential risk to herbivores and/or humans who may consume them, or the length of time that metals would remain in the food chain.</p> <p>Additional analysis is requested with respect to the possible effects of arsenic and manganese on vegetation, the potential risk profile to herbivores and/or humans who may consume them,</p> <p>No reference is made to Appendix 6G – Evaluation of Exposure Potential from Ore Dusting Events in Selected VECs: Caribou and Blueberry. Clarification is required that the proposed mitigations and monitoring presented in Section 3.2.2.2 are sufficient to address potential effect on vegetation and the wildlife and people it supports.</p> <p>[Note: Section 3.2.2.2 references Appendix 6F with regards to the vegetation baseline study. This is a typographical error; the vegetation baseline study is contained in Appendix 6C]</p>		
<b>Rationale:</b>	<p>Bioaccumulation and biomagnifications of metals and other contaminants may pose a risk to the health of people and wildlife who consume contaminated vegetation. A clearer understanding of the risks posed through metals introduced to the food chain through dust deposition is required.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	31
<b>Information Request From:</b>	Department of Environment		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6, Section 3.2.2.2</p> <p>Vegetation Health – Cumulative effects of airborne emissions</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 3.2.2.2 states that <i>“the most noticeable effects on vegetation may occur in areas where the thresholds are exceeded for all three air quality parameters (i.e., annual TSP deposition, annual NO<sub>2</sub> emission concentrations, and annual deposition of nitrogen). This occurs in a 128 ha area at the Mine Site, all encompassed within the PDA”</i>. There is no description of what these noticeable effects of the airborne emissions may be. It may also be unrealistic to assume that these effects would be contained within the PDA, as the effects of each of the individual parameters also occur beyond the PDA (as illustrated in Figures 6-3.2, 6-3.3 and 6-3.4). It is also not clear how these effects may be magnified through climate change (e.g., melting of permafrost, higher air temperatures, more intense storm events, etc.). Clarification is required on the nature and risk of potential cumulative effects of airborne emissions on vegetation and wildlife that may consume it, including effects from climate change, particularly in areas outside of the PDA.</p>		
<b>Rationale:</b>	<p>The potential for combined effects of TSP, NO<sub>2</sub> and nitrogen (and how their deposition may be affected through climate change) may pose a risk to the health of people and wildlife who consume contaminated vegetation.</p>		



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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	32
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Pg. 54 Appendix 6C		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide clarification as to how baseline amounts of metals in soil and plant tissue were identified and accepted given a minimal number of samples.		
<b>Rationale:</b>	In some species only one or two samples were taken to determine the baseline metal loading. Furthermore, there is no discussion about the rate of accumulation due to the growth rate of the species. Species that were sampled heavily tended to have slow growth rates and extensive longevity.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	33
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 6 Appendix 6D - Ecological Land Classification</p> <p>ELC Modeling and verification</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Appendix 6D provides a very technical description of the process used to develop the ELC model. However, it is not clear as to whether the model was verified in the field for accuracy after it was developed, or whether any corrections had to be made as a result. Clarification is requested with regards to any field verification activities that were undertaken, including percentage of area and communities checked, as well as any revisions that may have been made to the model/ELC mapping as a result. A description of how the ELC model was verified with IQ is requested.</p>		
<b>Rationale:</b>	<p>Relying on ELC mapping that was developed solely through a modeling exercise is inadvisable as predictive models can often vary substantial from on-the-ground conditions. Changes in vegetation communities in the arctic can be very subtle and modeling result require extensive field-checks and revisions before the models can be considered reliable. Verification using IQ may also add value and make the model more relevant to local conditions.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	34
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6 Appendix 6F - Terrestrial Wildlife Baseline Report Appendix D-11 - Terrestrial Management and Monitoring Plan		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide an in depth discussion about how activities may increase the abundance of species due to habitat exploitation and what specific mitigation measures (if any) are being proposed along with an assessment of their effectiveness based on scientific literature and/or case studies.		
<b>Rationale:</b>	In order to reduce the likelihood of human interactions which may result in emergency kills or the transmission of disease to humans (e.g. rabies), the proponent must be aware that species like foxes, falcons, wolves, and polar bears may adapt and/or exploit the conditions produced by their activities. Several examples of habitat and behavioural changes include: foxes denning in waste rock piles, falcons nesting in new quarries (e.g., Meadowbank), and wolves chewing the wiring of data loggers and telecommunications.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	35
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6 Section 2.1 & 2.3		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please provide further information for the permafrost condition across the regional study area, including, at a minimum:</p> <ul style="list-style-type: none"> <li>a) how each study site was chosen;</li> <li>b) locations of thermistor cables;</li> <li>c) data obtained at each site; and</li> <li>d) information regarding the active layer of permafrost.</li> </ul>		
<b>Rationale:</b>	<p>The DEIS states that the active layer is 1- 2 meters deep. However, it does not provide any references to the methods used to come to this determination. The information requested would also provide greater confidence in the baseline data and conclusions drawn from that data.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	36
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6 Section 2.1 & 2.3		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide a larger-scale surficial geology map of the mine site, Milne Inlet and Steensby Inlet including waste management areas, oil and fuel tank farms, stockpiles and water sources.		
<b>Rationale:</b>	These figures will allow for a more detailed review (e.g., assessment of the susceptibility of soils to potential spills).		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	37
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6 Section 2.1.4.2		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please specify the details of the additional testing plan for potential acid rock drainage and metal leaching and provide details as to how the results will be used.		
<b>Rationale:</b>	Although additional testing has been identified, there is no indication of how the project design will be affected. In addition, there is no indication of any potential adverse effects that may result based on the additional testing.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	38
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 3.2, Pg. 58 Section 3.2.1.3		
<b>Issue/Concern or Information Deficiency and Request:</b>	Sections 3.2 and 3.2.1.3 provide a discussion and analysis of culturally valued plants. Please provide an analysis at a similar level of detail for vegetation that is an important food source for wildlife.		
<b>Rationale:</b>	DoE is interested in the potential impact of vegetation cover loss, as well as contamination as it relates to wildlife and also consumption by humans.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	39
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 3.4.3, Pg. 80		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide an analysis (at a similar level of detail as for vegetation) of the potential impact to human health via consumption of culturally valued species that may be exposed to high levels of contaminants; such as nitrogen or heavy metals.		
<b>Rationale:</b>	Impacts to human health are a concern and part of our interest in the impact on vegetation directly, as well as the impact on wildlife.		



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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	40
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.0		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS has only assessed potential Project effects on caribou. Section 5.0 discusses that other species, including wolves, foxes, hares, ermine, and other small mammals, occur in the area and are of importance to local peoples. Yet the potential Project effects on these species are not presented in the DEIS. Please include an impact assessment on these species at an appropriate level of detail, or, a full explanation and rationale as to why these species were not considered in the effects assessment.		
<b>Rationale:</b>	Wolves, foxes, and other small mammal species have the potential to be affected by Project activities. The current DEIS does not include an assessment of the potential impacts, and does not include an adequate explanation as to why this assessment was excluded.		

