

Board of Commissioners of Public Utilities

Financial Consultants Report

2021 Annual Financial Review of

Newfoundland and Labrador Hydro

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1 **Restrictions, Qualifications and Independence**

2
3 **Purpose**

4
5 This report was prepared for the Board of Commissioners of Public Utilities in Newfoundland
6 and Labrador (the “Board”). The purpose of our engagement was to present our observations,
7 findings and recommendations with respect to our 2021 annual financial review of
8 Newfoundland and Labrador Hydro (the “Company”, “Hydro”).
9

10 **Restrictions and Limitations**

11
12 Our scope of work is as set out throughout this report. The procedures undertaken in the course
13 of our review do not constitute an audit of the Company’s financial information and
14 consequently, we do not express an audit opinion on the financial information provided by the
15 Company. Our opinions on other matters are outlined throughout this report.
16

17 We acknowledge that our report may become a public document accessible through the Board’s
18 website. We have given the Board our consent to use our report for this purpose. Our report is
19 not to be reproduced or used for any purpose other than that outlined above without prior written
20 permission in each specific instance. Grant Thornton LLP recognizes no responsibility to any
21 third party who may rely on this report or other material provided to the Board.
22

23 Unless stated otherwise in this report, Doane Grant Thornton LLP has relied on information
24 provided by the Company, the Board’s website and third-party sources in preparing this report,
25 whom Doane Grant Thornton LLP believes is reliable. We are not guarantors of the information
26 upon which we have relied in preparing the report and, except as stated, we have not audited or
27 otherwise attempted to verify any of the underlying information or data contained in this report.
28 We have made efforts to ensure a conservative, realistic and transparent approach, however,
29 some of the analysis depends on the input from third parties whose opinions may influence the
30 conclusions. We reserve the right, but will be under no obligation, to review and/or revise the
31 contents of this report in light of information which becomes known to us.

1 **Executive Summary**

2
3 This report to the Board presents our observations, findings and recommendations with respect
4 to our 2021 annual financial review of Hydro. Below is a summary of the key observations and
5 findings included in our report.

6
7 Our review indicated the creation of 90 additional accounts to the code of accounts in 2021. The
8 accounts added to the 2021 system were necessary to comply with various Board orders and
9 will enhance the Company's ability to provide sufficient information to meet the Board's reporting
10 requirements.

11
12 As a result of completing our procedures on Hydro's 2021 rate base, we noted an average rate
13 base of \$2,321,760,000 as filed in Return 3 compared to the 2020 average rate base of
14 \$2,310,560,000. The Company's calculation of the rate return on average rate base for 2021 as
15 filed in Return 12 is 5.46% compared to the 2020 rate of return on average rate base of 5.47%.

16
17 The Company's calculation of return on regulated average equity for 2021 was 7.94% compared
18 to a return of 8.72% in 2020.

19
20 The Company's target capital structure is comprised of 75% debt and 25% common equity for
21 regulated operations. The actual 2021 was 74.1% debt (excluding employee benefits and asset
22 retirement obligation) and 21.9% equity compared to 74.8% debt and 21.2% equity in 2020.

23
24 The net impact on regulated earnings for 2021 was a decrease over 2020 of \$229,000. This
25 decrease was primarily attributable to an \$11.9 million increase in fuel expenses, an increase in
26 depreciation expenses of \$4.1 million, and a \$1.3 million increase in system equipment
27 maintenance. The impact of this decrease in regulatory earnings was partially offset by a
28 decrease in power purchased of \$10.2 million.

29
30 We reviewed Hydro's rates of depreciation to assess their compliance with the rates of
31 depreciation used and assessed its compliance with the depreciation study approved in Order
32 No. P.U. 30 (2019). We also calculated depreciation on a test basis and compared the
33 estimated average service lives used in the calculations to the 2015 Depreciation Study as
34 outlined in the 2017 General Rate Application ("GRA") and approved in Order No. P.U. 30
35 (2019). We found no exceptions in our testing.

36
37 We reviewed Hydro's methodology relating to the procedures the Company has in place to
38 allocate costs between regulated and non-regulated operations. We also reviewed how costs
39 are allocated between shared services. As a result of completing our procedures, we report that
40 cost allocations for 2021 are in accordance with Hydro's methodology.

41
42 The Rate Stabilization Plan ("RSP") ("the Plan") had an accumulated debit balance of
43 approximately \$56.5 million (due from customers) at December 31, 2021, which comprises
44 balances of \$7.5 million due from the utility customer, \$4.3 million due from industrial
45 customers, and a \$44.7 million debit balance in the hydraulic variation account. Based upon our
46 review, we report that the RSP is operating in accordance with Board Orders and the charges
47 and credits made to the Plan in 2021 are supported by Hydro's documentation and are
48 accurately calculated.

1 The Supply Cost Variance Deferral Account recorded a debit balance of \$18.3 million (due from
2 customers) as of December 31, 2021, attributable to its initial two months of activity. This
3 account was approved in Order No. P.U. 33 (2021), with an effective date of November 1, 2021.
4

5 We reviewed Hydro's deferred charges and we noted that recovery of Phase II Hearing Costs,
6 the Business System Deferral, and the Reliability and Resource Adequacy balance has not yet
7 been approved by the Board. These deferral accounts have been appropriately excluded from
8 actual rate base.
9

10 We have reviewed the KPI results and the explanations provided by Hydro for the changes and
11 variations experienced in 2021 and find them to be consistent with our observations and
12 findings noted in conducting our annual financial review.
13

14 The Company was under budget by 16.74% on its capital expenditures in 2021 compared to an
15 under-budget variance of 35.03% in 2020.

1 **Introduction**
2

3 This report to the Board presents our observations, findings, and recommendations with respect
4 to our 2021 Annual Financial Review of Hydro.
5

6 *Scope and Limitations*
7

8 Our review was carried out in accordance with the following Terms of Reference:
9

- 10 1. Examine Hydro's accounting system and code of accounts to ensure that it can provide
11 information sufficient to meet the reporting requirements of the Board.
12
- 13 2. Review calculations of the return on rate base, return on equity, capital structure and
14 interest coverage ratio. As part of these procedures we will review net capital assets
15 excluded from rate base and ensure it is consistent with the Board orders.
16
- 17 3. Conduct an examination of operations and administration expenses, fuels, power
18 purchased, depreciation, and interest. Our examination includes reporting on trends,
19 analytical review of annual variances and other financial analysis based on information
20 provided by Hydro.
21

22 The examination of the foregoing will include, but is not limited to, the following:
23

- 24 a) amortization of deferred charges,
25 b) salaries and benefits,
26 c) system equipment maintenance,
27 d) insurance (including director's liability),
28 e) transportation,
29 f) building rental and maintenance,
30 g) professional services,
31 h) miscellaneous,
32 i) capitalized expenses,
33 j) intercompany charges,
34 k) membership fees,
35 l) fuels,
36 m) power purchased,
37 n) depreciation,
38 o) interest,
39 p) office supplies and expenses,
40 q) bad debts.
41
- 42 4. Review Hydro's non-regulated activity and assess the appropriateness of adjustments in
43 the calculation of regulated earnings.
44
- 45 5. Review Hydro's rates of depreciation and assess their compliance with the depreciation
46 methodology approved in Order No. P.U. 30 (2019). Assess reasonableness of
47 depreciation expense.

- 1 6. Conduct an examination of the changes to the Rate Stabilization Plan to assess
2 compliance with Board directives.
3
- 4 7. Conduct an examination of the changes to the Supply Cost Variance Deferral Account to
5 assess compliance with Board directives.
6
- 7 8. Conduct an examination of the changes to other deferred charges and assess their
8 appropriateness in relation to sales of power and energy.
9
- 10 9. Review Minutes of Board of Director's and Management Committee meetings.
11
- 12 10. Review Hydro's annual report on Key Performance Indicators and any other information
13 on initiatives and efforts targeting productivity or efficiency improvements.
14
- 15 11. Examine the Company's capital expenditures in comparison to budgets and prior years.
16 Included in this review will be an analysis of amounts included in 'Allowance for
17 Unforeseen Items'.
18
- 19 12. Review how costs are allocated between the regulated and non-regulated operations
20 including a review of Hydro's labour costing relating to its billing rates.
21
22

23 The nature and extent of the procedures we will perform in our financial review will vary for each
24 of the items listed above. In general, our procedures will consist of:

- 26 • inquiry and analytical procedures with respect to financial information as provided by
27 Hydro;
- 28 • examination of, on a test basis where appropriate, documentation supporting
29 amounts included in Hydro's records; and
- 30 • assessing Hydro's compliance with Board directives.
31

32 The procedures undertaken in the course of our financial review will not constitute an audit of
33 Hydro's financial information and consequently, we will not express an opinion on the financial
34 information as provided by Hydro.
35

36 The financial statements of the Company for the year ended December 31, 2021 have been
37 audited by Deloitte LLP, Chartered Accountants, who have expressed their opinion on the
38 fairness of the statements in their report dated March 21, 2022. In the course of completing our
39 procedures we have, in certain circumstances, referred to the audited financial statements and
40 the historical financial information contained therein.

Accounting System and Code of Accounts

Scope: *Examine Hydro's accounting system and code of accounts to ensure that it can provide information sufficient to meet the reporting requirements of the Board.*

Section 58 of the *Public Utilities Act* states that the Board may prescribe the form of all books, accounts, papers, and records to be kept by Hydro and that Hydro shall comply with all such directions of the Board.

The objective of our review of Hydro's accounting system and code of accounts was to ensure that it can provide information sufficient to meet the reporting requirements of the Board. We have observed that the Company has in place a well-structured, comprehensive system of accounts and organization / reporting structure. The system allows for adequate flexibility to allow the Company to meet its own, as well as the Board's, reporting requirements.

