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Our file: 4517 000 001
NWB file:3BC-BAF0919

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Via email at: licensing@nunavutwaterboard.org

RE: 3BC-BAF0919 – BAF-3 Department of National Defence D1 Sewage Disposal Update

On behalf of Environment Canada (EC), I have reviewed the information submitted with the above-mentioned application. The following specialist advice has been provided pursuant to Environment Canada's mandated responsibilities for the enforcement of the *Canadian Environmental Protection Act*, Section 36(3) of the *Fisheries Act*, the *Migratory Birds Convention Act*, and the *Species at Risk Act*.

Nasittuq Corp. has submitted a Sewage Disposal Update on behalf of the Department of National Defence for the construction and maintenance of sumps for sewage outfalls at North Warning System Site BAF-3, Brevoort Island. This update is a requirement of Part D, Item 1 of the revised water license, issued by the Nunavut Water Board in September 2009. Environment Canada provides the following comments and recommendations with respect to the update report for the Nunavut Water Board's consideration:

General

- Nasittuq Corp. must ensure that any effluent discharged must be in compliance with Section 36(3) of the *Fisheries Act*. The proponent shall not deposit, nor permit the deposit of any wastes, chemicals or sediment into any water body. According to the *Fisheries Act*, Section 36(3), the deposition 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, is prohibited.
- The Proponent is to ensure that all construction activities on the sewage lagoon do not result in sedimentation of any surrounding water bodies. Preventative measures, such as the use of silt curtains/fences should be used to help mitigate any potential impacts.
- Any stockpiled material should be stored above the high water mark of any water body and in such a manner as to prevent sedimentation of surrounding water bodies.
- EC recommends that prior to its potential use and/or disposal, the excavated material be tested for the following parameters: heavy metals, including mercury, lead, chromium, cobalt, copper, nickel, and zinc; nutrients, including ammonium, nitrate, and phosphorus; pH; phenols; hydrocarbons; and solvents.
- EC recommends that sludges are characterized prior to disposal to ensure disposal options are appropriate.

Spill Contingency

- The proponent should produce a Spill Contingency Plan which includes the new operations and infrastructure. The plan should facilitate response to spills which might occur during construction and operation of the project. The plan should include a list of available spill response equipment and the names of trained personnel who will be on-site and available in the case of a spill. EC is available to review such a plan.

If there are any additional data for the update, EC should be notified, as further review may be necessary. Please do not hesitate to contact me with any questions or comments with regards to the foregoing at (867) 975-4631 or by email at paula.c.smith@ec.gc.ca

Yours truly,

Original signed by

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