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<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.0, Pg. 124 & Section 5.2, Pg. 130		
<b>Issue/Concern or Information Deficiency and Request:</b>	It is noted that there are no estimates or value ranges provided on the density or population numbers of resident caribou that may range into the RSA. Aerial inventories were conducted between 2006 and 2008 (see appendix 6F) and possibly later by the GN. Seasonal estimates of herd size in the RSA are also lacking. Please include all available information in the DEIS and ensure that it is analyzed with respect to likely effects.		
<b>Rationale:</b>	It is difficult to properly evaluate the predicted effects and the potential for disruption on caribou unless the DEIS provides some estimates of how many animals are potentially living in the RSA and moving thru during the spring and fall.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	42
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2, Pg. 129		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS is lacking information about the temporal distribution of harvested caribou and techniques used by hunters to locate caribou (ORV based searches, information from other people travelling on land, etc.). Please provide more data in this regard.		
<b>Rationale:</b>	Assessing the current level of habituation to off-road vehicles may help to better estimate and/or understand responses to future human activity along the Mile Inlet Tote road.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	43
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2, Pg. 130		
<b>Issue/Concern or Information Deficiency and Request:</b>	It is noted in the DEIS that the average daily moving distance of 4 km per day during all seasons was based on collar location data from December to August. This period does not include the rutting period in which daily movements by caribou are among the highest. This period of collar location data is also inconsistent with Appendix 6f, section 4.2, page 69. Please provide further information on the rutting period, as well as clarification of the inconsistency.		
<b>Rationale:</b>	This information is necessary to conduct a robust impact assessment. Some sections of the proposed rail alignment may be a barrier or a filter to daily movements by caribou.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	44
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.1, Pg. 131		
<b>Issue/Concern or Information Deficiency and Request:</b>	<ul style="list-style-type: none"> <li>The resource selection probability function analysis was based upon location data collected between April and December 2009 on 32 GPS radio-collared females. However, no information was provided regarding the movement of marked females during calving season. Movement data during calving should be provided over a short period of time (7-10 days), where daily movements were the lowest recorded. This data will help to identify if characteristics of calving habitats differ from those during the growing season. Please provide the data and the analysis.</li> <li>No information was provided regarding site fidelity for calving. Please provide this information if available, or describe the proposed monitoring plan to gather such data.</li> </ul>		
<b>Rationale:</b>	Because female and calves are more sensitive to disturbances than males (Volume 6, section 5.2, page 129), a greater potential effect of the project on the selection process of habitats by females and calves may affect indirectly the demographics of this resident population. This information is necessary to adequately determine potential Project impacts, as well as the effectiveness of mitigation.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	45
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.1, Pg. 133		
<b>Issue/Concern or Information Deficiency and Request:</b>	As trains on the railway are not likely to stop if caribou are on the tracks, mortality risks for caribou will be presumably higher than on the tote road where vehicles may have the ability to avoid contact with caribou. Therefore, consequences on the caribou population demographics might be as significant as if not greater than those caused indirectly on habitats through dust deposition generated from trucking on the tote road. It is not clear whether this has been considered into establishing the zone of influence (ZOI) and the probability of observing caribou within given distances from the railway? Please clarify.		
<b>Rationale:</b>	Potential effects on habitat effectiveness may be different if values of probability changes in the resource selection probability function (RSPF) analysis.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	46
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.1, Pg. 133		
<b>Issue/Concern or Information Deficiency and Request:</b>	What is the information basis or rationale behind using four classes of distances for the railway compared to five for the Milne Inlet Tote Road and the Mine site? Note that the class "> 14.0 km" is missing in Table 6-5.1 (page 134) for the Steensby Port, Milne Port and Railway. Clarity is required for these issues.		
<b>Rationale:</b>	Potential effects on habitat effectiveness may be different if values of probability changes in the resource selection probability function analysis		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	47
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.1, Pg. 136		
<b>Issue/Concern or Information Deficiency and Request:</b>	It is assumed in the DEIS that caribou will easily pass under bridges and over tunnels associated with the railway. Please provide supporting evidence that caribou will use these crossing corridors. The value of bridges as caribou passages needs to be reassessed because caribou might not be as willing as other species such as deer or moose to move in between piles or head walls of bridges. How will the effectiveness of these mitigation measures be monitored? Against what specific baseline data for crossing 'structures' in a non-fragmented environment will the monitoring data be compared? Please provide clarification.		
<b>Rationale:</b>	North Baffin Island is a non-fragmented habitat, and roads/linear features are not familiar to caribou. Past experience has shown that caribou may react in different ways to linear features – they may be attracted to the roads, or they may be repelled. Potential barrier effects of the railway and the tote road on movements may be different if caribou are not using bridges. This information is necessary to adequately determine potential Project impacts, as well as the effectiveness of mitigation.		