Our review noted the creation of 90 additional accounts to the code of accounts in 2021. There were a greater number of additions during 2021 largely due to the Muskrat Falls Project. The new accounts were added in relation to the following categories:

1. Muskrat Falls

During 2021 Hydro filed an application for approval of new accounts, changes to existing accounts, and an accounting deviation associated with the commissioning of the Muskrat Falls Project. The new accounts for Muskrat Falls Project were added in relation to the following:

- A new deferral account relating to the cost of the Muskrat Falls residual block;
- A new account relating to the Muskrat Falls power purchase deferral;
- Two new accounts to record the sustaining capital deferral associated with the Muskrat Falls *Power Purchase Agreement*;
- A new account relating to the Base Block Capital Cost Recovery Adjustment Loan to the Muskrat Falls Corporation;
- Eight new accounts relating to the capture of the accounting contract receivable and payable balances under the Muskrat Falls *Power Purchase Agreement* and *Transmission Funding Agreement*;
- A new deferral account to capture the deferral of power purchase expenses incurred per the Muskrat Falls *Power Purchase Agreement*;
- A new deferral account relating to the deferral of expenses incurred per the *Transmission Funding Agreement*;
- A new account to record tariff revenue deferral in relation to Order No. P.U. 33 (2021);
- A new Utility load deferral account in relation to Order No. P.U. 33 (2021);
- A new Industrial Customer load deferral account in relation to Order No. P.U. 33 (2021);
- A new account to record Greenhouse Gas revenue deferral in relation to Order No. P.U. 33 (2021);
- Two new supply deferral accounts as per Order No. P.U.33 (2021);

- 1 • Two new accounts relating to interest. One to capture interest earned from
- 2 Muskrat Falls and one to capture interest calculated on the balance of the Supply
- 3 Cost Variance Deferral Account.
- 4 • Two new accounts to capture the Power Purchase Expense Recognition as per
- 5 Order No. P.U.33 (2021);
- 6 • 12 new accounting deviation accounts to set up supply deferral accounts and
- 7 post-commission in relation to Order No. P.U. 33 (2021); and
- 8 • Seven new accounts to record Muskrat Falls export deferrals.
- 9

10 2. Labrador Export

11 Accounts for Labrador Export were added in relation to the following:

- 12 • Two new accounts to record Labrador exports deferrals, one relating to the
- 13 regulated and the other relating to the energy sales;
- 14 • A new deferral account relating to the cost of Incremental Recapture purchased
- 15 by Hydro from Churchill Falls;
- 16 • Three new accounts relating to the Non-Regulated costs and revenues
- 17 associated with purchasing Labrador Residual block energy and exporting
- 18 recapture;
- 19 • Two new deferral accounts for transmission costs associated with the Regulated
- 20 Incremental Recapture energy sold to Energy Marketing for Export in February
- 21 and March 2022 as a result of Nalcor Energy Marketing / Hydro *Power Purchase*
- 22 *Agreement* temporary amendment;
- 23 • A new account to record market fees export deferral;
- 24 • A new account relating to the Muskrat Falls *Power Purchase Agreement* for the
- 25 Island and for Labrador; and
- 26 • A new account relating to the power purchase costs to service customers in
- 27 Labrador at the price of Recapture under the Churchill Falls *Power Purchase*
- 28 *Agreement*.
- 29

30 3. Maritime Link

31 Accounts for Maritime Link were added in relation to the following:

- 32 • Four new accounts relating to the Maritime Link export revenue deferral;
- 33 • Three new accounts relating to the Maritime Link export deferral;
- 34 • Three new deferral accounts relating to estimated transmission costs associated
- 35 with exporting Muskrat Falls energy to external markets through the Maritime
- 36 Link; and
- 37 • Two new accounts to record Maritime Link transmission costs deferral.
- 38

39 4. Supply Cost Variance Deferral

40 Accounts for Supply Cost Variance Deferral were added in relation to the following:

- 41 • Four new accounts relating to an industrial rate rider deferral; and,
- 42 • Two new accounts to record load deferral.
- 43

44 5. Non-Firm Energy

45 Accounts for Non-Firm Energy were added in relation to the following:

- 46 • Nine new accounts relating to the identification of fuel costs associated with non-
- 47 firm energy deliveries that are to be excluded from the supply cost variance
- 48 deferral account;

- 1 • Two new accounts to record revenue related to gas turbine fuel. One for fuel
2 used in emergency energy supply and the other for fuel used for NS Block
3 delivery; and
4 • Two new accounts to record revenue related to No. 6 fuel. One for fuel used in
5 emergency energy supply and the other for fuel used for NS Block delivery.
6

7 6. Business Systems

8 Accounts for Business Systems were added in relation to the following:

- 9 • One new account created to differentiate the business system fees that were
10 approved for recovery per Order No. P.U. 27 (2022); and
11 • Two new accounts created to differentiate the business system fees which were
12 approved for recovery from the remaining business system fees in accordance
13 with Order No. P.U. 27 (2022).
14

15 7. Other

16 In addition, an account was added for following:

- 17 • A new account to capture labor accruals.
18

19 The accounts added to the 2021 system were necessary to comply with various Board orders
20 and will enhance the Company's ability to provide sufficient information to meet the Board's
21 reporting requirements.

1 **Return on Rate Base and Equity, Interest Coverage and Capital Structure**
2

3 **Scope:** *Review the calculation of the return on rate base, return on equity, interest*
4 *coverage ratio, and capital structure.*
5

6 **Average Rate Base**
7

8 The Company's calculation of average rate base is included on Return 3 and the calculation of
9 return on average rate base is included on Return 12 of the annual report to the Board. The
10 return on average rate base for 2021 as filed is 5.46% (2020 – 5.47%).
11

12 Our procedures with respect to verifying the reported average rate base and return on average
13 rate base included:
14

- 15 • agreeing all carry-forward and component data to supporting documentation;
- 16 • checking clerical accuracy of the continuity of the rate base and the return on
17 average rate base; and
- 18 • reviewing the methodology used in determining average rate base and return on
19 average rate base to ensure it is in accordance with Board Orders.

1 Details with respect to Hydro's calculation of average rate base and return on average rate base
2 as filed on Return 3 and Return 12 for 2020 and 2021 are as follows:
3

(000)'s	2021	2020	'21A-'20A
Net capital assets - average	2,149,257	2,123,914	\$ 25,343
Cash working capital allowance	122	1,409	(1,287)
Fuel inventory	55,803	54,075	1,728
Supplies inventory	38,326	38,438	(112)
Average deferred charges	86,402	100,981	(14,579)
Average net assets excluded from rate base	(8,154)	(8,257)	103
Average rate base	\$ 2,321,756	\$ 2,310,560	11,196
Regulated net income	\$ 35,799	\$ 36,028	(229)
Cost of service exclusions	7,108	7,311	(203)
Hydro net interest expense (Note 1)	83,813	83,143	670
Return on Rate Base	<u>\$ 126,720</u>	<u>\$ 126,482</u>	<u>238</u>
Regulated rate of return on rate base	5.46%	5.47%	

Note 1:	2021	2020
Net Interest prior to disallowed portion of debt guarantee	\$ 90,139	\$ 89,491
Debt guarantee fee disallowed	(6,326)	(6,348)
Net interest above	83,813	83,143
Amortization of FX losses	(2,157)	(2,157)
Debt guarantee fee	6,326	6,348
Interest per Revenue requirement	<u>\$ 87,982</u>	<u>\$ 87,334</u>

4
5

6 The increase in net capital assets - average from \$2,123,914,000 in 2020 to \$2,149,257,000 in
7 2021 is primarily due to capital asset additions of \$122.5 million in 2021. Capital expenditures
8 have been examined in more detail in the "Capital Expenditures" section of this report.
9

10 Average deferred charges decreased from \$100,981,000 in 2020 to \$86,402,000 in 2021.
11 Average deferred charges are examined in more detail in the "Deferred Charges" section of this
12 report.
13

14 Average net assets excluded from rate base decreased from \$8,257,000 in 2020 to \$8,154,000
15 in 2021. Average net assets included or excluded from rate base have been examined in more
16 detail in the "Capital Expenditures" section of this report.
17

18 **Based on the results of the above procedures, the calculation of average rate base as**
19 **presented above is in accordance with established practice and Board Orders.**

1 **Return on Rate Base**

2
3 The regulated net income component of the return on rate base excludes all non-regulated
4 earnings and expenses of Hydro. In Order No. P.U. 30 (2019) the Board approved an allowed
5 rate of return on rate base of 5.43% with a range of return of 40 basis points (\pm 20 basis points)
6 for 2019 rate setting purposes. The 2021 return presented above, 5.46%, is within the approved
7 range.

8
9 **Based on the results of completing our procedures, we can advise that no discrepancies**
10 **were noted, therefore conclude that the calculation of the 2021 return on rate base is in**
11 **accordance with established practice.**

1 **Return on Equity**
2

3 The Company's calculation of regulated average equity and rate of return on regulated average
4 equity for the year ended December 31, 2021 is included on Return 13 of the annual report to
5 the Board.
6

7 Similar to the approach used to verify the rate base and return on average rate base, our
8 procedures in this area focused on verification of the data incorporated in the calculations and
9 on the methodology used by the Company. Specifically, the procedures which we performed
10 included the following:
11

- 12 • agreed all carry-forward data to supporting documentation, including audited financial
13 statements and internal accounting records where applicable;
- 14 • agreed component data (dividends, regulated earnings, etc.) to supporting
15 documentation;
- 16 • checked the clerical accuracy of the continuity of regulated common equity; and
- 17 • recalculated the rate of return on common equity for 2021 and ensured it was in
18 accordance with established regulatory practice.
19

20 Details with respect to Hydro's calculation of return on regulated average equity as filed in
21 Return 13 is as follows:
22

(000)'s	2021	2020
Shareholder's equity		
2021	\$ 561,826	
2020	518,920	\$ 518,920
2019		475,579
	540,373	497,250
Average equity		
Regulated earnings	35,799	36,028
Cost of service exclusions	7,108	7,311
	42,907	43,339
Return on equity	7.94%	8.72%

23 The "regulated" shareholder's equity of Hydro excludes the portion of equity attributable to non-
24 regulated operations. Details with respect to Hydro's calculation of regulated shareholder's
25 equity is filed in Return 13.
26

27 **As a result of completing our procedures, we did not note any discrepancies in the**
28 **calculation of regulated average equity and rate of return on regulated average equity.**

1 Interest Coverage

2
3 In 2013, Hydro changed the calculation of its 2013 interest coverage to the Standard & Poor's
4 ("S&P") EBITDA interest coverage methodology. The S&P methodology calculates interest
5 coverage as earnings before interest, taxes, depreciation, and amortization ("EBITDA") divided
6 by interest. The EBITDA calculation is considered a proxy for cash earnings by S&P.

7
8 S&P's definition of interest includes the gross amount of interest, including capitalized interest
9 but excluding interest income. It also includes interest on employee future benefits as well as
10 accretion.

11
12 Interest coverage for 2021 under the S&P methodology has been calculated at 1.99 times (2020
13 – 2.04 times).

14
15 Cost of debt was calculated on Return 15 at 4.75% in 2021 compared to 4.73% in 2020.

16
17 Hydro utilized its \$300.0 million government promissory note program to fulfill its short-term
18 funding requirements. As at December 31, 2021, there were two promissory notes outstanding
19 for a total of \$55.0 million with a maturity date of January 10, 2022 bearing an average interest
20 rate of 0.20% (2020 - \$262.0 million bearing an interest rate of 0.17%). Upon maturity, the
21 promissory notes were reissued.

22
23 Additionally, Hydro maintains a \$200.0 million CAD or USD equivalent committed revolving term
24 credit facility maturing on July 27, 2021, which was increased to \$500.0 million on April 16,
25 2021, and extended to reflect a new maturity date of July 31, 2022. As at December 31, 2021,
26 there were no amounts drawn on the facility (2020 - \$nil). Borrowings in CAD may take the form
27 of Prime Rate Advances, Bankers' Acceptances (BAs), and letters of credit, with interest
28 calculated at the Prime Rate or BA fee. Borrowings in USD may take the form of Base Rate
29 Advances and letters of credit. The facility also provides coverage for overdrafts on Hydro's
30 bank accounts, with interest calculated at the Prime Rate. Hydro's committed credit facility with
31 its banker of \$300.0 million matured during the year and was not renewed.

