Independent Environmental Monitoring Agency 78th Meeting of the Board of Directors Yellowknife, NT June 22, 2012 Summary of Discussion

Guests

Nathen Richea, AANDC

Robert Jenkins, AANDC

Revised: September 5, 2012

Directors

Bill Ross

Tim Byers Kim Poole

Shervl Grieve

Tony Pearse (by phone) Laura Johnston (by phone)

<u>Staff</u>

Kevin O'Reilly, Executive Director

Allison Anderson, Communications and Environmental Specialist

JUNE 22, 2012

Meeting commenced at 8:45 a.m.

AGENCY BUSINESS

Information Updates

Bill – Attended the Environmental Agreement implementation meeting in June. Participated in the Agency site visit earlier in the week. Worked on the preparation and review of the Agency Technical Annual Report 2011-12.

Kim – Continued to focus on issues around caribou and grizzly monitoring. Worked on the preparation and review of the Agency Technical Annual Report 2011-12.

Tim – Attended the Environmental Agreement implementation meeting in June. Sent a memo to BHP Billiton (BHPB) raising concerns about endocrine disrupting compounds (EDCs) at Ekati. Worked on the preparation and review of the Agency Technical and Plain Language Annual Reports 2011-12. Participated in the site visit in June. Visited Lutsel K'e and participated in a career fair there in May.

Laura – Prepared comments with Tim on BHPB's 2011 Aquatic Effects Monitoring Program (AEMP). Reviewed, summarized and distributed notes on BHPB's 2011 Nitrate *In-Situ* Study Report. Distributed her preliminary thoughts about BHPB's water licence renewal application. Worked on the preparation and review of the Agency Technical Annual Report 2011-12.

Sheryl – Reviewed the Agency Plain Language Annual Report 2011-12. Distributed comments on grizzly bear monitoring, BHPB's water licence renewal application and *Wildlife Act*. Communicated with the North Slave Métis Alliance.

Kevin – Worked on the audit and preparation and review of the Financial Statements. Worked on the preparation and review of the Agency Technical and Plain Language Annual Reports 2011-12 and correspondence regarding EDCs, the joint regional grizzly bear DNA proposal, and the maintenance and inspection of wildlife fencing. Submitted comments on the 2011 AEMP and

mine site reclamation guidelines for the NWT. Arranged for outside expert advice on the issue of financial security. Contacted Don MacDonald about his interest and availability to assist on the water licence renewal process. Arranged and participated in the site visit in June. Arranged and participated in a teleconference in April on the closure guidelines being prepared by the Mackenzie Valley Land and Water Board and Aboriginal Affairs and Northern Development Canada (AANDC). Met with staff from the Wek'èezhìı Land and Water Board (WLWB) and Environmental Monitoring Advisory Board (EMAB) in June regarding AANDC's capacity to conduct mine inspections. Followed up with Jason Brennan (AANDC) about whether BHPB is required to conduct daily inspections of the Long Lake Containment Facility. Confirmed that the WLWB has not approved the Site-Specific Water Quality Objective (SSWQO) for selenium.

Allison – Worked on the Agency Technical and Plain Language Annual Reports 2011-12. Continued to work on communications initiatives launched in March and carry out general communications and administrative tasks. Attended meeting with WLWB and EMAB staff in June and teleconference on the MVLWB-AANDC draft closure guidelines in April. Attended and prepared the summary of discussion for the Environmental Agreement implementation meeting in June and finalized the summary of discussion for the February meeting. Prepared the summary of discussion for the Board meeting in March. Arranged the delivery of a new computer and backed up old electronic files. Participated in site visits to Ekati in April and June.

> Financial Report

Kevin reviewed the 2011-12 Year-to-Date (YTD) Expenditures and Variance Report as well as the draft Financial Statements ending March 31, 2012. The Agency only expended about \$13,000 of the funds available in the Separate Fund, creating a surplus. The draft audit indicates a surplus of about \$10,000 in the core budget. Interest was slightly higher than last year, and Board support was higher in 2012. There was a significant difference in funds paid to consultants, including because some consulting work was not performed. There was an increase in expenditures on professional development in 2011-12, when Tony and Agency staff attended a conference and training in Lake Louise.

The audited Financial Statements are currently in draft form. The Board can approve the Financial Statements once revised.