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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	48
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.2, Pg.147		
<b>Issue/Concern or Information Deficiency and Request:</b>	Seasonal traffic limitation on the tote road might be put in place if caribou mortality were to increase as a direct result of the project. More information is needed on the criteria and their thresholds that would be applied, the monitoring that would be in place and the decision-making process that will or will not lead to the application of this mitigation measure.		
<b>Rationale:</b>	Recovery of the resident population may be impeded by vehicle collisions and mortalities given the low numbers in the RSA. This information is necessary to adequately determine potential Project impacts, as well as the effectiveness of mitigation.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	49
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6, Section 5.2.2, Pg. 147 & Section 5.2.3, Pg. 150		
<b>Issue/Concern or Information Deficiency and Request:</b>	Seasonal shut downs of the trains will be possible if large numbers of caribou are encountered along the rail route. Please provide more information regarding the decision-making process that will lead to a shut down. Please list the criteria, how the criteria data will be collected/measures and managed, and the decision tree process (including responsible persons) to make these decisions.		
<b>Rationale:</b>	Recovery of the resident or migratory population may be impeded by train collisions and mortalities given the low numbers in the RSA. This information is necessary to adequately determine potential Project impacts, as well as the effectiveness of mitigation.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	50
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 6C - Baseline Vegetation Report Appendix 6G - Evaluation of Exposure Potential from Ore Dusting		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please provide justification as to how a single consultation with one community was able to produce an effective baseline for Inuit Qaujimajatuqangit regarding plants.</p> <p>In addition, from this single consultation blueberries were identified as the only culturally important plant species included as a proxy/indicator. The DEIS should explain why other species were not included and why further consultations were not conducted to expand upon the number of important species.</p>		
<b>Rationale:</b>	Focusing on a single species negates the ability to protect the eco-systemic integrity of Baffin Island for the purpose of traditional land uses.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	51
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 6D - Ecological Land Classification		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please provide further details of the Ecological Land Classification (ELC) analysis. In particular, identify how data deficiencies were addressed and how they affected the analysis.</p> <p>Taking into account the identified data deficiencies, justify the usefulness of the ELC as a baseline for habitat studies.</p>		
<b>Rationale:</b>	<p>It was noted that the confidence interval has been decreased in the statistical analysis and there is no mention of problems with the contour layer used to produce the Digital Elevation Model (DEM). Furthermore, there are problems with the remote sensing due to incomplete images. The requested information will provide a greater confidence in the baseline data and methods used to analyze that data.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment	<b>Information Request #:</b>	52
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 6 Appendix 10D-11 – Terrestrial Environment Management & Monitoring Plan		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide monitoring and management protocols for the avoidance of the introduction of alien species (i.e. insects, mammals, etc.), their detection during construction and operations and contingency measures, should they be detected. These management protocols should not be limited to plants.		
<b>Rationale:</b>	The introduction of alien species is not limited to plants. While the Department of Environment agrees that revegetation using southern or commercial species may not be appropriate; there are additional species that can be introduced through multiple pathways (e.g., shipping containers, personal items like bags, shoes, camera cases, etc). A proactive measure would be for the proponent to develop a protocol for monitoring for alien species and limiting their impact when they are discovered.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	53
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 7, Sections 2.3.1.1 & 2.3.5		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please identify whether consideration has been given to the seasonal reservoir filling patterns, evaporation, etc., and how it has affected the project design.</p> <p>In addition, please identify whether a total quantitative water balance has been conducted for individual watersheds in the Local Study Area (LSA) and Regional Study Area (RSA).</p>		
<b>Rationale:</b>	The information requested will allow for a more detailed analysis of the DEIS and provide greater confidence in effects identified within the DEIS.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Nunavut Research Institute (NRI)	<b>Information Request #:</b>	54
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 7, Section 4.3.1, Pg. 241		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS provides baseline data on invertebrates in the project area but no impact predictions or statements are provided for invertebrates. The DEIS's assessment of aquatic impacts focuses exclusively on potential interactions between the project and Arctic char and more importantly, the DEIS identifies Char as the only key indicator for aquatic biota and habitat.</p> <p>Please explain why benthic invertebrates are not included as key indicators for project effects on aquatic biota and habitat, and explain why no impact statement is provided for benthic invertebrates. In addition, please describe the nature and magnitude of potential impacts to benthic invertebrates (e.g. using metrics such as invertebrate species diversity, relative abundance) resulting from the project, and outline measures to mitigate these effects.</p>		
<b>Rationale:</b>	<p>Benthic invertebrate communities are widely recognized as a key component in the biological integrity of aquatic ecosystems. Aquatic invertebrates are also highly sensitive and responsive to a variety of physical and chemical stressors in aquatic systems. Invertebrates also integrate the effects of multiple stressors, they are more abundant and widely distributed in the environment than fish, and can often be sampled more reliably than fish. Invertebrates often the preferred indicator species for monitoring programs designed to detect ecological impairment in aquatic systems resulting from resource development. Invertebrates have been used in northern ecological assessments for more than a decade (e.g. see Bailey et.al 1998), particularly useful in monitoring programs that employ a reference condition approach such as that proposed in the aquatic effects monitoring program outlined in the DEIS.</p> <p>Reference: Bailey, Robert, M. Kennedy, M. Dervish, and R. Taylor. 1998. Biological assessment of freshwater ecosystems using a reference condition approach: comparing predicted and actual benthic invertebrate communities in Yukon streams. <i>Freshwater Biology</i> (39), pp. 765-774.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Nunavut Research Institute (NRI)	<b>Information Request #:</b>	55
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 7, Section 4.5.10, Pg. 297		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Please provide a detailed plan and timeline for development and completion of the Aquatic Effects Monitoring Plan (AEMP).</p> <p>For example:</p> <ul style="list-style-type: none"> <li>• What provision will be made for the GN and other regulatory bodies to review and comment on the draft iterations of the AEMP to ensure that it is designed appropriately to meet its goals, especially the need to monitor for compliance with regulatory requirements and to verify the accuracy of impact predictions and mitigation measures?</li> <li>• What measures will be implemented to engage community residents and to incorporate Inuit Qaujimanituqangit and local observations in designing and conducting the monitoring program?</li> </ul>		
<b>Rationale:</b>	<p>The DEIS states that a comprehensive AEMP will be established for the project; however, the DEIS provides only a brief summary of this critical program. This summary does not include necessary detail to evaluate the adequacy of the AEMP design.</p> <p>The AEMP is the only mechanism outlined in the DEIS to:</p> <ul style="list-style-type: none"> <li>• Monitor the effectiveness of mitigation measures;</li> <li>• Confirm impact assessment predictions;</li> <li>• Monitor for compliance with regulatory requirements;</li> <li>• Provide a means for adaptive management and to identify additional mitigation that may be required over the life of the Project; and</li> <li>• Address requirements for monitoring as identified in the Metal Mining Effluent Regulations (MMER), including EEM.</li> </ul>		