1 **Capital Structure**

2
3 Details with respect to the capital structure as filed on Return 14 for 2020 and 2021 are as
4 follows:

5

(000)'s	2021	%	2020	%
Debt	1,897,000	74.1%	1,836,000	74.8%
Employee benefits	88,000	3.4%	84,000	3.4%
Asset retirement obligation	14,000	0.5%	14,000	0.6%
Equity	562,000	21.9%	519,000	21.2%
	<u>\$ 2,561,000</u>		<u>\$ 2,453,000</u>	

6
7
8 Prior to 2009, Hydro's debt to equity ratio had been trending towards the 80:20 target ratio with
9 2008 showing a ratio of 81.4:18.6. In 2009, Nalcor provided a \$100 million equity injection of
10 contributed capital resulting in a significant reduction in leverage to a ratio of 72.0:28.0.
11 Currently, the Company's target corporate capital structure is comprised of 75% debt and 25%
12 common equity for regulated operations. In order to maintain this target ratio, the Company
13 implemented the following dividend policy:

14
15 *"Corporation annually on or before March 31 of each year, pay a dividend on its common shares*
16 *if the percentage of debt to debt plus equity in the capital structure of the corporation on a*
17 *regulated basis at the end of the immediately preceding fiscal year was less than 75% and that*
18 *the amount of the dividend in that case will be equal to the amount that would be necessary to*
19 *bring the percentage of debt to debt plus equity up to 75% at December 31st of the immediately*
20 *preceding year, as if the dividend in question had been on that date."*

21
22 **The 2021 ratio was approximately 74.1% (2020 – 74.8%) debt (excluding employee benefits**
23 **and asset retirement obligation) and 21.9% (2020– 21.2%) equity. According to Hydro, the**
24 **corporate regulated capital structure used in the calculation of the regulated dividend is**
25 **based on an S&P rating agency methodology which differs from the calculation of the capital**
26 **structure as reported in Return 14. No regulated dividends were paid in 2021. The S&P**
27 **calculation of debt within the capital structure includes accrued interest, asset retirement**
28 **obligations and post-retirement benefit obligations.**

Revenue Requirement

Scope: Conduct an examination of depreciation, fuel, power purchased, operations and administration expenses, and interest based on information provided by Hydro.

The following table provides a breakdown of the revenue requirement for the years 2018 to 2021, including variances between 2021 and 2020:

(000)'s	Actuals 2021	Actuals 2020	Actuals 2019	As Restated 2018	Variances 2021-2020
Depreciation	88,548	84,403	87,569	77,417	4,145
Fuel	171,857	159,932	223,928	176,440	11,925
Power purchased	65,914	76,118	84,944	71,181	(10,204)
Other costs					
Salaries and fringe benefits	109,631	112,276	115,745	113,180	(2,645)
System equip. maint.	21,820	20,491	22,882	23,947	1,329
Insurance	4,412	3,785	3,507	3,221	627
Transportation	3,644	3,059	3,087	3,422	585
Office supplies and expenses	2,082	2,288	2,243	2,351	(206)
Bldg. rentals and maint.	932	911	979	905	21
Professional services	7,560	7,330	7,422	6,600	230
Travel	1,591	1,500	2,403	2,392	91
Equipment rentals	2,285	2,739	3,597	3,859	(454)
Miscellaneous	4,276	7,475	5,329	5,021	(3,199)
Other (income) and expense	2,800	2,540	7,068	1,769	260
Cost deferrals/Revenue deficiency	-	-	(52,568)	-	-
GRA and supply deferral adjustments	-	-	6,779	-	-
Sub-total	161,033	164,394	128,473	166,667	(3,361)
Allocations					
Hydro capitalized	(32,413)	(29,679)	(32,883)	(30,251)	(2,734)
Cost Recoveries	243	1,337	(1,323)	(1,121)	(1,094)
Sub-total	(32,170)	(28,342)	(34,206)	(31,372)	(3,828)
Total	128,863	136,052	94,267	135,295	(7,189)
Accretion of ARO	77	289	338	357	(212)
Interest	87,981	87,336	91,877	90,323	645
Regulated earnings ¹	35,799	36,028	22,423	21,541	(229)
Revenue requirement	\$ 579,039	\$ 580,158	\$ 605,346	\$ 572,554	\$ (1,119)

Note 1: Regulated earnings presented above excludes cost of service exclusions.

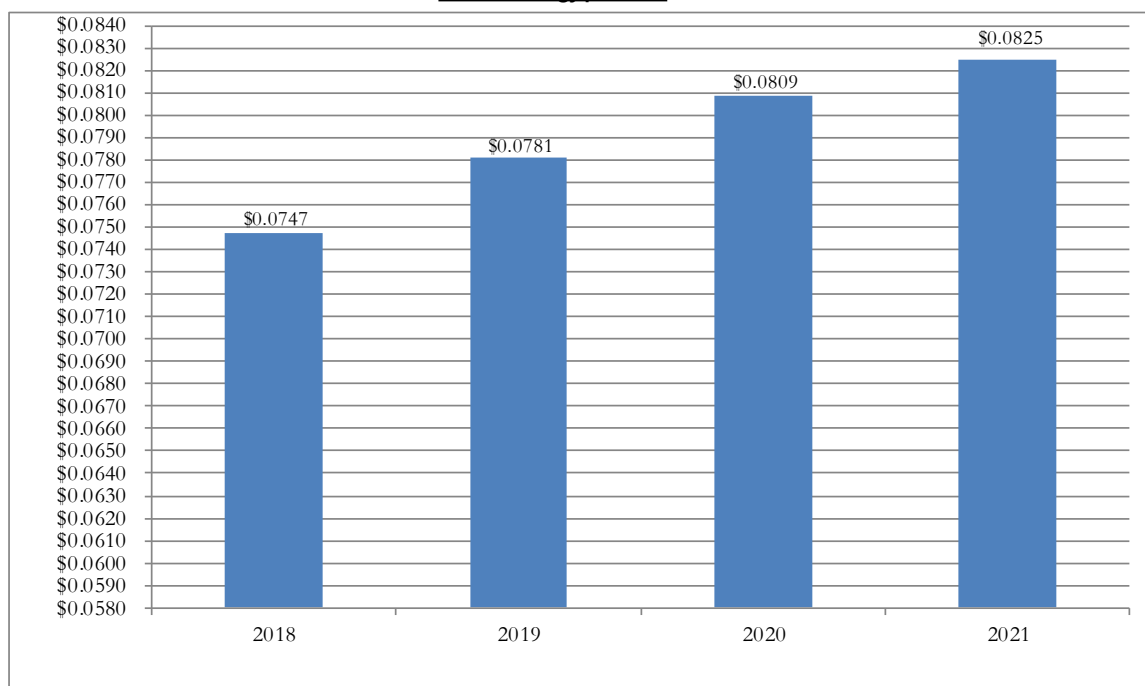
As noted in the above table, the net impact on regulated earnings for 2021 was a decrease over 2020 of \$229,000. This decrease was primarily attributable to an \$11.9 million increase in fuel expenses, an increase in depreciation expenses of \$4.1 million, and a \$1.3 million increase in system equipment maintenance. The impact of this decrease in regulatory earnings was partially offset by a decrease in power purchased of \$10.2 million.

Costs per kWh Analysis

In the table and graph below we have provided an analysis of the breakdown of the cost of energy on the basis of the number of kWhs sold for the years 2018 to 2021:

(000)'s									
Year	kWh sold and used	Depreciation	Fuel	Purchased Power	Other Costs	Interest & Accretion	Regulated Earnings	Total Cost of Energy	Cost per kWh
2018	7,665,000	\$ 77,417	\$ 176,440	\$ 71,181	\$ 135,295	\$ 90,680	\$ 21,541	\$ 572,554	\$ 0.0747
2019	7,751,000	\$ 87,569	\$ 223,928	\$ 84,944	\$ 94,267	\$ 92,215	\$ 22,423	\$ 605,346	\$ 0.0781
2020	7,173,000	\$ 84,403	\$ 159,932	\$ 76,118	\$ 136,052	\$ 87,625	\$ 36,028	\$ 580,158	\$ 0.0809
2021	7,019,000	\$ 88,548	\$ 171,857	\$ 65,914	\$ 128,863	\$ 88,058	\$ 35,799	\$ 579,039	\$ 0.0825

Cost of Energy per kWh

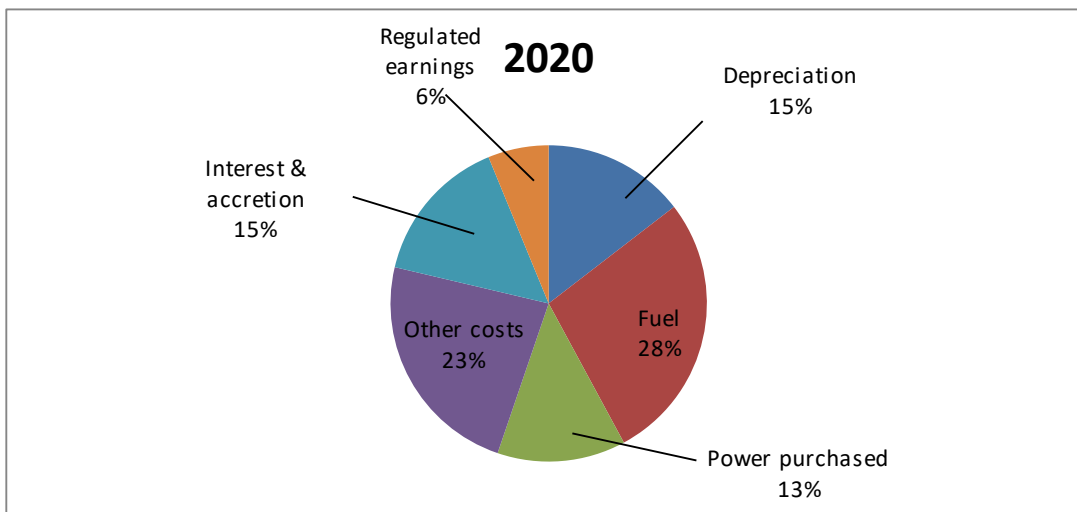
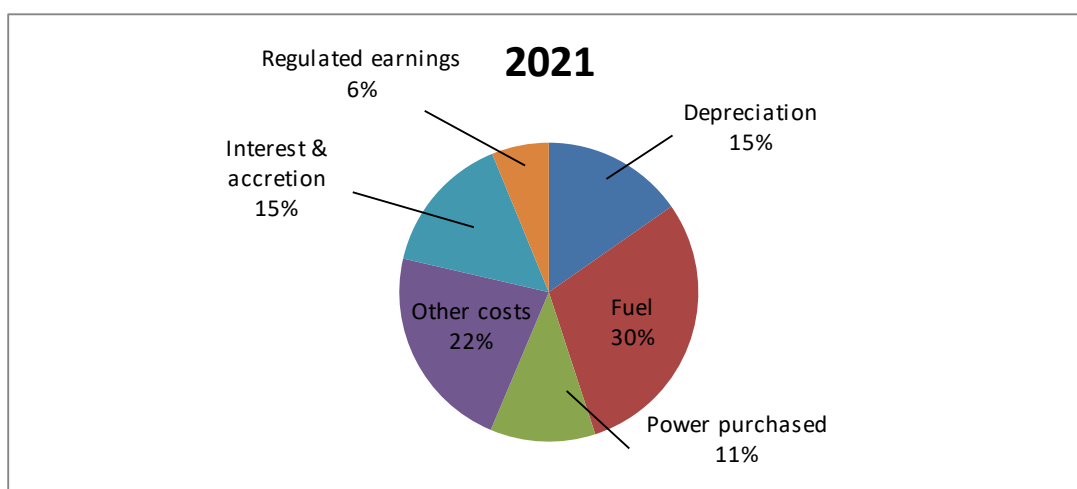


Year over year % change: 0.5% 4.6% 3.6% 2.0%

As highlighted in the graph above, the cost per kWh increased in 2021. In 2021, the cost of energy sold on the basis of the number of kWhs sold was \$0.0825 per kWh which represented a 2.0% increase over 2020.

