

1 Q. Reference: *Probabilistic Based Transmission Reliability Summary Report*, Appendix  
2 A, Page 33 of 56.

3 *“Please note that the Square Butte HVDC system was frequently hit by tornados,*  
4 *which results in significant outage durations for this system. If the Square Butte is*  
5 *removed from the data, the average failure rates and outage durations will be as*  
6 *follows...”*

7 Please explain the level of understanding that Teshmont has relating to the  
8 environmental conditions facing the Labrador Island Link that would allow for the  
9 above assumption.

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12 A. As per Hydro’s response to NP-NLH-140, Teshmont has reviewed the reliability data  
13 provided by Nalcor in the context of its experience as an owner engineer and based  
14 on CIGRE statistics. These considerations were used to assess the data provided by  
15 Nalcor in comparison to typical HVdc system performance.

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17 The Square Butte HVdc system is frequently out of service due to tornadoes and it is  
18 Teshmont’s perspective that the reliability data for that system is not indicative of a  
19 typical HVdc system. The analysis therefore involved a review of statistics with the  
20 Square Butte data removed.

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22 Teshmont did not perform a review of the environmental conditions and the  
23 specific overhead line design employed which may mitigate the impact of those  
24 conditions on the reliability of the Labrador Island Link. A detailed assessment of  
25 special environmental considerations that may cause the reliability of the LIL to  
26 differ from a typical HVdc transmission line was beyond the scope of Teshmont’s  
27 study.