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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	56
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 8, Table 8-5.18 Measurable Parameters and Threshold Values for Polar Bears, Pg. 242		
<b>Issue/Concern or Information Deficiency and Request:</b>	The measurable parameter is natural mortality per annum. Please clarify if this is the natural mortality per annum calculated for breeding females, males, total population, etc? The rationale for the selection of the measureable parameter should also be provided.		
<b>Rationale:</b>	Cubs of the year (COYs) exhibit survival rates that are lower than sub-adults, but yearlings appear to survive at the same rate as adults in many populations. Sub-adult survival is lower than prime adult survival. It may be of greater significance if calculated for breeding females.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	57
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 8, Section 1.3 & Section 5.11.2.2		
<b>Issue/Concern or Information Deficiency and Request:</b>	The area of noise disturbance effects on polar bears is referenced but not clearly defined. Please clarify and provide a rationale for the area selected based on relevant scientific literature and/or case studies.		
<b>Rationale:</b>	Polar bears are known to have a variable response to noise disturbance. It is important to clearly define the area of noise disturbance effects on polar bears in order that an accurate assessment of the potential effects from Project-related noise disturbance on polar bears can be conducted.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	58
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 8. Section 5.11.2.2, Pg. 248</p> <p>Disturbance, Ice Breaking, Aircraft Overflights</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS states "It is possible that polar bears will den in pack ice, although IQ and scientific information indicates that most bears den on land...some polar bears left their dens when helicopters flew or hovered overhead." While identification and avoidance is the best practice, not all dens can be identified. Please describe the management procedure and mitigation plan if denning polar bears are encountered.</p>		
<b>Rationale:</b>	<p>Survival of cubs prematurely forced out of their dens is poor. Loss of a portion of the present productivity of polar bears denning in Foxe Basin could undermine recruitment in the Foxe Basin population.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	59
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 8. Section 5.11.2.3, Pg. 250</p> <p>Residual Effects</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 5.11.3.3 Mortality (p. 250): The DEIS states that no mortality is expected; it is predicted that residual effects on polar bears would be negligible, and that with mitigation measures in place, polar bear mortality is considered unlikely. However, experience with similar projects/ activities have shown that it is likely that polar bear mortalities will occur in instances of "defense of life and property" (DLP). DLP data in the DEIS is from 1970-2000. Please provide more current data on DLP mortality of polar bears and available data from other mine sites in Nunavut and/or NWT.</p>		
<b>Rationale:</b>	<p>With three permanent camps for the duration of the mine (21 yrs), and two temporary camps of duration ranging from 18 months (Milne Inlet tote road) to four years (railway construction), it is hard to imagine that there will be no DLP polar bear mortalities. Highest polar bear densities were reported in September and October, when they were very visible along shorelines in the Project area. DLP mortalities are reported to have occurred throughout the year with most bears killed from August through November when polar bears are on shore.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	60
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 8. Section 5.11.2.3, Pg. 250  Residual Effects		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS states that in the event of polar bear mortality as a result of the Project, it is anticipated that the mortality will be deducted from the harvest quota and that appropriate compensation will be provided to hunters. This ensures that polar bear mortality per year does not exceed allowable quotas for sustaining populations. When a female with accompanying cubs, yearlings, or two-year olds is killed in a "defence of life or property" event, how will total allowable harvest (TAH) be determined for young? This issue requires clarification, along with a sample calculation of how compensation would be calculated.		
<b>Rationale:</b>	Depending upon proximity to a community, a loss of a female accompanied by young may have a greater impact on TAH quotas for Foxe Basin communities such as Hall Beach and Igloolik.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	61
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 8A-2 Section 1.3, Pg. 3.</p> <p>"A comprehensive review of available scientific information specific to marine mammal species occurring in the Project RSA or along either proposed shipping routes for the Project that might lie outside the RSA. This includes published scientific literature, grey literature, and information from ongoing research programs."</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS has not addressed information about the late summer distribution of polar bears from Foxe Basin polar bear research, 2007-2012 (Interim Wildlife Report No. 16, 2008). Please include this information in the assessment and reconsider the characterization of effects and the significance assessment.		
<b>Rationale:</b>	Information from Government of Nunavut, Department of the Environment (DoE) will aid in assessing polar bear distribution in Foxe Basin during the late summer ice-free season, and potential impact of year-round shipping through Foxe Basin into Steensby Inlet and Steensby Port.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	62
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 8A-2 Section 1.3, Pg. 3.</p> <p>"A comprehensive review of available scientific information specific to marine mammal species occurring in the Project RSA or along either proposed shipping routes for the Project that might lie outside the RSA. This includes published scientific literature, grey literature, and information from ongoing research programs."</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS has not addressed population inventory and sea-ice habitat selection information for Foxe Basin polar bears (GN DoE Status Report No. 38, 2007). Please include this information in the assessment and reconsider the characterization of effects and the significance assessment.		
<b>Rationale:</b>	Inclusion of this information will aid in developing a more accurate understanding and assessment of polar bear population in Foxe Basin and importance of sea-ice habitat to freeze-up and winter core areas in Foxe Basin, and potential conflict 'hotspots' with shipping corridor through Foxe Basin.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	63
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 8A-2 Section 1.3, Pg. 3.</p> <p>"A comprehensive review of available scientific information specific to marine mammal species occurring in the Project RSA or along either proposed shipping routes for the Project that might lie outside the RSA. This includes published scientific literature, grey literature, and information from ongoing research programs."</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS has not addressed movements and seasonal habitat selection of polar bears in Foxe Basin during freeze-up (Nov-Dec) and winter (Jan-March)(GN DoE Interim reports 2008, 2009, 2010). Please include this information in the assessment and reconsider the characterization of effects and the significance assessment.</p>		
<b>Rationale:</b>	<p>Inclusion of this information will aid in developing a more accurate understanding and assessment of movements and distribution of polar bears during freeze-up (Nov-Dec) and winter (Jan-March). The DEIS is currently lacking this information, which will help increase the understanding of potential impact of year-round shipping through Foxe Basin during these periods.</p>		



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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	64
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 8A-2, Section 4.1.2, Pg. 84.</p> <p>Marine Mammal Surveys</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Appendix 8A-2, Section 4.1.2, p. 84. States "marine mammal surveys which targeted cetaceans and to a lesser extent polar bears, walrus, and seals, were conducted primarily during the open-water season." The level of effort spent conducting baseline research for polar bears along the shorelines and large islands during the open water season is considered inadequate. Please provide information regarding proposed follow-up study and monitoring for polar bears during open-water season along shorelines.</p>		
<b>Rationale:</b>	<p>Volume 8, p. 139 states that polar bears were most frequently observed in September and October along the shorelines of Steensby Inlet and Foxe Basin including Koch, Rowley, and Bray islands. Further information/follow-up study is necessary to ensure that impact assessment predictions are accurate. The potential for human-polar bear interactions is highest in coastal areas. Historical data shows that DLP mortalities are likely to occur throughout the year, but are generally more common during open water season when polar bears are on shore.</p>		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	65
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 8A-2. Section 4.3.2.10, Pg. 137</p> <p>Foxe Basin and Hudson Strait</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	The DEIS does not include information from GN DoE's Foxe Basin polar bear 2009 and 2010 aerial survey of the late summer distribution of polar bears. Please include this information to identify late summer core areas in Foxe Basin, and assist in understanding the potential conflict 'hotspots' with Project activities.		
<b>Rationale:</b>	Inclusion of this information will assist with the overall understanding of polar bear distribution and the potential impact of shipping activities through northern Foxe Basin.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	66
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 9, Section 3.8.5.3, Pg. 88</p> <p>Impact on Marine Mammals</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS discusses the potential for polar bear mortality due to consumption of oil-contaminated prey, direct ingestion due to cleaning oil from their fur, or suffer from adverse effect thermal insulation. It is not clear if the loss of polar bears from oil contamination will be deducted from the TAH, and if appropriate compensation will be provided to hunters. The manner in which such mortality will be monitored and reported remains unclear. Please clarify.</p>		
<b>Rationale:</b>	<p>Polar bear mortality from any project-related activity should be handled in the same fashion, and compensation provided to hunters.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	67
<b>Information Request From:</b>	Department of Environment		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Volume 10, Section 4.3</p> <p>Vegetation clearing and management – Operational Standards and Procedures</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 4.3 identifies Operational Standards and Procedures contained within the Environmental Protection Plan. Detailed Operational Standards are provided in Appendix 10B. There are no Operational Standards or Procedures related to vegetation clearing or management. As such, it is not possible to fully understand the effectiveness of the Environmental Protection Plan with regards to managing vegetation resources. It is requested that a Vegetation Clearing and Management Operational Standard, inclusive of the appropriate procedures, be developed and included as part of the Environmental Protection Plan. The Vegetation Clearing and Management Operational Standard and procedures should be supportive of the General Mitigations for reducing effects of the Project on vegetation, as described in Section 3.1.1 of the Terrestrial Environment Management and Monitoring Plan SD-EMMP-011 (Appendix 10D-11). It should also provide specific activities in support of the monitoring requirements described in Section 6.1 of the Terrestrial Environment Management and Monitoring Plan, as well as any additional activities developed as a result of the IR process.</p>		
<b>Rationale:</b>	<p>The proponent has a number of activities throughout the DEIS that relate to vegetation managing, including vegetation clearing and control of invasive species. It is therefore necessary to understand how these activities will be undertaken in the context of the Project's management approach and daily operating procedures.</p>		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	68
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	<p>Appendix 10B, Section 2.10</p> <p>Polar bear encounters</p>		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide greater detail regarding the polar bear safety and awareness training that will be provided to employees and confirm that the execution and implementation of this training using local expertise and IQ.		
<b>Rationale:</b>	Workers should be educated about the risks and safety measures related to encounters with polar bears. Bear safety and training awareness will reduce the risk to human life by wildlife, reduce destruction of property by wildlife, and reduce the number of defence kills. The use of local expertise and IQ is anticipated to add value to safety and awareness training programs.		