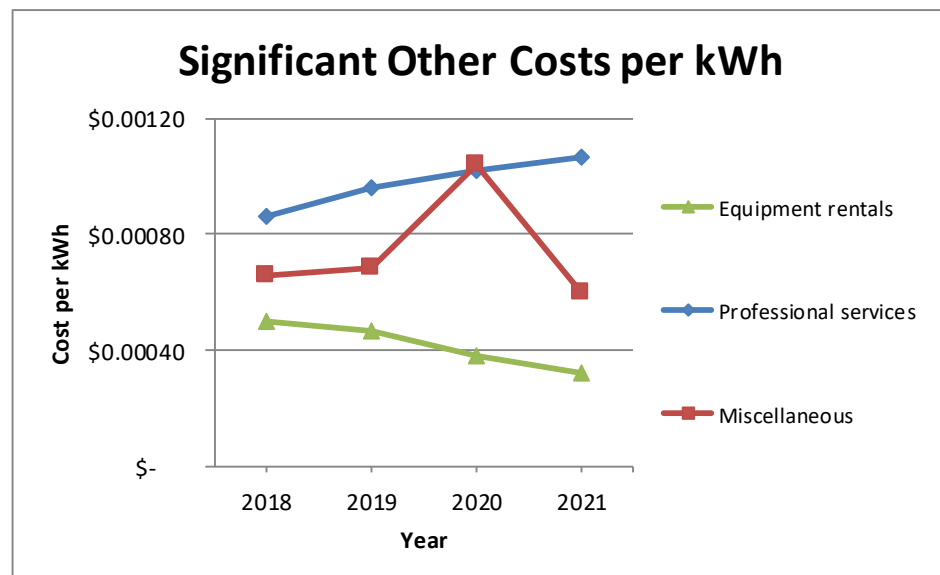
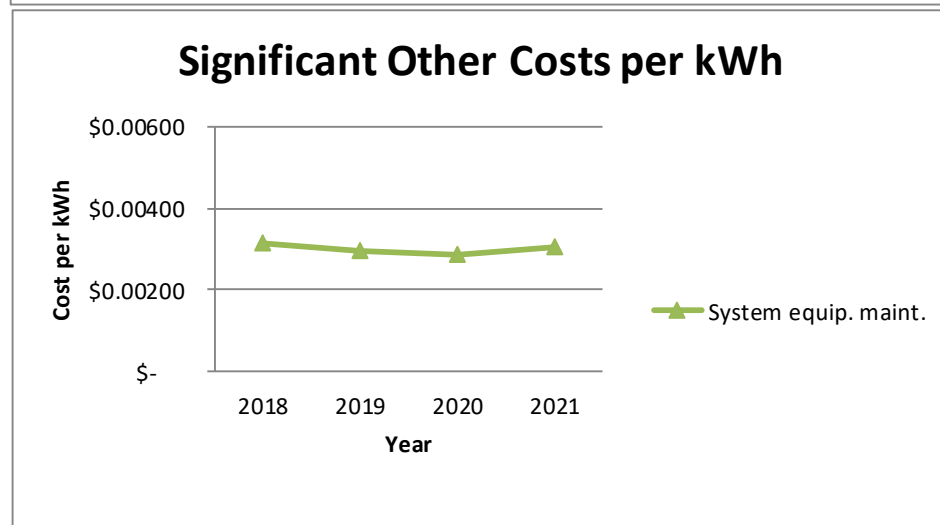
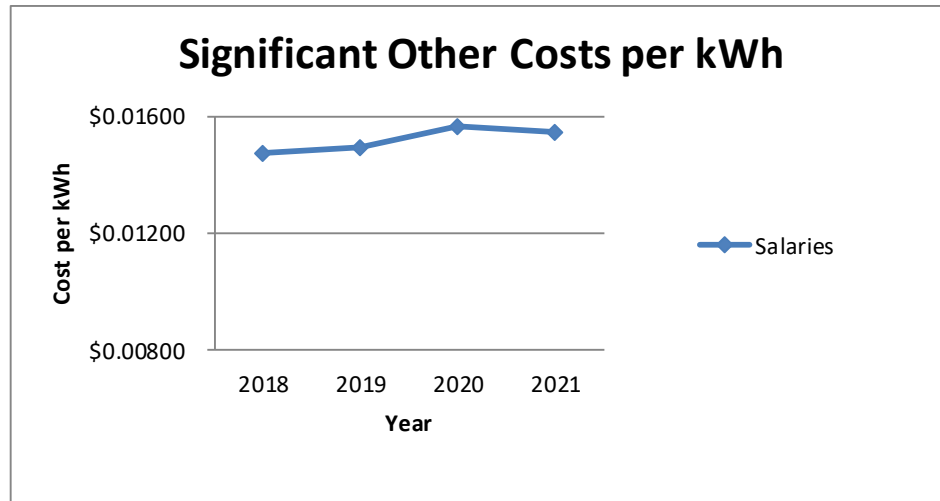
The following table and charts provide a further breakdown of the expense per kWh by expense category for the years 2020 and 2021:

	2021			2020		
	7,019,000			7,173,000		
	Cost (000)'s	Cost per kWh	% of Total	Cost (000)'s	Cost per kWh	% of Total
kWh sold and used						
Depreciation	\$ 88,548	\$ 0.0125	15.29%	\$ 84,403	\$ 0.0117	14.55%
Fuel	171,857	0.0245	29.68%	159,932	0.0223	27.57%
Power purchased	65,914	0.0094	11.38%	76,118	0.0106	13.12%
Other costs	128,863	0.0184	22.25%	136,052	0.0190	23.45%
Interest & accretion	88,058	0.0125	15.21%	87,625	0.0122	15.10%
Regulated earnings	35,799	0.0051	6.18%	36,028	0.0050	6.21%
Total	\$ 579,039	\$ 0.0825	100.00%	\$ 580,158	\$ 0.0809	100.00%



1 Explanations for the significant fluctuations within each of these cost categories are discussed
 2 further in this report.

3
 4 An analysis of the most significant accounts within “other costs” for the years 2018 to 2021 has
 5 been provided below in the following graphs:



In the first graph, cost of salaries and fringe benefits per kWh have decreased 1.5% in 2021 over 2020. The second graph shows the cost per kWh for system equipment maintenance has increased by approximately 7.4%. The third graph shows professional services costs per kWh has increased by 4.1%, miscellaneous expense per kWh decreased by 42.3% and equipment rentals per kWh decreased by 15.8%.

As previously mentioned, we have reviewed the various expense categories in more detail on an individual basis and our observations and comments are noted further in this report for your consideration.

Fuels

Fuel expense in 2021 totaled \$171.9 million compared to \$159.9 million in 2020. The increase in fuel expense from 2020 levels was approximately \$11.9 million, or 7.5%. The breakdown of costs within the fuel category is noted below for the years 2018 to 2021:

(000)'s	2021	2020	2019	2018	Var 21-20
No.6 Fuel	\$97,761	\$142,440	\$196,106	\$149,745	(\$44,679)
Fuel Additives	486	-	281	368	\$486
Fuel Costs Indirect	78	202	144	144	(\$124)
Environmental Handling Fee	22	24	4	48	(\$2)
Ignition Fuel	210	263	313	342	(\$53)
Gas Turbine Fuel	2,372	871	1,463	3,578	\$1,501
Diesel Fuel Rural	13,115	12,603	16,575	17,368	\$512
Rate Stabilization Plan (RSP)	33,266	56,870	34,252	9,160	(\$23,604)
Supply Cost Deferrals (Note 1)	17,782	(54,949)	(29,600)	(22,007)	\$72,731
Firm Energy Power Purchase Deferral	-	-	1,475	-	-
Holyrood CT	6,766	1,608	2,915	17,694	\$5,158
	<u>\$171,857</u>	<u>\$159,932</u>	<u>\$223,928</u>	<u>\$176,440</u>	<u>\$11,926</u>

Note 1: The Supply Cost Deferrals amount for 2021 includes costs for the following deferral accounts:

- Holyrood Conversion Deferral for period from January 1, 2021 to October 31, 2021;
- Revised Energy Supply Deferral costs from January 1, 2021 to October 31, 2021;
- Isolated Systems Deferral costs for the year ended December 31, 2021;
- Holyrood Thermal Generating Station Fuel Cost Deferral variance for the months of November and December 2021; and
- Other Island interconnected System Supply cost variance for the months of November and December 2021.

Prior to 2021, the Supply Cost Deferrals included the activity for the Holyrood Conversion Deferral, the Revised Energy Supply Deferral and the Isolated Systems Deferral.

No. 6 Fuel

In 2021, the total cost of No. 6 Fuel, which is the largest component of fuel expense, decreased by \$44.7 million from 2020. According to Hydro, this decrease is primarily due to a decrease in volume of No. 6 fuel of \$36.6 million (2021 - 1.2 million barrels; 2020 - 1.7 million barrels) and a decrease in price of \$8.0 million (2021 - \$75.16/barrels; 2020 - \$84.62/barrels).

1 **Gas Turbine Fuel**

2
3 According to Hydro, the increase of \$1.5 million from 2020 to 2021 noted in Gas Turbine Fuel is
4 primarily a result of an increase in volume of litres of gas turbine fuel (2021 – 2.6 million litres;
5 2020 – 1.0 million litres).

6
7
8 **Rate Stabilization Plan (“RSP”) (the “Plan”)**

9
10 In Order No. P.U. 33 (2021), the Board approved the Supply Cost Variance Deferral Account
11 (“SCVDA”) to deal with future supply cost variances on the Island Interconnected System
12 beginning in the month in which Hydro was required to begin payments under the Muskrat Falls
13 Purchase Power Agreement. The approval of the SCVDA discontinued transfers to the Rate
14 Stabilization Plan (“RSP”), effective on implementation date of November 1, 2021. The Board
15 directed that the RSP balances be maintained for the transparent and timely recovery of
16 historical balances. The rules provide for the disposition of historical balances in accordance
17 with the RSP Rules approved by the Board in Order No. P.U. 4 (2022).

18 As such, when comparing the balances in the RSP accounts, 2021 reflects activity in the RSP
19 for 10 months of the year (January 1 until October 31) and the balances in 2020 reflects activity
20 in the RSP for the whole 12-month period.