Action Item #1 Kevin to ask auditor for clarification about expenditures and presentation of some figures. Kevin to find out if a management letter is forthcoming. Kevin to ask auditor if it is possible to produce a short summary of the audited Financial Statements. Directors to approve the revised Financial Statements when revisions are complete.

During the audit, it was noted that the current signing authorities for the Agency include one former Director. Kevin will arrange to change the signing authority to reflect the current Directors.

Action Item #2 Kevin to arrange for changes to signing authority on the Agency bank account to reflect current Directors.

AGENCY ANNUAL REPORT 2011-12

Allison provided an update on the progress of the annual reports. Both the technical and plain language versions are on schedule. The Agency reviewed responses it received from BHPB to the Annual Report 2011-12 recommendations earlier in June. Charlotte Babicki prepared the plain language text, which Tim, Jaida, Sheryl and Agency staff reviewed. Allison expects to work on the final edits of both versions with Outcrop into mid-July and will prepare a summary brochure in August. Printing and distribution is expected in mid-August.

Laura updated the directors and staff on selenium levels at Ekati. In BHPB's analysis, sodium or chloride may be causing an interference (high selenium values) in the analytical method. BHPB received approval from the WLWB to use a different analytical method. The Agency has asked BHPB to confirm whether the change in the method was the cause of the drop in selenium levels reported in the 2011 AEMP.

FOLLOW-UP ITEMS

Regional Grizzly Bear Monitoring Program

The Agency was pleased to learn the regional grizzly bear monitoring program is now underway. The program will use 12 x 12 km cells instead of the 10 x 10 km cell size used in most other northern studies to date, but it will have more sampling sessions (six two-week sessions). Rescan (consultants for BHPB) informed the Agency it would be a good idea to study the effect of cell size on capture probability. Rescan anticipates having the analysis completed by January, including examination of capture probability.

Agency staff and Directors also discussed the role of the Department of Environment and Natural Resources in designing wildlife monitoring programs, the role of Traditional Knowledge in designing those programs, and the adequacy of consultation in the process.

Pigeon Stream Diversion Land Use Permit Amendment

BHPB has constructed a road within 14 m of the Pigeon Stream Diversion (PSD) in violation of the terms of its Land Use Permit, which requires roads to be constructed a minimum of 30 metres from any stream. The WLWB subsequently waived the requirement in a land use permit amendment. Inspections carried out later did not show any erosion into the PSD from the road.

During the Agency's site visit to Ekati in June, the Agency discussed BHPB's use of a geotextile liner in the PSD in perpetuity and the long-term impact on the longevity of the PSD. Claudine Lee (BHPB) said she would look into this issue further and get back to the Agency.

Waste Rock and Ore Storage Management Plan

The Agency discussed the waste rock piles that appear not to be freezing. The Agency is not satisfied with BHPB's response to this issue. BHPB is apparently going to install more thermistors this summer to attempt to find out what may be going on in the waste rock piles.

Communications Update

In addition to working on the annual reports, Allison has continued to work on the communications initiatives launched in March. Audio files are complete in four of the six languages. The translation and design of five language versions of the poster and brochure are complete, with final proofing required on three versions. She has continued to improve, update and organize the front and back ends of the Agency website. She organized, edited and ordered photos for the Agency table top display. She received a tutorial on the Ekati Timeline and compiled a list of improvements and updates to make as well as technical problems to resolve. She and Kevin met with the Agency's web host company to discuss possible technology and software upgrades to the office and website, but she has been unable to connect with the company since then.

NEW ITEMS

Wildlife Research Permit Application

The wildlife research permit application for Ekati's 2012-13 Wildlife Effects Monitoring Program (WEMP) was the first the Agency learned of BHPB's plan to recommence the aerial survey for caribou.

The Agency discussed the appropriate role of the Agency in reviewing the wildlife research permit application and BHPB's consultation with communities in the lead up to and during the application process. To date, the Agency has used its comments on the WEMP as the way of reviewing wildlife management rather than the wildlife research permit applications, which is a modest part of monitoring. However, earlier consultation and the exchange of information in the lead up to such applications would be a good idea. A new *Wildlife Act* should make wildlife management clearer, which is why the Agency supported the draft legislation when brought forward the last time around.

Action Item #3 Kim to review the wildlife research permit application and forward any comments to Kevin for submission to BHPB and ENR in a letter.

The Agency may wish to make wildlife the focus of its 2013 environmental workshop (no Agency workshop to be held in 2012 as BHPB is conducting the Environmental Impact Review).

