

REASONS FOR DECISION

WATER USE APPLICATION HY01-014

Tom Randall

Residential Micro-Hydro Project

Unnamed Creek, known locally as Dogpatch Creek

The Yukon Territory Water Board ("the Board") has concluded deliberations pertaining to Water Use Application for a Type B Licence for a power undertaking. Tom Randall intends to construct a penstock, powerhouse and tailrace along the unnamed creek to generate and supply power to his place of residence.

Public notice of this application was provided in accordance with the requirements of the Yukon Waters Act. In response, the Board received interventions from Fisheries and Oceans Canada ("DFO"), Carcross Tagish First Nation ("CTFN"), Indian Affairs and Northern Development ("DIAND") and Government of Yukon-Environment ("YTG"). The Board did not receive a request for a public hearing. The applicant did provide a response to the letters of intervention. Both DIAND and DFO argued that there was inadequate information to assess the application. The Board tabled the application to clarify some issues. Once more information was provided by the applicant, the Board determined that there was adequate information to proceed with licensing.

Prior to making licensing decisions, the Board undertook an environmental assessment of this project, pursuant to the Canadian Environmental Assessment Act ("CEAA"). The Board is satisfied that the project is not likely to cause significant adverse environmental effects.

In making licensing decisions pertaining to this application, the Board took into account the application itself, the Environmental Assessment, the recommendations of interveners, the Board's standard licence requirements and Board policies.

DFO

The Licensee stated that no fish have been observed in the creek over the past ten years, however, DFO requested that a fish study be conducted by a qualified person who is approved in advance by DFO. The Licensee informed the Board that YTG will be conducting the study and YTG also provided confirmation that the study will be conducted. The Board determined the presence or absence of fish would have little effect on its decision making with regard to this application since the licence it prepared contains sufficient mitigative measures to prevent a significant impact even if fish are present.

Both the intake of the penstock and the outlet of the tailrace will be screened in accordance to the DFO screening guidelines for water withdrawals from fish bearing water in the Yukon. With this mitigation in place, entrainment of fish in the turbine will not be a concern.

In regards to the concern that this project will reduce the flow of the creek, the applicant has proposed to divert less than 5 % of the estimated average flow during open water and only proposes to divert it for a very short stretch of the creek. If fish species exist in the creek, any reduction to water flows will only occur for the 100- 120 metre portion of the creek and is

negligible in comparison to the estimated average flow that currently exists in the creek. During the lowest winter flows, the reduction in flow in that 100 to 120 metre stretch of creek would be in the range of 11 to 42% (the larger proportion is based on the lower flow data that was obtained by DIAND staff and submitted by the Licensee) and the flow in the remainder of the creek will remain unchanged. If there currently is sufficient water flow in the creek to support fish then the issuing of this licence will not have a significant effect on the capability of the creek to continue to support fish. The applicant has proposed nothing that would restrict the passage of fish.

Issues of water quality have also been considered in the licence issued. Sedimentation from the works is mitigated by at least ten licence measures including: a requirement to maintain the works in good order, a prohibition on heavy equipment working in the creek, a requirement that modifications to the creek channel beyond those required to construct the works are not allowed, a requirement to construct the works in the dry, provision of a vegetated leave strip between the creek and tailrace and an overall requirement to carry out the works in a manner that minimizes release of sediment to the watercourse.

The licence also contains restrictions on storage of and a prohibition of release of deleterious substances. A spill contingency plan is in place.

These water use licence conditions should adequately mitigate any potential negative impacts to fish and fish habitat.

CTFN

The project location falls within a future special management area for the CTFN. The special management area is planned for the future and no guidelines or mitigation recommendations were provided to the Board for this project. In the absence of any recommendations, standard water use licence conditions should adequately mitigate any potential negative impacts to the area.

DIAND

DIAND requested support for the stream flow, additional information on the design of the project and a spill contingency plan. In the Licensee's response, supporting data for the minimum winter flow was provided and clarification was added to the design sketches. The Licensee responded that the remaining flow data within the application, were estimates made by the Licensee based on data from Yukon Energy Corporation and DIAND-Water Resources. In its deliberations, the Board considered the lower ranges of the winter flow information submitted by the Licensee, in comparison to the low flow estimates that the Licensee originally provided in the application.

The Board determined that the information provided by the Licensee was adequate information to proceed with licensing decisions. In the absence of any recommendations, the water use licence conditions should adequately mitigate any potential negative impacts to the area.

YTG

The Licensee has indicated that the trees that are cut down to facilitate the construction of the tailrace will be used for firewood for his residence. YTG concurred with DFO for the need of a fish study to be completed for the unnamed creek. At a later date, YTG provided confirmation to the Board that YTG-Environment will be conducting the fish study. The licence does not require the study to be completed, as it is not an undertaking of the applicant and the Board felt that there was sufficient information to proceed with licensing. The same reasons provided for DFO, apply for YTG.

Photographic Record

As an alternative to the Boards usual requirement for as-built drawings, the licence requires the Licensee to submit a series of photographic records that are to be taken during the critical stages of the construction. It is the Boards intention that the photographs depict:

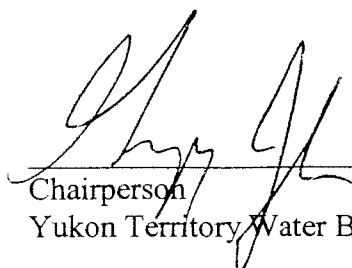
- the construction of the tailrace in the dry,
- the gradual opening of the earth plugs to allow water to enter the tailrace,
- re-entry of water flow as it exits from the tailrace and flows back into the creek, and
- photographs of the final project configuration.

Leave Strip

The licence requires that a leave strip be maintained between the ordinary high water mark of the unnamed creek and the tailrace. It is the Board's understanding, that the Licensee will excavate the tailrace and place the excavated material between the tailrace and the unnamed creek to create a berm. To facilitate construction of the tailrace, some trees and vegetation will need to be removed, and the Licensee has indicated that any trees that are cut down during construction, will be used for firewood for his personal residence. It is the Board's intention that all trees and vegetation between the berm and the ordinary high water mark are to remain undisturbed. once construction has been completed and all construction materials, equipment, etc. have been removed, the vegetated leave strip is to remain undisturbed.

Other Laws

No condition of this licence limits the application of any other Federal, Territorial, First Nation or Municipal legislation. Without limiting the generality of this statement, but in order to provide further clarification, the Board notes that the Licence does not constitute approval or authorization pursuant to the Fisheries Act.


Chairperson
Yukon Territory Water Board

Aug 22 2002
Date