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<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	69
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 10B, Section 2.12,  Caribou Protection Measure		
<b>Issue/Concern or Information Deficiency and Request:</b>	It is unclear who is going to take the decision and responsibility to cease drilling, road construction or project activities if caribou are showing signs of being disturbed. It is also unclear who will assess the behavioural state for caribou approaching the activity location. Please clarify and provide further information to address these unanswered questions and uncertainties.		
<b>Rationale:</b>	The responsibility and the authority capable of making and taking this decision should be clearly stated given the importance and implications of stopping construction and operation activities even for a short period of time.		

**Appendix A - Government of Nunavut Information Requests for  
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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	70
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 10B, Section 2.8,  Aircraft Flights		
<b>Issue/Concern or Information Deficiency and Request:</b>	There is no mention of aerial surveys or use of GPS-collared females to locate potential or existing calving sites during construction and operation in volume 10 EHS Management, Appendix 10D-11 Terrestrial environment management and monitoring plan, SD-EMMP-011. Anecdotal reporting will mainly provide useful information along the mine site, the tote road and the railway. Please describe how project biologists will locate caribou calving sites so they can be avoided by aircraft pilots. If helicopter surveys are to be used, please describe the flight ceiling restrictions, their seasonality, how they will be established geographically, and how these will be managed and enforced.		
<b>Rationale:</b>	Female and calves are very sensitive to aircraft disturbance and it may affect recruitment. This information is necessary to adequately determine potential Project impacts, as well as the effectiveness of mitigation.		

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Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	71
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	EPP, Appendix 10B, Section 2.19 Road Traffic Management		
<b>Issue/Concern or Information Deficiency and Request:</b>	Should any movements either by a single caribou or a female-calf pair be sighted in the vicinity of the road be reported to the Environmental Superintendent instead of "Any substantial movement"? A definition of "substantial movement", or a specific procedure for people to follow is required. Please clarify and provide further information.		
<b>Rationale:</b>	Given the low numbers of caribou likely to range in the RSA, any sighting of movements should be reported and documented.		



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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	72
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Environmental Protection Plan, Appendix 10B, Section 2.23  Wildlife Log Instruction		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please update the wildlife log procedure to include the kilometre post (KMP) data as a supplement to the GPS location for wildlife observations along the tote road and the railway, as applicable. This is valuable data for the location of the observation in the absence of GPS equipment by the observer.		
<b>Rationale:</b>	Accurate data is necessary for adaptive management.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Culture, Language, Elders and Youth (CLEY)	<b>Information Request #:</b>	73
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 10D-6 - Borrow Pit and Quarry Management Plan		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please explain why there is no mention of archaeology in this management plan. A modified Borrow Pit and Quarry Management Plan is required that considers archaeological issues. The current management plan seems inadequate without the consideration of archaeological issues.		
<b>Rationale:</b>	While archaeology is considered a VSEC it often must be considered as a VEC due to its physical attributes. Archaeological issues require attention for all aspects of the project which involve physical disturbance to the landscape.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Department of Environment (DoE)	<b>Information Request #:</b>	74
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 10, Section 5.3, Pg. 16, Table 5.5		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide a description of how speed limits to mitigate impacts to caribou will be enforced and the measures that will be used by Baffinland Iron Mines Corporation to communicate to vehicle operators about new posted limits at given sections of the tote road due to caribou presence in the vicinity.		
<b>Rationale:</b>	Incentives to slow driving speed in order to reduce animal-vehicle collisions have not been very successful in many roadways of North America.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Department of Environment	<b>Information Request #:</b>	75
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 10 Appendix 10C1 – Emergency & Spill Response Plan, Section 4.1.6		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please provide a spill response plan that will be implemented by the shipping company.		
<b>Rationale:</b>	It is stated that any spill on water during shipping will be the responsibility of the shipping company. This plan has not been included in the DEIS and thus a complete review of impacts as a result of any and all spills, including those during shipping, cannot adequately be carried out.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Executive & Intergovernmental Affairs (EIA)	<b>Information Request #:</b>	76
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 4A Socio-Economic Baseline Report <b>Table 6</b> Movement of People Within and Into the LSA (Five-Year Mobility Status), 2006; <b>Table 7</b> Net Migration In and Out of the Baffin Region, by Origin & Destination		
<b>Issue/Concern or Information Deficiency and Request:</b>	Although some baseline data is presented no qualitative analysis of project impacts are discussed. In addition, information presented should be augmented to include the Kitikmeot Region and the Kivalliq Region in order to more appropriately address potential cumulative effects within Nunavut as acknowledged on pg. 21. Provide an appropriate territory-wide assessment of population demographics as employment opportunities exist for all of Nunavummiut.		
<b>Rationale:</b>	Movement of people within and into the LSA during project construction and operation will have impacts territory wide and will not be limited to Iqaluit, North Baffin and South Baffin Island as identified in <b>Table 6</b> <i>Movement of People Within and Into the LSA (Five-Year Mobility Status), 2006</i> and <b>Table 7</b> <i>Net Migration In and Out of the Baffin Region, by Origin &amp; Destination</i> .		

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Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Executive and Intergovernmental Affairs (EIA)	<b>Information Request #:</b>	77
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 2, Section 2, Table 2-2.1, pg. 17		
<b>Issue/Concern or Information Deficiency and Request:</b>	List the Responsible Agencies for the Territorial Acts and Regulations.		
<b>Rationale:</b>	The list is incomplete and does not include territorial departments or agencies.		