21
22 A review of the Supply Cost Variance Deferral Account is included later in our report.

23
24 Including RSP adjustments, the cost of No. 6 fuel for 2021 was \$131.0 million compared to
25 \$199.3 million in 2020.

26
27 The variation in the RSP consists of four main components: fuel variation, hydraulic variation,
28 load variation, and Labrador interconnected.

(000)'s	2021	2020	Variance 21-20
Hydraulic Variation	(\$32,260)	(\$19,462)	(\$12,798)
Load Variation	37,060	41,256	(4,196)
Fuel Variation	28,767	35,216	(6,449)
Labrador Interconnected	(301)	(140)	(161)
	<u>\$33,266</u>	<u>\$56,870</u>	<u>(\$23,604)</u>

29
30 The hydraulic production in 2021 contributed negatively to the RSP in the amount of \$32.3
31 million; this negative contribution is \$12.8 million higher than the prior year negative contribution
32 of \$19.5 million:

Hydraulic Variation

Note:	2021	2020	Variance
Average COS Fuel (\$)	\$ 105.90	\$ 105.90	\$ -
Actual Hydraulic Production in kWh (000)'s	3,639,333	4,493,308	
COS Hydraulic Production in kWh (000)'s	3,816,930	4,600,451	
Annual hydraulic production variance in kWh (000)'s	(177,597)	(107,143)	(70,454)
Hydraulic variation (000)'s	\$ (32,260)	\$ (19,462)	\$ (12,798)

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Notes:

1. Holyrood conversion factor in COS is 583 kWh/bbl (2020 - 583 kWh/bbl).
2. This number has been calculated on a monthly basis.

A decrease in hydraulic production of 178 GWh in 2021 under the Cost of Service ("COS") has led to total losses to the plan of \$32.3 million.

Load Variation

The load variation for 2021 contributed positively to the Plan in the amount of \$37.1 million. The load variation is primarily the result of the load requirements of the industrial customers being 268 GWh lower than the COS load requirement.

Fuel Variation

The fuel variation is calculated using the actual cost per barrel of No. 6 fuel relative to the COS price applied to the number of barrels of fuel consumed. The calculation of this fuel variation is provided in the table below:

Fuel Variation

	2021	2020	Variance
Actual barrels adjusted for non-firm sales (000)'s	936	1,655	(719)
Average Actual Fuel per Barrel	\$ 75.16	\$ 84.62	
Average COS Fuel per Barrel	\$ 105.90	\$ 105.90	
Annual fuel price variance	\$ 30.74	\$ 21.28	\$ 9.46
Fuel Variation (000)'s	1	\$ 28,767	\$ 35,216
		\$ (6,449)	

	(000)'s Production	Average Price	(000)'s Variance
Fuel Price Variance	936	\$ 9.46	\$ 8,855
Volume Variance	(719)	\$ 21.28	\$ (15,305)
Annualized calculated variance	2		\$ (6,450)

1 This number has been calculated on a monthly basis.

2 Calculation is done on an annualized basis for comparison purposes and will lead to slight differences from a monthly basis.

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The table above shows that the actual average fuel price for No. 6 fuel in 2021 was \$30.74 per barrel less than the average COS fuel price. The actual barrels consumed during 2021 decreased by approximately 719,000 barrels in comparison to the actual barrels consumed in 2020. This decrease in fuel prices, in addition to a decrease in the number of barrels consumed, resulted in a positive fuel variation of approximately \$28.8 million to the Plan in 2021 compared to a \$35.2 million fuel variation in 2020. The change in the fuel price variation, in addition to the change in fuel consumption, led to a decrease in the RSP fuel component of \$6.45 million (calculated on a monthly basis) for 2021 compared to 2020. As shown above, the decrease in actual fuel costs, relative to the COS, led to a positive fuel price variance of approximately \$8.9 million compared to 2020. This positive fuel price variance was offset by a negative volume variance of approximately \$15.3 million, for a combined variance of \$6.45 million (there is a slight difference when the calculation is done on an annualized basis in comparison to a monthly basis).

1 **Supply Cost Deferral Accounts**

2
3 In 2021, the Supply Cost Deferral accounts increased by \$72.7 million, broken down as follows:

4 **Notes:**

5 ('000)

	2021	2020	Variance	Note
Holyrood Conversion Deferral	(1,898)	407	(2,305)	1
Isolated Systems Deferral	2,552	4,026	(1,474)	2
Holyrood Thermal Generating Station Fuel Cost Variance	26,880	-	26,880	3
Energy Supply Deferral	(12,971)	(59,382)	46,411	4
Island Interconnected System Supply Deferral	3,219	-	3,219	5
Total Energy Supply Deferral	17,782	(54,949)	72,731	

- 6 1. The Holyrood conversion deferral ended October 31, 2021. According to Hydro, the variance of
7 \$2.3 million is due to the change in the efficiency rates year over year. In 2021, the efficiency rate
8 was lower (569) compared to the test year rate (583) resulting in a credit in fuels expense relating
9 to supply cost deferrals to offset the impact of additional fuel consumed. In 2020, the efficiency
10 rate was higher (586) compared to the test year rate (583) resulting in a debit in fuels expense
11 relating to supply cost deferrals to offset the impact of less fuel consumed.
- 12 2. The Isolated Systems Deferral variance is primarily due to a higher average cost of isolated
13 supply components in 2021 compared to 2020. The average cost in 2021 of \$0.23 when
14 compared to the test year average cost of \$0.27 resulted in a debit in fuels expense relating to
15 supply cost deferrals to offset the lower costs. The average cost in 2020 of \$0.21 when compared
16 to the test year average cost of \$0.27 resulted in a debit in fuels expense relating to supply cost
17 deferrals to offset the lower costs.
- 18 3. The Holyrood Thermal Generating Station Fuel Cost Variance commenced November 1, 2021 in
19 accordance with Order No. P.U. 33 (2021) and is a component of the SCVDA. Holyrood fuel costs
20 were lower in 2021 (298,885 bbls at an average rate of \$86.83/bbl) compared to the test year
21 (484,739 bbls at an average rate of \$105.90/bbl) resulting in a debit to fuels expense relating to
22 supply cost deferrals to offset the lower fuel costs.
- 23 4. The Energy Supply Deferral consists of 10 months activity in 2021 and 12 months in 2020. The
24 variance of \$46.4 million is primarily due to a lower credit in the deferral in 2021 compared to
25 2020. In 2021, thermal, domestic, and off-Island purchases from January to October, 2021 (1,037
26 GWh) were lower than test year (1,190 GWh) resulting in a credit in fuels expense relating to
27 supply cost deferrals to offset the higher No. 6 fuel costs incurred as a result of lower energy
28 purchased. In 2020, thermal, domestic, and off-Island purchases from January to December, 2020
29 (1,137 GWh) were lower than test year (1,532 GWh) resulting in a credit in the fuels expense
30 relating to supply cost deferrals to offset the higher No. 6 fuel costs incurred as a result of lower
31 energy purchased.
- 32 5. The Island Interconnected System Energy Supply account commenced as at November 1, 2021
33 in accordance with Order No. P.U. 33 (2021) and is a part of the calculation for the SCVDA. The
34 variation is primarily due to lower cost of off-Island purchases compared to test year.
35

36 **Holyrood Combustion Turbine**

37
38 According to Hydro, the increase of \$5.2 million from 2020 to 2021 noted in the Holyrood
39 Combustion Turbine ("CT") account is primarily due to an increase in volume of Holyrood CT

1 (2021 – 8.9 million litres; 2020 2.0 million litres) of \$5.6 million, partially offset by a decrease in
 2 price of \$0.4 million (2021 - \$0.76/litre; 2020 - \$0.81/litre).

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Power purchased

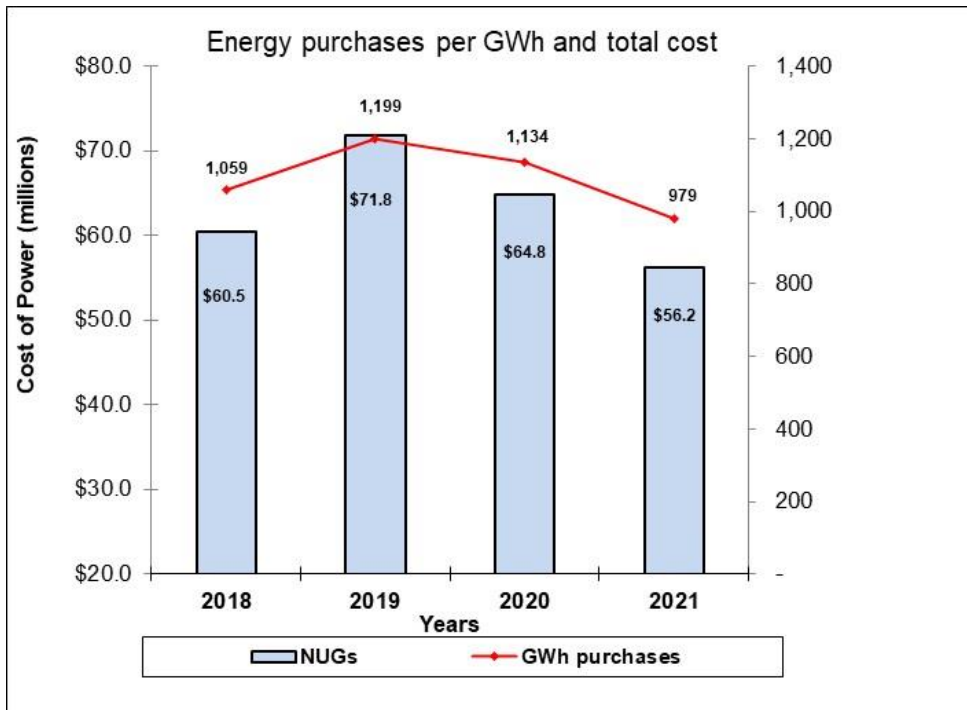
The breakdown of power purchased by account is as follows:

(000)'s	2021	2020	2019	2018	Var 21-20
Energy Costs - NUGS	\$53,932	\$53,042	\$53,709	\$56,363	\$890
Demand & energy - CF(L)Co	1,507	1,441	1,390	1,468	66
L'Anse au Loup	2,964	2,346	3,033	3,328	618
Island wheeling	741	748	768	772	(7)
Transmission rental	386	1,429	1,406	357	(1,043)
Power purchase cost variance account	-	-	265	517	-
CBPP Firm Energy	-	-	1,322	-	-
Secondary energy	343	2,119	1,605	472	(1,776)
Ramea Wind	60	77	88	113	(17)
Ramea Hydrogen	-	-	10	(5)	-
Interruptible: Curtailable	3,685	3,158	3,226	3,658	527
Maritime Link	2,295	11,758	18,122	4,138	(9,463)
subtotal	\$65,914	\$76,118	\$84,944	\$71,181	(\$10,204)
Muskrat falls power purchase	57,449	-	-	-	57,449
Purchase Power Agreement Deferral	(39,877)	-	-	-	(39,877)
Power purchase expense recognition	(2,750)	-	-	-	(2,750)
Accounting deviation (reclassified)	(14,822)	-	-	-	(14,822)
subtotal	-	-	-	-	-
Total	\$ 65,914	\$76,118	\$84,944	\$71,181	\$(10,204)

