RE: W2007L2-0003 Diavik Water License Renewal Intervention

Dear Dr. Elsasser:

Thank you for the opportunity for North Slave Métis Alliance (“NSMA”) to intervene in the said licensing process. This letter serves as a substitute to NSMA’s presentation at the Public Hearing. In line with the timeline suggested in the Wek’èezhii Land and Water Board letter dated 28/4/2015, NSMA looks forward to additional opportunities to ask and answer questions from other parties.

For centuries, Métis people of North Slave have been stewards of their traditional lands that include Lac de Gras watershed. Throughout the construction and operation of Diavik Diamond Mine, NSMA has been an active participant in the environmental management of Lac de Gras.

Since the start of the operation of Diavik mine, NSMA noted a number elevated contaminants in Lac de Gras and its surrounding environment. While many of them are within the initial Environmental Assessment prediction, some of them have exceeded it (for example oil & grease, and PAHs & PHCs). Similarly, some promises have been kept, while some fell short (for example incorporation of Traditional Knowledge in AEMP). In NSMA’s view, though we do not have imminent concerns about Diavik operations, there are many areas that could and should be improved upon. We highlight following five areas as our recommendations to the WLWB:

1. Robust incorporation and implementation of TK in AEMP and ICRP;
2. Monitoring of Persistent Organic Pollutants (POP) including dioxins and furans in residues from the incinerators;
3. Shorter term of license (five years);
4. Considerations of best practices recommended by Mount Polley Report; and
5. Adoption of Standard Operating Procedures for handling of lab samples.
1. Robust, relevant and timely incorporation and implementation of TK in AEMP and ICRP

Incorporation of Traditional Knowledge is a key tenet of the MVRMA regulatory processes, and one that NSMA members consider crucial in accepting the development in their traditional lands. DDMI made a number of attempts to gather and incorporate TK, however little progress have been made, which frustrate NSMA members.

DDMI states as its objectives for the AEMP TEK program (AEMP 2011-2013 Summary Report):

- Incorporate significant community participation and input into the design and implementation of the AEMP TEK program, including fish palatability and texture studies, and water quality and quantity studies; and
- Provide training and capacity-building opportunities for communities.

DDMI and NSMA must have a different idea about “significant” participation and input. Last TEK program for AEMP was in 2012; and in AEMP Version 3.5 (2014), DDMI only rephrased what was reported in the original 2012 TEK Report by Thorpe Consulting. Traditional Knowledge is a knowledge that is passed down from generation to generation, in a holistic, continuous, and contextual way. It is wholly inadequate to organize a camp every three years on the land and expect that DDMI will acquire enough “data”. As DDMI points out itself, TK is a “holistic” way of knowing. Holistic ways of knowing cannot mainly happen in the boardroom in Yellowknife. It is acquired and exercised on the land.

In order to achieve “significant participation and input”, NSMA recommends that DDMI creates a full-time Traditional Knowledge Monitor position that is stationed onsite and monitors the Valued Component based on his or her Traditional Knowledge, with assistance and supervision from the TK Panel. Alternative approach is acceptable as long as it also ensures comparable continuity of TK carrier presence on the land.

Further, it is unclear how DDMI followed up on the “capacity-building” that were provided – video-recording of elder interviews by youths, scientific sampling techniques etc. Without ongoing support, neither video-filming skills nor scientific techniques can be expected to realize “significant participation” in TEK Program. It does not appear that DDMI followed up with the communities to find out the efficacies of the capacity-building projects.

NSMA recommends that DDMI consult with NSMA to develop a long-term strategic plan to build capacities within the communities to meaningfully and significantly participate in the AEMP TEK Program as well as the design of ICRP.

Lastly, NSMA looks forward to developing programs focusing on the Aboriginal languages and TK. The area near Lac de Gras is riddled with Michif place names, with a rich history of Métis presence.