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Baffinland Iron Mines Corporation, Mary River Project**

<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Economic Development and Transportation (ED&T)	<b>Information Request #:</b>	78
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 3, Section 1, Table 3-1.1, pg 3; Volume 3, Section 5, and Table 3-5.1, pg 123		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>There is a discrepancy between the total workforce for the operations phase between Table 3-1.1 and Table 3-5.1. Adding up the numbers in Table 3-5.1 results in a total of 1257, not 1057 as identified in the table. It appears to the reviewer that the total numbers in Table 3-5.1 have been miscalculated, and as a result do not match Table 3-1.1.</p> <ul style="list-style-type: none"> <li>• Provide clarification on the total number of employees during the operations phase, including which employees are full time and part time.</li> <li>• Provide a similar breakdown of employee estimates for the construction phase.</li> <li>• Confirm on which employment numbers the economic analysis (Appendix 4B) was based.</li> <li>• Re-calculate the economic analysis if based on the incorrect employment numbers.</li> <li>• Redo the cumulative effects evaluation, if based on incorrect employment numbers.</li> </ul>		
<b>Rationale:</b>	To provide consistency and to clarify the discrepancy of 200 onsite employees.		

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Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Economic Development & Transportation (ED&T)	<b>Information Request #:</b>	79
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 2.3.2, pg. 15-17 and Pg. 109		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The discussion of the potential for in-migration/out-migration as a result of the Project was not actually evaluated in the DEIS. Rather scenarios were presented as to types of migration that could take place, in order to define at what point the demographic change might be negative.</p> <p>The analysis merely confirmed the issues the communities raised as possibilities. The key issues are the indirect effect of migration; namely, "brain drain", loss of key community members such as hunters and trappers, social cohesion changes, housing availability). The DEIS requires a thorough analysis of in-migration/out-migration. This requires:</p> <ul style="list-style-type: none"> <li>• an analysis on the possibility of brain and skills drain and changes in social cohesion</li> <li>• an analysis of the impact to community infrastructure and services, and for housing stock in all communities where in-migration is anticipated (i.e., five RSA communities and Iqaluit)</li> <li>• Describe the monitoring program that would be implemented by the proponent with respect to in and out migration and its associated effects.</li> </ul>		
<b>Rationale:</b>	<p>The EIS Guidelines require the consideration of the <i>Potential for Project-induced demographic changes in population, migration, redistribution and the effects of those changes, including interactions between local residents and non-residents</i>; (8.2.1.2).</p> <p>It is unclear whether the Proponent completed an evaluation of the effects of changes as a result of demographic changes caused by the project. Rather, it would appear that this issue will be monitored for in the event that it might happen. Some preliminary evaluation of the potential effect needs to be understood in order to know what to monitor.</p>		



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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Economic Development and Transportation (ED&T)	<b>Information Request #:</b>	80
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 2, and Section 4.3.2 Volume 10, Appendix 10F-3, Section 6.5		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The size of the project and potential workforce can accommodate a large number of northern residents who may be interested in employment at the Mary River Project. The DEIS states that Baffinland will seek to provide employment to Nunavummiut outside the point of hire communities (vol. 4, pg. 45). Further, the DEIS identified in the Human Resources Management Plan (App. 10F-3, pg. 13, 14) that if a significant number of people from other communities are employed at the project, additional points of hire may be created. Please provide clarification on the following two points:</p> <ul style="list-style-type: none"> <li>• How many people will have to be hired from a community before it becomes a point of hire?</li> <li>• What support/compensation will Baffinland provide employees to travel to points of hire?</li> </ul>		
<b>Rationale:</b>	While mitigation measures, such as the inclusion of Iqaluit and Ottawa as a point of hire, may reduce the potential for southerners to reside in North Baffin points-of-hire communities, the size of the project and potential workforce may attract people from across the RSA and the north, which may lead to an influx of residents into the current northern points-of-hire communities.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Economic Development and Transportation (ED&T)	<b>Information Request #:</b>	81
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 3 Appendix 10F-3, Section 6 and 8		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS acknowledges there are challenges to providing access to training and to facilities within the LSA (Vol. 3, section 3.2, pg. 27). Proposed mitigation measures include training onsite, offsite training programs, MOU with QIA/QC/Kakivak Association, MOU with GN and NAC, education and training funds, etc. However, residents of the LSA may need to leave home to access training facilities, qualified journeymen for apprenticeships, or educational programs. Further, employees may have to take time away from their current jobs to gain increased qualifications for career advancement. Please address the following concerns:</p> <ul style="list-style-type: none"> <li>• Provide an assessment of the infrastructure needs for adequate training facilities, and locations of any facilities that currently exist which can be utilized for project training.</li> <li>• Provide an assessment of the potential movement out of the LSA by residents seeking training for employment with the Project.</li> <li>• Include in the assessment other services that may be offered at the training centers (e.g., daycare facilities for parents of young children) to support training.</li> </ul>		
<b>Rationale:</b>	The ability for local residents to gain appropriate training in order to qualify for high-level positions of employment with the Project depend in part on the ability to access such training. A thorough description of the proposed training program and the potential associated impacts of accessing such training need to be detailed in the DEIS.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Economic Development and Transportation (ED&T)	<b>Information Request #:</b>	82
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 7, pg. 114		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>There does not appear to be an assessment of the potential impact to Iqaluit or other points of hire communities of the additional air traffic and airport use in communities. In addition, there does not appear to be consideration of weather or other emergencies/mechanical issues unexpectedly grounding flights carrying employees.</p> <ul style="list-style-type: none"> <li>• Provide an assessment to consider potential impacts of increased air traffic through the point of hire communities.</li> <li>• Provide an assessment to account for the possibility of unexpected grounded flights in communities.</li> <li>• Identify mitigation measures to address the possibility of unexpected grounded flights.</li> </ul>		
<b>Rationale:</b>	<p>An influx of several employees into a community or a few hundred into Iqaluit may not easily be accommodated, putting pressures on accommodations, food services, and grocery stores. This may particularly be enhanced in the case of a weather delay, where cargo cannot come into communities for resupply.</p>		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Economic Development and Transportation (ED&T)	<b>Information Request #:</b>	83
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 8, Appendix 8A		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It would be helpful to review more detailed site layout plans for Milne and Steensby ports and harbour facilities. In particular:</p> <ul style="list-style-type: none"> <li>• Provide information on whether large covered ore storage facilities (similar to the Nanisivik/Polaris facilities) will be included to prevent any ore stockpiles from freezing and to mitigate dust migration.</li> <li>• Provide information on how stockpiles will be managed at the ports to avoid manufacturing of dust and dust migration.</li> <li>• Provide information on rail car management to prevent dust migrations issues.</li> <li>• Consider monitoring activities in the monitoring program to determine the need for covering rail cars to prevent dust migration.</li> </ul>		
<b>Rationale:</b>	Based on organizational experience, the above mitigation measures can be used to prevent dust migration.		

