Generation

Q. Reference: "2024 Capital Budget Application," Newfoundland Power Inc., June 22, 2023, sch. B, Hydro Facility Rehabilitation, pp. 99–100.

> **The intake gate condition has since deteriorated and no longer reliably isolates the penstock from the Pittman's Pond reservoir. During an incident of penstock damage in 2022, the gate was unable to prevent the flow of water into the penstock from Pittman's Pond. The concrete intake structure is deteriorated which inhibits dewatering the intake.**

Did Newfoundland Power consider refurbishing the gate rather than replacing it? If not, why not?

A. Newfoundland Power considered both refurbishing the existing gate and replacement of the existing gate. The replacement option was selected for several reasons.

The Pittman's Pond head gate was constructed in 1959 and is a steel gate raised and lowered by two steel cables connected to a manual drum style lifting mechanism. The existing steel gate does not have a guide system to vertically raise and lower the gate in plane. To ensure the gate can be operated under flow conditions, a rigid gate stem is required. To facilitate the installation of a rigid gate stem onto the original gate, the cables and lifting mechanism would need to be removed, concrete surface rehabilitated, gate guides installed and the new rigid gate stem and operating mechanism installed. The only original component that would remain after this work was completed would be the 64-year-old steel gate.

In addition, dewatering Pittman's Pond to the low level necessary to complete the work can only occur in a small window during the late summer. A new packaged gate system will allow for installation within the short construction window and therefore mitigate the risk of not completing the project prior to the winter season.