Q. On page 1, line 14 of the Energy Supply Risk Assessment Report, Hydro states that one intent of the report is to "analyze the reliability of Hydro's existing thermal generating assets". While the report provides results for different assumptions regarding thermal unit reliability, it does not provide any analyses, such as estimates of what the reliability of the Holyrood units is expected to be. Please provide Hydro's best estimate of DAFOR for Holyrood for the period 2016 to 2021 and provide the analyses supporting the estimate.

Α.

In February of 2016, Hydro considered the year to date DAFOR for the Holyrood plant and determined that it was 26.84%. This number was primarily due to forced outages and de-ratings on Unit 1 and Unit 2 as a result of the reheater tube failures in these units. A projected DAFOR for 2016 was then calculated under the assumptions that these units would be de-rated until the planned annual outages, the reheater tubes would be replaced during the annual outages, and the units would then return to normal operation. The projected 2016 DAFOR for the plant, based on these assumptions was 19%. To validate this number, Hydro then considered historical data of Holyrood DAFOR rankings for the years between 1995 and 2015, with the exception of 2013, which due to the Unit 1 turbine failure was not considered to be a normal year. The average DAFOR for the highest 4 years (20% of the 20 years) was 19%.

Considering this data, Hydro believes that it is reasonably possible that the DAFOR at Holyrood could be 19% for the period of 2016 to 2021. This is a cautious estimation for the purpose of the analysis as there is a reasonable risk that such DAFOR rates could occur in the future.,

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- 1 A range of DAFOR values for Holyrood (10% to 24%) were considered in the Energy
- 2 Supply Risk Assessment Report to assess the sensitivity of the conclusions to various
- 3 DAFOR values.