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Finance (FIN)	<b>Information Request #:</b>	84
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4 : Section 7.2, Pg. 110 Section 7.4.2, Pg. 114 Section 12.4.3, Pg. 183, Table 4-12.1		
<b>Issue/Concern or Information Deficiency and Request:</b>	Much of the analysis provided in Volume 4 is not substantiated. Referring to Table 4-12.1, Section 12.0, Page 183: <ul style="list-style-type: none"> <li>• Provide the rationale for the noted effects of "Income support" and "Social housing expenditures" in Table 4-12.1. Please clarify the assumed effects.</li> <li>• "Essential community infrastructure and services" (Table 4-12.1) contradicts statements made in Section 7.2 Page 110 and Section 7.4.2 Page 114. In the GN's experience this "neutral" effect is inaccurate. Please clarify how the conclusion of having a "neutral" effect was reached. These conclusions need to be fully substantiated</li> <li>• "Emergency medical travel" (Table 4-12.1) contradicts statements made in Section 7.4.2 Page 114. Please clarify how the conclusion of having a "neutral" effect was reached. These conclusions need to be fully substantiated.</li> </ul>		
<b>Rationale:</b>	Inconsistencies in document. Lack of substantiation for conclusions reached. Contradictions to GN's experience.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Finance (FIN)	<b>Information Request #:</b>	85
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 5.0, Pgs. 65 - 73		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Section 5.0 is only a literature review of Nunavut's existing economic environment. No real analysis or consideration is given to the project's effect on the territory's economy. The DEIS must provide best estimates of the effects the project may have on Nunavut's Real Gross Domestic Product, rate of GDP growth, Consumer Price Index, import/export and trade balance of goods, personal savings rate, and business investment. These types of analyses should be provided for Nunavut's economy as a whole and for Nunavut's major economic sectors (for example, the major sectors in the North American Industry Classification System). This information provides a complete representation of how the project is contributing to Nunavut's economy, and will enhance the local and regional economic analysis. The "Impact Statement" (5.5 Page 73) merely states "VSEC are assessed ... to be positive". What are the reasons, data, analyses or considerations? The proponent should carry out a thorough analysis and include the results of that analysis.</p>		
<b>Rationale:</b>	<p>The Government of Nunavut requires quantitative "best" estimates of the economic effects of the project on its economy as a whole, including the various economic sectors, in order to understand the project's benefits versus costs.</p>		

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Government of Nunavut Information Request																																									
<b>Reviewer's Department:</b>	Finance (FIN)					<b>Information Request #:</b>	86																																		
<b>Information Request From:</b>	Government of Nunavut																																								
<b>Information Request For:</b>	Baffinland Iron Mines Corporation																																								
<b>References:</b>	Volume 4, Section 5.1.2, Pg. 68																																								
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Statements made in Section 5.1.2 appear to be incorrect. Based on the GN's interpretation of available data, Nunavut did not experience the creation of 10,100 jobs in 2008. Further, the Conference Board of Canada does not expect that 11,800 jobs will be created by 2020. The following table shows the CBoC's estimated level of employment (number of jobs) existing in the territory:</p> <p><i>Conference Board of Canada Key Economic Indicators, Nunavut:</i></p> <table border="1"> <tr> <td>2005</td> <td>2006</td> <td>2007</td> <td>2008</td> <td>2009</td> <td>2010f</td> <td>2011f</td> <td>2012f</td> <td>2013f</td> <td>2014f</td> </tr> <tr> <td>9400</td> <td>10300</td> <td>10500</td> <td>10100</td> <td>9800</td> <td>10400</td> <td>10800</td> <td>11100</td> <td>11400</td> <td>11800</td> </tr> </table> <table border="1"> <tr> <td>2015f</td> <td>2016f</td> <td>2017f</td> <td>2018f</td> <td>2019f</td> <td>2020f</td> </tr> <tr> <td>12000</td> <td>12300</td> <td>12600</td> <td>12800</td> <td>13000</td> <td>13000</td> </tr> </table> <p>(YYYYf = forecasted year)</p> <p>Nunavut experienced a decrease of 400 jobs in 2008, not an increase of 10,100. The estimated level of employment in 2020 is only 13,000, an increase of 2,600 from 2010.</p> <p>Please revise the EIS reflect accurate data.</p>									2005	2006	2007	2008	2009	2010f	2011f	2012f	2013f	2014f	9400	10300	10500	10100	9800	10400	10800	11100	11400	11800	2015f	2016f	2017f	2018f	2019f	2020f	12000	12300	12600	12800	13000	13000
2005	2006	2007	2008	2009	2010f	2011f	2012f	2013f	2014f																																
9400	10300	10500	10100	9800	10400	10800	11100	11400	11800																																
2015f	2016f	2017f	2018f	2019f	2020f																																				
12000	12300	12600	12800	13000	13000																																				
<b>Rationale:</b>	The DEIS does not provide an accurate interpretation of data.																																								

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<b>Government of Nunavut Information Request</b>			
<b>Reviewer's Department:</b>	Finance (FIN)	<b>Information Request #:</b>	87
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4		
<b>Issue/Concern or Information Deficiency and Request:</b>	Dollar figures used throughout the DEIS are inconsistently represented, switching from 1997 to 2002. In order to provide an accurate economic analysis with Real Dollars, the proponent should use a consistent base year. The economic analysis requires revision to reflect a consistent base year.		
<b>Rationale:</b>	The Government of Nunavut requires a quantitative analysis of the economic effects of the project on its economy as a whole in order to understand the project's benefits versus costs using a consistent base year. The GN notes that Statistics Canada currently chains Canadian dollars to the year 2002.		



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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Finance (FIN)	<b>Information Request #:</b>	88
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 12.3.1, Pg. 182		
<b>Issue/Concern or Information Deficiency and Request:</b>	Section 12.3.1 is vague and does not provide a rationale for the level of tax revenues expected to flow to the GN from the project. The proponent should show an analysis and a more detailed breakdown of these tax revenues. Please provide more information on how these figures were estimated and a breakdown of where these taxes are flowing. The GN's estimation of tax revenues received from this project are inconsistent with EIS figures.		
<b>Rationale:</b>	Figures stated without rationale. Inconsistencies with organizational expectations.		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Finance (FIN)	<b>Information Request #:</b>	89
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 12.4.3		
<b>Issue/Concern or Information Deficiency and Request:</b>	A complete economic analysis requires the consideration of effects on expenditures as well as revenues. The DEIS does not provide a complete understanding of the types nor levels of expenditures the GN may incur from the project. Please provide the estimated levels of expenditures that the GN may incur due to the project. Please provide data and identify how this data was derived.		
<b>Rationale:</b>	Data is missing from analysis. GN expectations on expenditures do not align with those expressed in the DEIS		

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Government of Nunavut Information Request			
<b>Reviewer's Department:</b>	Culture Language Elders and Youth (CLEY)	<b>Information Request #:</b>	90
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 2, Section 2, Table 2-2.1 Volume 4 Appendix 10F-3		
<b>Issue/Concern or Information Deficiency and Request:</b>	Please describe how the proponent will comply with the requirements of the Nunavut Official Languages Act in their training and orientation programs, work safety requirements, and operations? It was not evident in the DEIS how the Act will be complied with.		
<b>Rationale:</b>	The Nunavut Official Languages Act recognizes Inuktitut, Inuinnaqtun, English, and French as the official languages of Nunavut. In addition, the Inuit Language Protection Act provides clarification on the requirements of availability and accessibility of the Inuit Language. The DEIS does not provide adequate information as to how these requirements will be met or how the Acts will be complied with.		