2. Monitoring of Persistent Organic Pollutants (POPs) including dioxins and furans in residues from the incinerators

It is well-known that incineration of plastics can result in increased emission of dioxins and furans. These potent carcinogens persist in the environment and bio-accumulate in the species of higher trophic order, such as lake trout. At present, no monitoring is conducted for these...
substances by DDMI.

**NSMA recommends that laboratory testing of scrubber water, residual ash, and lake sediments to be incorporated into relevant monitoring programs.** At minimum, Incinerator Management Plan and Waste Management Plan need to be updated to include these parameters. The NSMA agrees with GNWT ENR’s recommendation in ENR IR#2 that dioxins and furans in ash residues should be no more than 0.001 mg/kg, in accordance with BC’s Hazardous Waste Regulation.

Métis of North Slave will stay and use the lands many generations after the diamond mines leave. It is our responsibilities to ensure the fish and wildlife in the area will be safe to eat, as the ancestors of the lands did for us. The first step toward it is to make sure no significant amount of POPs will be released into the environment from the incinerators.

3. **Shorter Term of License**

NSMA is concerned that the current proposed term of license is too long to allow for a timely review of Valued Components. The term of the license encompasses developments of A21 and possibly Dominion Diamond Ekati Corporation’s Jay Pit. There can be many unforeseen cumulative impacts that can result from the concurrent developments of the neighboring large open pit mines in the contiguous waters.

**The NSMA recommends to WLWB that the term of license be five years** to allow for a review of the license conditions after the construction phases of A21 and Jay pit are over. We believe this is a reasonable and conservative approach that will encourage good practice and ongoing reviews.

4. **Considerations of the best practices recommended by Mount Polley Report**

NSMA notes that the authors of “Report on Mount Polley Tailings Storage Facility Breach” made a number of recommendations relevant to Diavik mine. Below are excerpts from section 9 “Where Do We Go From Here” and section 11 “Recommendations”:

a. Existing tailings impoundments should rely on best practices for the remaining active life;

b. Best Available Technology (BAT) principles should be applied to closure of active impoundments so that they are progressively removed from the inventory by attrition. BAT has three components that derive from principles of soil mechanics;
   i. Eliminate surface water from impoundment (in Diavik case, PKC)
   ii. Promote unsaturated conditions in the tailings with drainage provisions
   iii. Achieve dilatant conditions throughout the tailings deposit by compaction

c. Increase utilization of Independent Tailings Review Boards

d. Set out and utilize Quantitative Performance Objectives to evaluate safety of the impoundments. The objectives values should be associated numerically with;
   i. Beach widths
   ii. Water balance audits and calibration
   iii. Construction material availability and scheduling to ultimate height of structure
   iv. Instrumentation adequacy and reliability
   v. Trigger levels for response to instrumentation
   vi. Performance data gathering, interpretation, and reporting intervals
Clearly, there are a number of technical and regulatory considerations that need to go into this before Diavik can adopt these recommendations. The NSMA recommends that DDMI work closely with the Regulators to develop the best way forward to incorporate the valuable lessons from the Mount Polley disaster.

5. Adoption of Standard Operation Procedures for handling of lab samples

The NSMA would like to point out that there have been a number of sampling and material handling errors in the last several years at Diavik mine. For example, for two consecutive years from 2009-2010, dust samples were not collected due to operational errors. There was a laboratory error in the nutrient data set, and sample handling errors in 2007, while collecting inconsistent data from 2008 to 2010. A quick glance of Annual Water License Reports reveals dozens of sampling errors year after year. With the weak implementation of TK monitoring, scientific studies need at least be convincing to our members to feel confident about the Diavik operations. Data are the foundation of Scientific Method, which, as it stand, are unreliable, lacking, or non-existent.

NSMA recommends that DDMI develop and implement Standard Operating Procedure for sampling, handling, and analyses to prevent any future incidents.

Once again, I thank WLWB and all parties for accommodating NSMA’s schedule. We look forward to engaging with you further.

Sincerely,

Shin Shiga
Regulatory Analyst

CC:  Mr. Ryan Fequet, WLWB
      Mr. Gord MacDonald, DDMI
      Mr. Dave Wells, DDMI