

1 Q. **Re: IN-NLH-250**

2 The response indicates that the Labrador West Transmission Project will improve
3 reliability for all customers in the region.

4 Please explain in detail the extent to which, absent new industrial developments in
5 Labrador West, a new transmission line is needed to improve reliability.

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8 A. There are currently two 230 kV transmission for Labrador West. Load must be
9 curtailed under the worst-case contingency involving the loss of a 230 kV
10 transmission line.¹ In winter months, this contingency requires load curtailment to
11 maintain acceptable voltages. In summer months, curtailment is required under this
12 contingency as the remaining 230 kV transmission line reaches its maximum
13 thermal/sag limitation. Even though such events are uncommon, a new
14 transmission line would provide a reliability improvement for existing customers in
15 Labrador West.

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17 A decision to add additional transmission capacity in Labrador West absent new
18 industrial development must achieve a balance between reliability improvement
19 and cost. The present configuration has been in place and maintained to supply
20 customers in Labrador West under similar load and higher load situations for a
21 number of years.

¹ Transfer limits in the event of this contingency are dependent upon the ambient temperature and range between 250 MW at -30°C and 155 MW at 30°C. This may be compared with forecasted peak load for Labrador West for 2016 of approximately 330 MW. As per Hydro's Operating Load Forecast for the Labrador Interconnected System (June, 2014), with Alderon Kami loads subtracted.