Water Licence Application and Schedule

BHPB proposes to drop some contaminants as regulated effluent quality criteria (EQC) from its next water licence. BHPB's SSWQO background reports suggest higher discharge levels, above current EQCs, and the company appears to argue there is no need to set EQCs for some key contaminants.

Comments on the renewal application are due by September 24, 2012. By then, the Agency should have reviewed the water licence renewal application and additional documentation as well as solicited any necessary outside expertise. Obtaining expertise might be best coordinated with others, including AANDC. The Agency will also participate in the technical sessions in October 2012.

The Agency has until August 1, 2012 to comment on BHPB's submission for a preliminary screening exemption for the water licence renewal application. It was noted that BHPB has suggested changing the written scope of the water licence to include reclamation.

Progressive reclamation and the duration of the licence renewal process were also discussed. It was agreed that Laura will review the renewal application and supporting documents, with Tim and Bill reviewing some portions.

Action Item #4 Directors to review BHPB's submission for a preliminary screening exemption and Laura's related e-mail and forward any comments to Kevin by July 11 for submission to the WLWB. Kevin to arrange a teleconference for July 11 or 12 to discuss Agency position, if necessary.

> 2011 Nitrate In-Situ Study Report

The Agency believes BHPB's approach to managing nitrate in the LLCF makes sense. The study results for 2011 have not changed from the previous year in that the addition of phosphate fertilizer had little effect on nitrate levels. The Agency wonders about what affects the *in situ*

studies are having on the downstream environment, as some chemical and physical parameters appear to be changing. The three-year AEMP review this fall may be a good time to address nitrate and any downstream changes from the addition of fertilizer.

Debrief from Site Visit

On June 20-21, Directors and staff visited the Ekati MIne and met with BHPB. The following areas were visited:

- · Panda Diversion Channel widening;
- · Pigeon Stream Diversion;
- Long Lake Containment Facility;
- · King Pond;
- Misery Camp and planned increased waste rock pile footprint:
- · Wildlife cameras along the Misery Road; and
- New incinerator, which is operational.

A number of issues were discussed informally during the site visit, including the purpose and design of the wildlife monitoring cameras.

Endocrine Disruptors in Fish

In response to Agency concerns about studies indicating the crash of a wild minnow population induced by EDCs (endocrine disrupting compounds) found in municipal wastewater, BHPB conducted some initial testing of sewage discharge onsite. BHPB tested for the most commonly found EDC associated with human birth control medication and found the levels to be below the BC Ministry of Environment guidelines, which to our knowledge are the only guidelines available in western Canada.

Action Item #5 Allison to provide Tim with literature references on the topic of PPCPs and EDCs in municipal wastewater and their impacts on fish.

MEETING WITH NATHEN RICHEA AND ROBERT JENKINS, ABORIGINAL AFFAIRS AND NORTHERN DEVELOPMENT CANADA

AANDC does not currently have the resources necessary to obtain expert technical advice for the water licence renewal process. AANDC was able to have some experts do some preliminary work on BHPB's monitoring data and water quality objectives before the end of the last fiscal year and hopes to release this before interventions are due. The Agency suggested it would be helpful if it were cognizant of what others have done in advance of the deadline for comments.

Asked about BHPB's request for an exemption from a preliminary screening, AANDC said it usually does not comment on matters that are the mandate of the WLWB.

The Agency indicated it has a budget to hire an outside expert and may be able to coordinate with AANDC to make efficient use of their respective resources. The Agency will follow up with AANDC in early August.

Additional information is being collected on northern environments and sensitivities. BHPB was looking at specific receiving bodies. BHPB hired Rescan to develop SSWQOs for those water bodies, which AANDC plans to review.

Action Item #6 Kevin to follow up with AANDC about coordinating on resources for water licence renewal process.

OTHER BUSINESS

> Future Board Meetings

The date of the Agency's next Board meeting will be set for September or October. If possible, the meeting will be held jointly with a community visit to Whatì.

Action Item #7 Kevin to send out a Doodle calendar for planning of September or October meeting dates. Staff to investigate possible meeting locations.

Panda Diversion Channel and 2012 Environmental Impact Report Meetings

BHPB is holding a meeting on the Panda Diversion Channel on July 9 and technical sessions on the 2012 Environmental Impact Report from July 10-11. Bill and Tim expressed an interest in participating on behalf of the Agency.

Meeting concluded at 3 p.m.