Environmental Protection Operations Directorate Prairie and Northern Region (PNR) 5019 52nd Street, 4th Floor P.O. Box 2310 Yellowknife NT X1A 2P7

Sept 28, 2013

EC file: 6200 000 023 /001 NWB file: 3BM-GJO0409

Via e-mail: licensing@nunavutwaterboard.org

Phyllis Beaulieu, Manager of Licensing Nunavut Water Board P.O. Box 119 Gjoa Haven NU X0B 1J0

Attention: Ms. Beaulieu

RE: 130828: 3BM-GJO0409 Hamlet of Gjoa Haven - Renewal - Type B - Kitikmeot

Region

Environment Canada (EC) has reviewed the above-mentioned Water Licence renewal application submitted to the Nunavut Water Board (NWB). The following specialist advice is provided pursuant to the *Canadian Environmental Protection Act 1999*, the pollution prevention provisions of the Fisheries Act, the Migratory Birds Convention Act, and the Species at Risk Act.

The Hamlet of Gjoa Haven (the Proponent) is applying for the renewal of a Type B Water Licence. The Proponent is responsible for the disposal of sewage and solid waste generated from the community. The current sewage lagoon and solid waste site facility had some operation and maintenance issues. In order to obtain the Water Licence, the community has made improvmentes to the sewage lagoon and solid waste site facilities, such as repaired the leakage, updated O & M manual and plan, and started monitoring of current solid waste facility since summer 2012. Monthly monitoring and sampling program for sewage and solid waste effluent for the summer and fall will be continued; the Proponent and Government of Nunavut are aware that the solid waste site capacity and volume of current storage at the facility issues might require impprovenment and or expansion.

Based on a review of the license application and supporting materials, EC provides the following comments for the NWB's consideration:

General

1. All mitigation measures identified by the Proponent, and the additional measures suggested herein, should be strictly adhered to. This will require awareness on the part of the Proponent's representatives (including contractors) conducting operations in the field. EC recommends that all field operations staff be made aware of the Proponent's commitment to these mitigation measures and provided with appropriate advice / training on how to implement these measures.





- 2. Subsection 36(3) of the *Fisheries Act* specifies that, unless authorized by federal regulation, no person shall deposit or permit the deposit of deleterious substances of any type in water frequented by fish, or in any place under any conditions where the deleterious substance, or any other deleterious substance that results from the deposit of the deleterious substance, may enter any such water. The definition of a deleterious substance (Subsection 34(1) of the *Fisheries Act*) includes "any water that contains a substance in such quantity or concentration, or that has been so treated, processed or changed, by heat or other means, from a natural state that it would, if added to any other water, degrade or alter or form part of a process of degradation or alteration of the quality of that water so that it is rendered or is likely to be rendered deleterious to fish or fish habitat or to the use by man of fish that frequent that water." Subsection 36(3) makes no allowance for a mixing or dilution zone at the point of deposit.
- 3. Please note that according to the Aboriginal Affairs and Northern Development Canada's (AANDC) "Guidelines for Spill Contingency Planning" (April 2007), available at http://www.aadnc-aandc.gc.ca/eng/1100100024236/1100100024253, all releases of harmful substances, regardless of quantity are to be reported to the NWT / NU 24-hour Spill Line, (867) 920-8130 if the release is near or into a water body, is near or into a designated sensitive environment or sensitive wildlife habitat, poses imminent threat to human health or safety, poses imminent threat to a listed species at risk or its critical habitat, or is uncontrollable.

Wildlife and Species at Risk

- 4. Paragraph 6 (a) of the Migratory Birds Regulations states that no one shall disturb or destroy the nests or eggs of migratory birds. The best mitigation measure to ensure compliance is to conduct activities with a risk of disturbing or destroying nests or eggs outside of the migratory bird nesting season. High risk activities include disturbance of large amounts of habitat during the nesting season or conducting activities in areas with large concentrations of nesting birds. If an active nest is found, the area should be avoided until nesting is completed (i.e. the young have left the vicinity of the nest). In the southern Arctic region of the Northwest Territories and Nunavut, migratory birds may be found incubating eggs from May 14 until July 30, and young birds can be present in the nest until September 12. The Proponent should consult the fact sheet "Planning Ahead to Reduce Risks to Migratory Bird Nests" available at: http://www.ec.gc.ca/paomitmb/ for further guidance.
- 5. EC recommends that food, domestic wastes, and petroleum-based chemicals (e.g., greases, gasoline, glycol-based antifreeze) be made inaccessible to wildlife at all times. Such items can attract predators of migratory birds such as foxes, ravens, gulls, and bears. Although these animals may initially be attracted to the novel food sources, they often will also eat eggs and young birds in the area. These predators can have significant negative effects on the local bird populations.
- 6. Section 5.1 of the Migratory Birds Convention Act prohibits persons from depositing substances harmful to migratory birds in waters or areas frequented by migratory birds or in a place from which the substance may enter such waters or such an area.





- 7. In order to reduce aircraft disturbance to migratory birds, EC recommends the following, safety permitting:
 - Fly at times when few birds are present (e.g., early spring, late fall, winter)
 - If flights cannot be scheduled when few birds are present, plan flight paths that minimize flights over habitat likely to have birds and maintain a minimum flight altitude of 650 m (2100 feet).
 - Minimize flights during periods when birds are particularly sensitive to disturbance such as migration, nesting, and moulting.
 - Plan flight paths to avoid known concentrations of birds (e.g., bird colonies. moulting areas) by a lateral distance of at least 1.5 km. If avoidance is not possible, maintain a minimum flight altitude of 1100 m (3500 feet) over areas where birds are known to concentrate.
 - Avoid areas used by flocks of migrating waterfowl by 3 km.
 - Avoid excessive hovering or circling over areas likely to have birds.
 - Inform pilots of these recommendations and areas known to have birds.
- Implementation of these measures may help to reduce or eliminate some effects of 8. the project on migratory birds and Species at Risk, but will not necessarily ensure that the proponent remains in compliance with the Migratory Birds Convention Act, Migratory Birds Regulations, and the Species at Risk Act. The proponent must ensure they remain in compliance during all phases and in all undertakings related to the project.

Should you require further information, please do not hesitate to contact me at 819-934-0273 or yongshu.fan@ec.gc.ca.

Sincerely,

Yongshu Fan

Environmental Assessment Coordinator

Dave Fox, Acting Head, Environmental Assessment North (NT & NU), EC CC:

