

Notice of Determination

This notice of determination is being issued by Parks Canada under the *Impact Assessment Act*. Parks Canada has decided that the Dog Camp Water Control Structure project (the project) is not likely to cause significant adverse environmental effects.

The Dog Camp Water Control Structure project was identified by Indigenous partners in the Peace-Athabasca Delta (the Mikisew Cree First Nation (MCFN), Athabasca Chipewyan First Nation (ACFN), and Fort Chipewyan First Nation (FCMN)), as an initiative under the Wood Buffalo National Park World Heritage Site (WBNP WHS) Action Plan. The Project was proposed as a means to help locally restore ecological integrity and cultural way of life in the Mamawi Lake and Lake Claire areas of the Peace-Athabasca Delta (PAD).

The Dog Camp Water Control Structure was collaboratively designed with participating Indigenous partners including the MCFN, ACFN, FCMN, Smith's Landing First Nation (SLFN) and Northwest Territory Métis Nation (NWTMN). Indigenous partners, along with federal and provincial government technical representatives, participated in a Structured Decision-Making process as part of a Water Control Structure Task Team to identify the preferred structure design and operational regime for the project.

Indigenous partners shared Indigenous Knowledge, provided feedback that guided design development, provided technical reviews, identified impacts on resources that support rights-based activities, authored cultural heritage sections, and contributed to the development of mitigation measures. This resulted in a co-developed Detailed Impact Assessment (DIA) that brought together information and observations from multiple Indigenous and scientific knowledge systems to inform a deeper and more holistic understanding of ecological and community concerns and potential impacts on these.

The DIA assessed the potential effects of construction and operation of the project on Valued Components. Valued Components were collaboratively developed with Indigenous partners and included:

- Water Quantity and Navigation
- Water Quality
- Fish and Fish Habitat and Aquatic Invertebrates
- Vegetation and Wetlands
- Wildlife and Wildlife Habitat
- Indigenous Culture, Heritage & Way of Life,
- Cultural Resources, and
- Outstanding Universal Value of the WBNP WHS

The project was designed to achieve numerous positive ecological and cultural benefits. The project is anticipated to increase the extent of priority vegetation and wetland communities with benefits for key wildlife species, while decreasing the density of encroaching willow and invasive thistle cover. Operation of the structure is also expected to increase the resiliency of the Lake Claire and Mamawi Lake areas to extended periods of drought or dry years, including environmental changes anticipated under climate change, and enable PAD community members and land users enhanced access to cabins and traditional lands on a more regular basis. These key benefits are anticipated to have positive impacts on the ecological integrity of the local area and PAD Indigenous communities' Culture and Way of Life.

Although the project will have many benefits, there are also a number of trade-offs. Indigenous partners had various requests related to mitigation of potential impacts from the project (Appendix G and H). Parks Canada worked collaboratively with partners to identify which of these requests were carried forward as mitigations/commitments in the impact assessment to lessen potential environmental impacts (the final list of mitigations is included in the DIA, Section 8.0).

Key trade-offs that represent potential residual impacts requiring mitigation or monitoring include:

- transition of non-target vegetation below the navigation water level target
- permanently impeded boat navigation through the site requiring the use of a cart and winch system
- increased risk of cabin flooding frequency for certain low-elevation cabins, and
- barriers to fish passage through the structure when the bladder is inflated.

These impacts were thoroughly examined and discussed with all partners and Indigenous community members through a Water Control Structures Task Team, Working Groups, and at Open Houses.

Mitigation measures to lessen these potential residual impacts include:

- the creation of a Water Control Structure Steering Committee with representation from interested Indigenous partners as well as federal and provincial/territorial government experts to guide the operation of the structure based on annual effectiveness monitoring results,
- appointment of an Operator that will help with communication, education, and monitoring of the safety and efficacy of the structure, including boat passage,
- one-time support to enhance the resiliency of cabins in the area of impact against potential flooding, and
- a number of design and operation mitigations that have been built into the project, including the incorporation of a nature-like fishway and the flexibility of the structure (that enables the bladder to be strategically lowered to enable free fish-passage at key stages if required), which will contribute to minimizing potential impacts on fish. In addition, the development of a comprehensive multi-year monitoring program is identified as a mitigation to ensure adequate fish passage is maintained for all species.

Downstream community input (SLFN and NWTMN) was integral in shaping the operational regime of the water control structure to avoid impacts on water levels downstream along the Slave River. Parks Canada notes that SLFN has persisting concerns related to any potential cumulative downstream water level impacts.

Potential project impacts on downstream water levels were thoroughly investigated and modelled throughout the design process. Potential maximum impacts on downstream water levels are expected to:

- be of imperceptible magnitude along the Slave River, with potential flow reductions occurring at the time of year (early spring) when water inputs from the WAC Bennett Dam are positive (or near neutral),
- be intermittent, corresponding with bladder inflation/deflation, and of short-term duration, representing a transient pulse that is offset almost immediately by the buffering effect of Lake Athabasca (which causes downstream water levels to equilibrate around zero impact); and,

- be reversible; SLFN will be included on the Water Control Structure Steering Committee that will provide direction for the annual operation of the structure, which could be adaptively managed if required, based on annual effectiveness monitoring.

As a result, the project is not anticipated to result in a change to the environment downstream along the Slave River or contribute to cumulative effects on downstream water levels.

The DIA was posted on the Canadian Impact Assessment Registry for public comment for 30 days from July 10 to August 9, 2024. The notification provided details on how to view and comment on the DIA. No public comments were made regarding project-specific environmental impacts resulting in no changes to the DIA.

Considering the scientific information, Indigenous Knowledge, and community knowledge shared, along with the mitigation measures outlined the DIA, Parks Canada has decided that the project is not likely to result in significant adverse environmental effects.

Approved by:

Moira McKinnon
A/Field Unit Superintendent
Southwest Northwest Territories Field Unit

Date