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Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Education	<b>Information Request #:</b>	91
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 3.4.2 and 3.4.3 Volume 10, Appendix 10F-3, Section 6.4.2		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>Additional detail requested on training plans:</p> <ul style="list-style-type: none"> <li>• Details on construction phase training: will training be offered in advance of construction commencement, what efforts will be done to overcome the additional challenges of construction (faster pace, etc.)</li> <li>• When will the HR Plan and Inuit HR Strategy be available to the public? Will there be consultation with stakeholders (such as the Department of Education)?</li> <li>• What are conditions for opening training to non-employees (Vol 4 s.3.4.3)? What are the plans for training for non-employees, particularly during project growth, to train community members in the LSA to become eligible for employment?</li> <li>• Details on cross-cultural training, orientation and other mandatory general training components (duration, delivery agent/qualifications, assessment, etc).</li> <li>• The HRMP identifies (s.6.4.2) that prior learning recognition 'might' be offered. Under what conditions, for what purposes (if limited), and using what methodology?</li> <li>• What is the size or the expected scope and reach of the education and training fund (in dollar terms or in terms of participants). Is the fund for employees, for community training, or both?</li> <li>• Under what conditions will the employer pay for post-secondary training for employees?</li> <li>• What detail can be provided on plans to promote education amongst the K-12 population? Specifically, what will be done to expose youth under the age of 18 to the mine operation in a tangible and realistic way?</li> </ul>		
<b>Rationale:</b>	While the broad statements provided are very encouraging, in many cases there is very little detail to determine the timing and scope of some initiatives and it is difficult to ascertain the true value of the proposal without this detail.		

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Education	<b>Information Request #:</b>	92
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 10, Appendix 10F-3, Section 13		
<b>Issue/Concern or Information Deficiency and Request:</b>	The data outlined in s.13 of 10F-3 is identified to be provided only to the IIBA Executive Committee. This information will be needed for general monitoring and interaction with partners. Will this information be made publicly available through annual reporting?		
<b>Rationale:</b>	Access to the information on staffing, education and training in the detail outlined in s.13 (for Inuit and for all staff) will be important for partners such as the Department of Education and the public to assess the project from a training and employment perspective.		

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Education	<b>Information Request #:</b>	93
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, Section 3.5		
<b>Issue/Concern or Information Deficiency and Request:</b>	What leads Baffinland to conclude that the incidence of care-giving affecting school attendance will be low?		
<b>Rationale:</b>	This is an important consideration for mitigation of negative impacts on community education. To assume that the impact is low is potentially harmful to the community and to Baffinland's long-term recruitment of educated staff if it is inaccurate.		

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Health & Social Services (H&SS)	<b>Information Request #:</b>	94
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 1B-2, Section 8.2; Volume 3, Section 6.1.5, pg 126 Appendix 4A, page 6		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It was noted that Appendix 1B-2, Sec 8.2 and Volume 3, section 6.1.5 identify 70% of the population in Nunavut is under the age of 25. However, Appendix 4A, page 6 identifies 58% of the population is under 25 in 2006.</p> <ul style="list-style-type: none"> <li>• Please clarify whether the 70% figure is for a different reporting year.</li> <li>• If one of the figures is incorrect, please clarify which one, and revise the DEIS to reflect the correct information.</li> </ul>		
<b>Rationale:</b>	To provide consistency.		

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Health & Social Services (H&SS)	<b>Information Request #:</b>	95
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 4, section 6, pg. 98 and 100 Appendix 10F-3		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>It is unclear how the company will provide family assistance and substance abuse programs to family members of employees.</p> <ul style="list-style-type: none"> <li>Please clarify if the company will provide support for substance abuse to family members of employees and provide detailed information on how the company will provide this support.</li> </ul>		
<b>Rationale:</b>	The information provided is vague.		



**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Health & Social Services (H&SS)	<b>Information Request #:</b>	96
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Appendix 2A-2, pg 2 and 6 Volume 4, Section 11, pg. 179 Volume 10, section 8.4 Appendix 10F-3		
<b>Issue/Concern or Information Deficiency and Request:</b>	Baffinland commits to providing country food to its employees onsite. <ul style="list-style-type: none"> <li>Describe how the provision of country food at the site will affect the availability of country food in communities (i.e community freezers, country food that is donated to elders etc.)?</li> <li>Will the company provide country food only to Inuit employees or to all employees?</li> <li>Describe how country food will be provided to employees</li> </ul>		
<b>Rationale:</b>	The high number of employees at the mine site may impact the availability of country food for Nunavummiut, including those not working at the Project.		

**Appendix A - Government of Nunavut Information Requests for  
Baffinland Iron Mines Corporation, Mary River Project**

Government of Nunavut Information Request			
<b>Reviewer's Name:</b>	Health and Social Services (H&SS)	<b>Information Request #:</b>	97
<b>Information Request From:</b>	Government of Nunavut		
<b>Information Request For:</b>	Baffinland Iron Mines Corporation		
<b>References:</b>	Volume 1, Table 2 Volume 4, Section 6		
<b>Issue/Concern or Information Deficiency and Request:</b>	<p>The DEIS states that there will be a significant positive effect on the well-being of children and that the most important determinants of a child's well-being are based on 3 determinants (increased household income, better nutrient and food security and care-giving, parenting and parenting skills). These three determinates were significantly based on a study done in Australia (Vol 4, sect 6, page 83).</p> <ul style="list-style-type: none"> <li>• Please provide any additional information that Baffinland considered when determining other important factors that are specific to Nunavut.</li> </ul> <p>The DEIS also notes a number of assumptions when referencing the well-being of children. For instance, the project will 1) have a significant beneficial effect on household income and 2) it assumes that this income will then contribute to putting food on the table. The DEIS also recognizes challenges, such as the potential increased effects of crowded housing conditions. Mitigation of these adverse effects is identified to be through contributions to the <i>Ilagiiktunut Nunalinnullu Pivalliajutisait Kiinaujat fund</i>. The objectives of the fund does not speak directly to the potential adverse effects as issues such as increased over crowding in housing as well as the health impacts that this would have on children (for example, increase TB, and lower respiratory infects in children).</p> <ul style="list-style-type: none"> <li>• Please provide further information on mitigation measures for these specific effects</li> <li>• Provide information on if and how Baffinland intends to work with stakeholders (such as the Department of HSS) whose mandate includes overseeing correlating factors that are associated with effects of such issues as overcrowding in houses.</li> </ul>		
<b>Rationale:</b>	The Department of Health and Social Services would be responsible for the increased health factors that arise from overcrowded housing. While it is appreciated that Baffinland will contribute to a fund under the care of QIA, this fund has no specific mandate to address issues such as overcrowding in housing nor the physical health consequences that arise from this issue.		