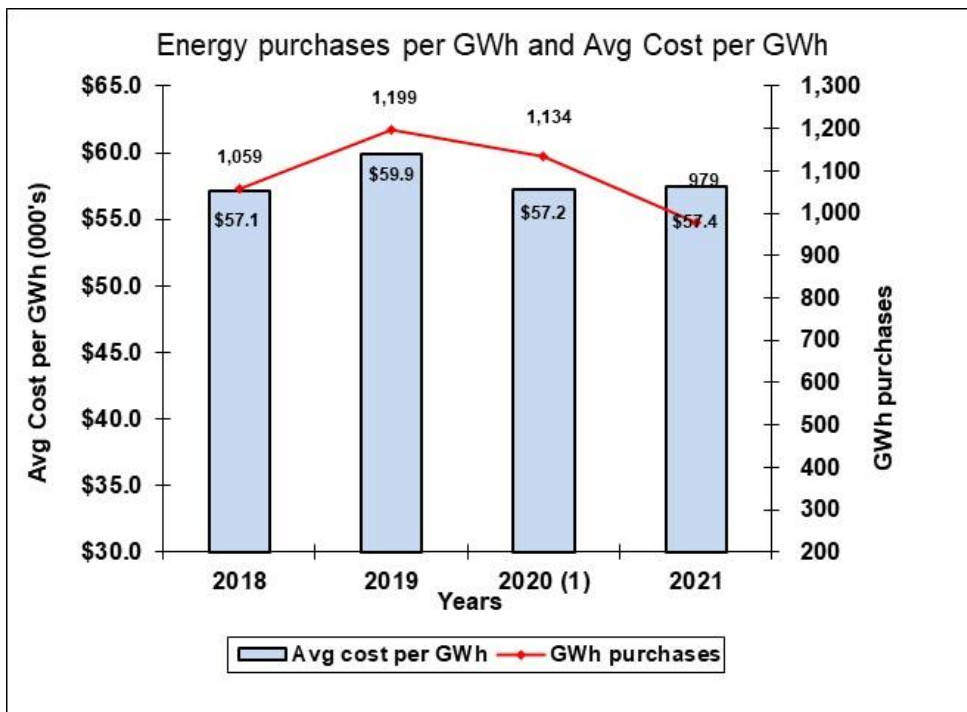
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Energy purchases from Non-Utility Generators (“NUGs”) represents a significant component of purchased power. The following graphs depict the changes in energy purchases, including the Maritime Link, in terms of GWh and total costs followed by the changes in energy purchases in terms of GWh and cost per GWh over the period of 2018 to 2021:

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Note: 2018 to 2020 GWh purchases have been revised from prior years' reporting to exclude secondary and other purchases which were included in error. The 2018 to 2021 table presented includes costs and GWh purchased for NUGs and Maritime Link.

1 As shown in these charts, in 2021, the average cost per GWh purchased from NUGS and the
2 Maritime Link was approximately \$57,400 per GWh, compared to \$57,200 in 2020.

3
4 Transmission rental decreased by \$1.04 million from 2020 to 2021. According to Hydro, this
5 decrease was primarily due to decreased transmission expenses in 2021 related to the lowered
6 import of energy over the Maritime Link because of the availability of energy from Muskrat Falls.

7
8 According to Hydro, Secondary Energy dropped by \$1.8 million from 2020 to 2021 due to a 22
9 GWh decrease in energy purchased from Corner Brook Pulp and Paper Limited (“CBPP”) in
10 2021 compared to 2020. The Power Purchase Agreement under the CBPP Secondary Energy
11 Agreement is take-or-pay and relies on CBPP's operations. Most of this difference pertains to
12 November 2020 due to the amount of secondary energy available.

13
14 Maritime Link purchases fell by \$9.5 million from 2020 to 2021. Hydro attributed this change to
15 decreased activity in 2021. In 2020, significant energy imports were needed to replace thermal
16 production due to the unavailability of the Labrador-Island Link. In 2021, energy from Muskrat
17 Falls reduced the need for imports over the Maritime Link.

18
19 In 2021, the total expenditure for power purchases from Muskrat Falls was \$57.4 million,
20 beginning with the delivery of energy to the Island in July 2021. These costs are deferred for
21 regulatory purposes for 2021 due to the approval of the Power Purchase Agreement deferral,
22 Power Purchase Expense Recognition, and Accounting Deviation accounts in Order No. P.U.
23 33 (2021). The Muskrat Falls Power Purchase Agreement deferral includes costs that are
24 deferred under the Supply Cost Variance Deferral Account of \$39,877,000. In Order No. P.U. 9
25 (2021) and Order No. P.U. 33 (2021), the Board approved Hydro's proposal to deviate from
26 IFRS to allow recognition of expenses related to the purchase of energy in accordance with the
27 commercial terms of the Muskrat Falls Power Purchase Agreement. As at December 31, 2021,
28 IFRS power purchase expenses were \$14,822,000 higher during Muskrat Falls pre-
29 commissioning and \$2,750,000 million higher during post-commissioning than commercial
30 payments which resulted in the deferral of a regulatory asset of \$17.6 million.

31
32 The other components of this expense category are less significant and therefore no further
33 analysis was conducted.

Salaries and fringe benefits

Analysis of Gross Payroll Costs

Gross payroll costs for 2021 were \$109,631,000, a decrease of \$2,664,000, or 2.4%, in comparison to 2020.

These fluctuations are outlined in the table below which summarizes salaries and fringe benefits costs incurred from 2018 to 2021:

(000)'s	2021	2020	2019	2018	Var 21-20
Salaries	\$ 72,623	\$ 71,987	\$ 74,204	\$ 74,841	\$ 636
Other salary costs	(227)	5,247	2,039	3,132	(5,474)
Intercompany salaries	(363)	(103)	160	(8)	(260)
	<u>72,033</u>	<u>77,131</u>	<u>76,403</u>	<u>77,965</u>	<u>(5,098)</u>
Allowances	2,171	2,034	2,269	2,319	137
Directors fees	55	59	69	38	(4)
Overtime	13,470	11,413	12,498	11,824	2,057
Employee future benefits	6,994	7,140	9,023	6,837	(146)
Fringe benefits	12,069	11,763	12,426	11,547	306
Group insurance	2,657	2,573	2,893	2,486	84
Labrador travel benefit	183	164	164	164	19
	<u>\$ 109,631</u>	<u>\$ 112,276</u>	<u>\$ 115,745</u>	<u>\$ 113,180</u>	<u>\$ (2,644)</u>

The increase in salaries of \$636,000 over 2020 is primarily due to non-union progression increases as well as union salary increases. In 2021, Hydro's operation and office staff bargaining units ratified their collective agreements resulting in wage increases.

The decrease in other salary costs of \$5,474,000 over 2020 is primarily due to variations in estimates for anticipated salary increases as a result of collective bargaining of \$1.4 million, reversal of general economic increase estimates of \$0.7 million recorded in 2020 resulting in a variance of \$1.3 million, variation in termination costs of \$0.7 million, decreased vacation accrual of \$0.6 million, and the elimination of performance contract payments of \$0.8 million. During the 2020 Annual Financial Review, it was initially stated that the variance in other salary costs was due to termination-related expenses. However, the Company has since clarified that this variance also included anticipated salary increases from collective bargaining and general economic factors.

The increase in overtime of \$2,057,000 over 2020 is primarily due to lower activities across various operational departments in 2020 caused by COVID-19 pandemic protocols. Work plans increased in 2021 to mitigate work not completed in 2020.

1 The breakdown of the salaries category by division is as follows:

2

(000)'s	2021	2020	2019 ¹	2018	Var 21-20
Executive Leadership	\$ 1,702	\$ 1,617	\$ 1,715	\$ 1,859	\$ 85
Hydro Finance	5,067	5,443	5,462	5,558	(376)
Engineering	14,522	14,264	13,599	12,915	258
Transmission Operations	24,320	24,215	26,061	28,068	105
Production Operations	17,381	16,888	18,630	19,034	493
Regulatory Affairs & Customer Service	10,976	10,983	10,836	8,352	(7)
Recharged salaries	(1,345)	(1,423)	(2,099)	(945)	78
	<u>\$ 72,623</u>	<u>\$ 71,987</u>	<u>\$ 74,204</u>	<u>\$ 74,841</u>	<u>\$ 636</u>

3 Note 1: Restated to adopt to current year's presentation

4

5 According to Hydro, the decrease in salaries for Hydro's Finance division of \$376,000 over 2020
 6 is primarily a result of the internal transfer of Accounts Payable full-time equivalents from the
 7 regulated Finance department to the shared service Accounts Payable team in the non-
 8 regulated Finance department, and increased vacancy experience. Hydro Finance experienced
 9 a higher rate of vacancy in 2021 due to increased attrition – a result of a combination of internal
 10 factors such as compensation, as well as broader market trends of increased resignation rates
 11 coming out of the COVID-19 pandemic, increasingly competitive job markets due to growth in
 12 other sectors, and competition beyond the local market due to the emergence of remote work.

13

14 According to Hydro, the increase in Production Operations salaries of \$493,000 over 2020 is a
 15 result of decreased vacancy experience in 2021, and an increase in the number of Thermal
 16 Plant Operators to ensure system reliability due to prior vacancies, COVID-19 pandemic, and a
 17 reliance on retirees. Hydro experienced a significantly higher rate of vacancy in 2020 due to a
 18 combination of the impact of the COVID-19 pandemic on operations, hiring decision delays, and
 19 the evaluation of vacant positions to be eliminated through attrition. Union ratification covering
 20 2019–2021 included both wage increase as well as retroactive pay which was incurred in 2021.

21

22 The below matrix illustrates a scale for salary increases and bonuses based on performance
 23 ranging from 0 - 6.5% for non-union employees. The compensation matrix allows for pay
 24 adjustments above the revised job rate based on an employee's "rating of performance".
 25 Ratings of performance include Unacceptable, Improvement Required, Meets Expectations,
 26 Exceeds Expectations, and Exceptional.

27

Rating of Performance	Scale Adjustment - Below Scale Maximum	
	2021	2020
Exceptional	6.5% (to the scale maximum)	6.5% (to the scale maximum)
Exceeds Expectations	5.5% (to the scale maximum)	5.5% (to the scale maximum)
Meets Expectations	Up to 4% (to the scale maximum)	Up to 4% (to the scale maximum)

1 As noted by the Company, all salary adjustment figures are calculated as a percentage of
2 current base salary. All salary adjustments are subject to the scale maximum.

3
4 As part of the Compensation Program changes in 2018, the re-earnable cash payments were
5 eliminated from the Matrix from 2019 onwards. Re-earnable cash payments were lump sum
6 merit payments issued to employees who were at 100% of their scale and thus did not receive a
7 salary increase as part of the Salary Administration process/Merit Compensation Matrix.

