

1 Q. Reference: Application

2 What was the DAUFOP for Holyrood TGS in each of the past 5 years? Please show separately for
3 each unit at Holyrood TGS. What is the DAUFOP for Holyrood assumed in Hydro’s planning studies?

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6 A. At present, Newfoundland and Labrador Hydro (“Hydro”) tracks performance data for the units at
7 the Holyrood Thermal Generating Station (“Holyrood TGS”) using the Derated Adjusted Forced
8 Outage Rate (“DAFOR”) metric. As stated in the 2022 Update to the Reliability and Resource
9 Adequacy Study,¹ the units at the Holyrood TGS are to remain base loaded in the near term and will
10 strategically move to standby operation if system conditions allow. When operation of Holyrood
11 TGS becomes standby, DAUFOP² will be the preferred performance measure given the frequency of
12 deratings historically experienced by these units, and Hydro will adjust targets accordingly.

13 The Holyrood TGS DAFOR performance data for the last five years for each unit is shown in Table 1,
14 Table 2, and Table 3, respectively. The annual performance target is set at 20%. For resource
15 adequacy planning purposes, a forced outage rate of 20% is assumed with a sensitivity value of
16 34%.^{3,4}

Table 1: Holyrood Unit 1 DAFOR Performance

Year	DAFOR (%)
2020	3.97
2021	34.50
2022	9.27
2023	19.39
2024	45.60

¹ “Reliability and Resource Adequacy Study – 2022 Update,” Newfoundland and Labrador Hydro, October 3, 2022, vol. III, p. 25/6-10.

² Derated Adjusted Utilization Forced Outage Probability (“DAUFOP”).

³ “2024 Resource Adequacy Plan – An Update to the Reliability and Resource Adequacy Study,” Newfoundland and Labrador Hydro, rev. August 26, 2024, (originally filed July 9, 2024), app. B, att. 1, p. 6.

⁴ Hydro’s Reliability Planning Models do not differentiate between DAFOR and DAUFOP but rather utilize the forced outage rate derived from these metrics.

Table 2: Holyrood Unit 2 DAFOR Performance

Year	DAFOR (%)
2020	7.78
2021	26.19
2022	5.86
2023	46.04
2024	59.51

Table 3: Holyrood Unit 3 DAFOR Performance

Year	DAFOR (%)
2020	0.52
2021	42.12
2022	6.10
2023	27.48
2024	4.11