8
9 Changes in recognition for Exceeds and Exceptional categories which were communicated in
10 2018 were implemented in the 2019 Matrix and continued in 2020 and 2021. The 2018
11 performance year was the first year of the two-year consecutive high-performance eligibility for
12 employees in the Exceeds and Exceptional categories. Employees who had consecutive high
13 performance in 2018 and 2019 performance years would have the opportunity to progress
14 beyond 100% of the scale to a maximum of 110% of the scale in 2020. Performance Contract
15 eligible employees are also eligible based on two consecutive years of Exceeds or Exceptional
16 ratings to progress up to 110% of the scale in 2020. However, effective October 1, 2021, in
17 order for employees to progress beyond 100% of pay scale (job rate) for their position they must
18 achieve two years of consecutive high performance. Performance Contract eligible employees
19 includes executives and a limited number of other senior managers. Executive salary
20 progression along defined executive salary scales is at the discretion of the CEO and requires
21 approval by the Board.

22
23 All scale adjustments were halted due to Order in Council OC2021-127. This order instructs
24 Nalcor Energy's Board to eliminate performance-based pay and incentive programs from 2021,
25 and to freeze compensation increases for non-unionized employees, including executives,
26 managers, staff, and contractors.

1 Net Full-Time Equivalents (“FTE”)

2
3 The table below is a detailed comparison of the average number of net FTE employees by
4 division for 2018 to 2021. As shown, in comparison to 2020 the total net FTEs for 2021
5 increased by one full time position.
6

	2021	2020 (1)	2019	2018	Var 21-20
Executive Leadership	9	9	9	10	0
Hydro Finance	59	63	64	66	(4)
Engineering	137	134	126	119	3
Transmission Operations	279	284	321	319	(5)
Production Operations	193	190	211	212	3
Corporate Services & Regulatory Affairs	115	111	99	102	4
	792	791	830	828	1

7 (1) Please note that the 2020 FTEs were restated following the release of our 2020 Annual Financial Review of the
8 Company. We have updated the above figures to reflect the Company's restated FTEs.

9 Hydro provided the following explanations for significant variances noted in net FTE positions
10 when comparing the number of FTEs in 2021 to those in 2020:

- 11
- 12 • The decrease of four FTEs in Hydro Finance is primarily due to a higher level of
13 vacancy, the transfer of Accounts Payable to the shared service Accounts Payable
14 department in non-regulated Hydro and one tax position transferred to non-regulated
15 Hydro in January 2021.
- 16
- 17 • The increase of three FTEs in Engineering is primarily due to an increase in Co-op
18 Engineers to support development in key engineering disciplines.
- 19
- 20 • The decrease of five FTEs in Transmission Operations is primarily due to vacancy
21 positions.
- 22
- 23 • The increase of three FTEs in Production Operations is primarily due to general
24 movement as well as an increase in the number of Thermal Plant Operators to ensure
25 system reliability due to prior vacancies, COVID-19 pandemic impacts, and reliance on
26 retirees.
- 27
- 28 • The increase of four FTEs in Corporate Services & Regulatory Affairs is primarily due to
29 an increase in Technicians for the development program.

1 Average salary costs per net FTE for 2018 to 2021 are included in the following table:
2

	2021	2020	2019	2017
Salary costs, including temporary salaries (000's)	\$ 72,623	\$ 71,987	\$ 74,204	\$ 74,841
Intercompany salaries (000's)	(363)	(103)	160	(8)
Total salary costs (000's)	72,260	71,884	74,364	74,833
Net FTE*	792	791	830	828
Average salary per net FTE	\$ 91,237	\$ 90,877	\$ 89,574	\$ 90,345
% increase (decrease)	0.4%	1.5%	-0.9%	-0.3%

*FTEs presented are net of capital recharge FTEs

3
4
5 The above analysis indicates that the Company experienced a 0.4% increase in average salary
6 per net FTE for 2021. Fluctuations in average salary per net FTE are expected each year due to
7 the effect of capital recharge activity from year to year.

8 9 Executive salaries

10
11 During 2016, Hydro underwent changes to their organizational structure, whereby a separate
12 executive team was formed, and certain common costs were transferred to Nalcor to be
13 recovered through an administration fee.

14
15 The salaries of the executives of Nalcor were recharged back to Hydro via the Intercompany
16 Salary account, with billing rates designed to cover salary, benefits, and vacation of the
17 executives. According to Hydro, Executive Salaries Charged to Regulated Hydro during 2021
18 were as follows:

	2021
VP Churchill and Muskrat Falls	\$ 13,000
VP Chief Legal Officer and Corporate Secretary	33,000
VP People and Corporate Affairs	36,000
VP Chief Financial Officer	30,000
<u>Grand Total</u>	<u>\$ 112,000</u>

19
20
21
22 The table below outlines the executive salaries by position, including the annual salary, salary
23 earned, performance contract, gross salary, and benefits for 2021.

	Annual Salary¹	Salary Earned	Redundancy Pay	Performance Contract²	Retroactive Earnings	Vacation Pay	Gross Salary	Benefits	Total
VP Hydro Operations	\$ 220,000	\$ 33,000	\$ -	\$ -	\$ 762	\$ -	33,762	4,651	38,413
VP Hydro Engineering & NLSO	\$ 225,000	\$ 104,437	\$ -	\$ 15,772	\$ 1,514	\$ -	121,723	19,358	141,081
VP Reg & Stakeholder Relat.	\$ 240,000	\$ 204,615	\$ -	\$ 42,214	\$ 1,385	\$ -	248,214	43,570	291,784
President and CEO	\$ 285,000	\$ 285,000	\$ -	\$ 63,950	\$ -	\$ -	348,950	54,543	403,493
VP Chief Lgl Office & Corp Sec.	\$ 225,000	\$ 182,008	\$ -	\$ -	\$ 1,385	\$ -	183,393	39,605	222,998
VP Chief Financial Officer	\$ 250,000	\$ 223,462	\$ -	\$ 46,963	\$ 1,038	\$ -	271,463	45,925	317,388
VP, People & Corporate Affairs	\$ 210,000	\$ 29,458	\$ -	\$ -	\$ 3,197	\$ -	32,655	4,490	37,145
VP Engineering(Former)	\$ 215,000	\$ 146,365	\$ -	\$ 48,548	\$ -	\$ 31,974	226,887	140,004	366,891
Corp.Secretary & Gen.Counsel (Former)	\$ 200,000	\$ 7,692	\$ -	\$ 43,186	\$ -	\$ 2,872	53,750	107,462	161,212
VP Reg. Affairs & Customer Ser (Former)	\$ 220,001	\$ -	\$ 220,000	\$ -	\$ -	\$ -	220,000	33,238	253,238
VP Trans& Distribution. & NLSO (Former)	\$ 215,000	\$ 183,577	\$ 31,423	\$ 48,562	\$ -	\$ 12,294	275,856	58,884	334,740
Total	2,505,001	1,399,614	251,423	309,195	9,281	47,140	2,016,653	551,730	2,568,383

¹Annual salary at December 31, 2021

²Performance contract payments are based on the previous year's performance

1 Capitalized salaries

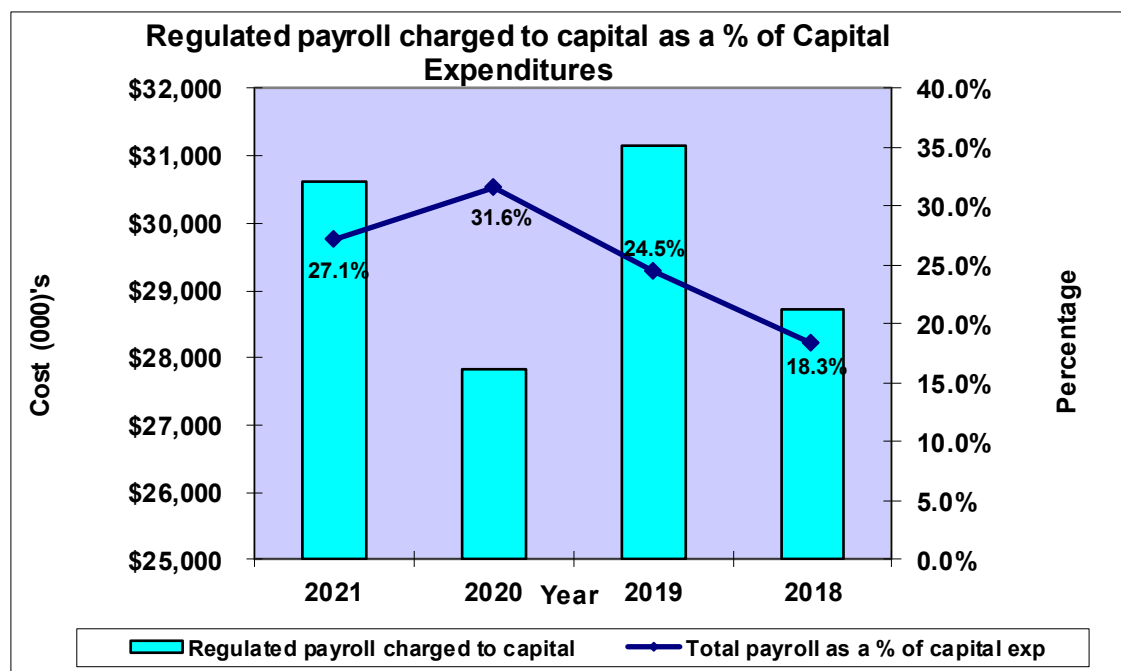
2
3 Capitalized salaries include the salaries and benefits of the Company's employees whose time
4 is charged directly to capital projects. The gross payroll costs for 2018 to 2021 were allocated to
5 operations and capital as follows:
6

(000)'s	2021	2020	2019	2018	Var 21-20
Payroll charged to operating	\$ 79,000	\$ 84,441	\$ 84,589	\$ 84,465	\$ (5,441)
Payroll charged to capital	30,631	27,835	31,156	28,715	2,796
	\$109,631	\$ 112,276	\$ 115,745	\$ 113,180	\$ (2,645)

7
8
9
10 The Company's 2021 capitalized payroll increased by \$2,796,000, or 10%, from 2020. The amount
11 of capitalized salaries can vary widely from year-to-year depending on the type of capitalized
12 projects and the requirement for workforce versus machine power. The percentage of capital
13 salaries in relation to the amount of capital expenditures can also fluctuate from year-to-year.

14
15 The following table and graph illustrate the relationship between payroll charged to capital and
16 capital expenditures for the period 2018 to 2021:

(000)'s	2021	2020	2019	2018
Capital expenditures ¹	\$113,000	\$88,000	\$127,000	\$157,000
Regulated payroll charged to capital	30,631	27,835	31,156	28,715
Total payroll as a % of capital exp	27.1%	31.6%	24.5%	18.3%



¹ Balance includes both regulated and non-regulated costs

As noted from the table above, the percentage of capital salaries in relation to the amount of capital expenditures can fluctuate significantly from year-to-year.

As noted in the table below capitalized salaries consists of two sub-categories of costs; capital salaries and capital overtime.

(000)'s	2021	2020	2019	2018	Var 21-20
Capital salaries	\$ 24,228	\$ 22,553	\$ 24,421	\$ 22,857	\$ 1,675
Capital overtime	6,403	5,282	6,735	5,858	1,121
	\$ 30,631	\$ 27,835	\$ 31,156	\$ 28,715	\$ 2,796

The \$2.8 million increase in capital salaries and overtime from 2020 was a result of an increase in both capital salaries and capital overtime mainly relating to work plan revisions in 2020 due to the impact of COVID-19 pandemic restrictions and protocols. According to Hydro, capital work was limited in 2020 as Operational departments were completing only critical work and limiting

1 travel, resulting in reduced salary costs in 2020. In 2021, as some COVID-19 pandemic
2 restrictions and protocols were reduced or eliminated, capital work increased across
3 Engineering, Transmission and Rural Operations – Island and Labrador, Holyrood Thermal
4 Generating Station, and Hydro Generation resulting in increased capital salary costs in 2021.

5
6
7 **System equipment maintenance**

8
9 In 2021, system equipment maintenance costs increased by approximately \$1,329,000 over
10 2020. The following table summarizes system equipment maintenance costs incurred from 2018
11 to 2021 by sub-category.

12

(000)'s	2021	2020	2019	2018	Var 21-20
Maintenance	\$ 8,196	\$ 7,935	\$ 9,114	\$ 9,396	\$ 261
Contract Labour	11,784	10,663	11,909	12,831	1,121
Contract Materials	(74)	2	47	12	(76)
	<u>19,906</u>	<u>18,600</u>	<u>21,070</u>	<u>22,239</u>	<u>1,306</u>
Tools and operating supplies	435	315	413	438	120
Freight expense	547	503	476	347	44
Lubricant, gases & chemicals	880	1,034	886	883	(154)
Direct purchases	52	38	37	40	14
	<u>\$ 21,820</u>	<u>\$ 20,491</u>	<u>\$ 22,882</u>	<u>\$ 23,947</u>	<u>\$ 1,329</u>

13
14
15 The total maintenance material, contract labour and contract materials costs in 2021 increased
16 by \$1,306,000 from 2020.

1 Maintenance costs are incurred throughout all divisions with the majority of costs incurred in the
 2 Transmission Operations and Production Operations divisions. The following table provides a
 3 breakdown of Maintenance costs by division for 2020 and 2021:
 4
 5

(000)'s	2021	2020	Var 21-20
Executive Leadership	\$ 0	\$ 1	\$ (1)
Hydro Finance	533	896	(363)
Engineering	491	489	3
Transmission Operations	8,483	8,521	(38)
Production Operations	10,384	8,460	1,923
Regulatory Affairs & Customer Service	15	234	(219)
	<u>19,906</u>	<u>18,600</u>	<u>\$ 1,306</u>

6
 7 The following tables provide a departmental breakdown of maintenance costs in both the
 8 Transmission Operations and Production Operations divisions for 2020 and 2021, respectively:
 9

Transmission Operations

(000)'s	2021	2020	Var 21-20
TRO Central	\$ 1,268	\$ 1,088	\$ 181
TRO Northern	323	435	(112)
TRO Labrador	2,139	2,003	136
T&D Services	4,743	4,984	(241)
System Operation	9	11	(2)
	<u>\$ 8,483</u>	<u>\$ 8,521</u>	<u>\$ (38)</u>

Production Operations

(000)'s	2021	2020	Var 21-20
Gas Turbines	\$ 901	\$ 932	\$ (31)
Hydro Production	1,609	1,147	462
Thermal Production	7,874	6,382	1,492
	<u>\$ 10,384</u>	<u>\$ 8,460</u>	<u>\$ 1,923</u>

10
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 17

Hydro provided the following explanations for significant variances in Transmission and Production operations:

- The increase in maintenance expenses of \$181,000 in Transmission and Rural Operations (“TRO”) Central is primarily due to an increase in the materials related to corrective maintenance that were required in 2021 verses 2020.

- 1 - The decrease in maintenance expenses of \$112,000 in TRO Northern and the increase
2 in maintenance expenses of \$136,000 in TRO Labrador is primarily due to the
3 reclassification of maintenance expenses related to southern Labrador from TRO
4 Northern to TRO Labrador in 2021.
- 5
- 6 - The decrease in maintenance expenses of \$241,000 in T&D Services is primarily due to
7 a reduction in contract labour as in-house resources were used for the live line program
8 verses external consultants which were used in 2020.
- 9
- 10 - The increase in maintenance expenses of \$462,000 in the Hydro Production department
11 was primarily due to the deferral of projects in 2020 as a result of COVID-19 restraints
12 which resulted in higher maintenance expenses in 2021. The work plan was reduced to
13 critical work only in 2020.
- 14
- 15 - The increase in the maintenance expenses of \$1,492,000 in the Thermal Production
16 department is primarily due to the thermal plant life extension condition assessment
17 (\$0.5 million), an increase in boiler maintenance contract costs (\$0.3 million), costs
18 associated with the emergency repairs to the Unit 1 cold reheat line and the Unit 3 boiler
19 tube repair (\$0.4 million), as well as costs associated with the waste treatment plant
20 cleaning (\$0.1 million), which is required every four years.

1 **Professional services**

2
3 Professional services costs for 2021 totaled \$7,560,000 which reflects an increase of
4 approximately \$230,000, or 3.1%, from 2020. A breakdown of the cost categories within
5 professional services for 2018 to 2021 is outlined below.
6

(000)'s	2021	2020	2019	2018	Var 21-20
Consultants	\$4,698	\$3,950	\$4,140	\$4,240	\$748
PUB Related Costs	1,166	1,886	1,921	1,030	(720)
Software Acquisitions & Maintenance	1,696	1,495	1,361	1,330	201
	\$7,560	\$7,330	\$7,422	\$6,600	\$230

7
8
9 According to Hydro, the decrease in Public Utilities Board (“PUB”) related costs of \$720,000 in
10 2021 was primarily due to higher costs incurred in 2020 related to the inclusion of i) amortized
11 costs associated with the 2017 General Rate Application (“GRA”) of \$400,000, ii) Cost of
12 Service review expense of \$150,000, and iii) the Network Additions Policy expense of \$208,000.
13 Additionally, expense accruals related to 2020 were higher than required and reversed in 2021
14 leading to a reduction in expenses for 2021, totaling \$187,000. The decreases from 2020 and
15 accrual reversals in 2021 are partially offset by the PUB Annual Assessment being higher in
16 2021 compared to 2020 by \$122,000.

17
18 Consultants’ fees, which represent the largest portion of total professional fees, were
19 approximately \$4.7 million in 2021. The table below summarizes these fees by department for
20 both 2021 and 2020.
21

(000)'s	2021	2020	Var 21-20
Executive Leadership	\$215	\$309	(\$94)
Hydro Finance	43	47	(4)
Engineering	576	1,176	(600)
Transmission Operations	28	139	(111)
Production Operations	1,722	832	890
Regulatory Affairs & Customer Service	2,114	1,447	667
	\$4,698	\$3,950	\$748

22
23
24 Hydro provided the following explanations for significant variances in consultants’ fees:

- 25
26
27 - The decrease of \$600,000 for the Engineering department from 2020 is primarily due to
28 the reduction in work related to the Reliability and Resource Adequacy Review
29 proceeding and work related to the creation of Technology Strategy and Roadmap as

part of Hydro's initiative to improve efficiency and effectiveness in 2020. In addition, there was also no requirement for legal support for this department in 2021.

- The \$111,000 reduction for the Transmission Operations department is mainly because in-house resources were utilized instead of the higher-cost external consultants used in 2020.
- The increase of \$890,000 for the Production Operations department is primarily due to an increase in consultant costs in Thermal Generation as a result of the Holyrood Life Extension Condition Assessment totaling \$700,000 and costs associated with Relative Accuracy Test Audits required for environmental monitoring, resulting in an additional \$200,000 in costs.
- The increase of \$667,000 for the Regulatory Affairs & Customer Service department is primarily due to an increase related to the Ecofitt Energy Conservation Project (\$800,000), partially offset by a decrease in consulting for work related to the GRA and Marginal Cost Study which concluded in early 2021 (\$200,000).

Miscellaneous

Miscellaneous expenses in 2021 decreased by approximately \$3,199,000 in comparison to 2020. A breakdown of the cost categories within miscellaneous expense for 2018 to 2021 is outlined below:

(000)'s	2021	2020	2019	2018	Var 21-20
Business and payroll taxes	\$ 3,850	\$ 4,001	\$ 3,842	\$ 3,687	\$ (151)
Bad debt expense	(708)	2,903	390	106	(3,611)
Staff training	467	219	567	659	248
Write offs	231	19	140	110	212
Employee expenses	233	136	167	171	97
Sundry costs	83	103	109	103	(20)
Diesel fuel Hydro	66	44	82	53	22
Energy management	59	51	30	130	8
Collection fees	5	5	2	2	0
Miscellaneous recoveries	(13)	(5)	-	-	(8)
	<u>\$ 4,276</u>	<u>\$ 7,475</u>	<u>\$ 5,329</u>	<u>\$ 5,021</u>	<u>\$ (3,199)</u>

Hydro provided the following explanations on significant variances:

- The \$3.6 million decrease in bad debt expense in 2021 over 2020 is primarily due to the allowance for doubtful accounts related to a general service customer recorded in 2020. A payment arrangement was made with this customer and the recovery in bad debt expense in 2021 is directly related to the recovery payments made by the customer.
- The \$248,000 increase in staff training is mainly because the 2020 budget wasn't heavily used due to COVID-19 restrictions. The Company focused on mandatory training and

- 1 the Business Continuity Plan that year, resulting in less overall training. In 2021, with
 2 eased restrictions, training plans resumed, causing the rise in expenditures.
- 3 • The \$212,000 increase in write offs is primarily an increase in write offs of obsolete parts
 4 in the Bishop Falls Warehouse in 2021.
 - 5 • The \$97,000 increase in employee expenses is largely due to an increase of overtime
 6 meal allowances for employees of \$43,000, an increase of cooking services/groceries
 7 for Cat Arm, the Granite Canal and Generator Testing operating project of \$27,000, and
 8 relocation and moving expenses at Thermal Operations of \$22,000.

9
10
11 **Other (income) and expenses**

12
13 In 2021, other (income) and expenses totaled \$2,800,000 compared to \$2,540,000 in 2020. A
 14 breakdown of this increase of \$260,000 is provided below:

15

(000)'s	2021	2020	2019	2018	Var 20-19
Net book value of disposed assets	\$ -	\$ -	\$ 47	\$ -	\$ -
Loss of Disposal (net of disposal proceeds)	-	-	4,168	678	-
Other writeoffs	362	136	763	401	226
Other proceeds	-	(4)	-	-	4
Auction fees and expenses	-	-	9	-	-
	362	133	4,987	1,079	229
Foreign Exchange (Gain)/Loss	2,438	2,407	2,081	690	31
	\$ 2,800	\$ 2,540	\$ 7,068	\$ 1,769	\$ 260

16
17
18 The loss of disposal of \$4,168,000 in 2019 relates to the write off the frequency converter as
 19 ordered by the Board in Order No. P.U. 38 (2019).

20
21 The foreign exchange (gain)/loss includes \$2.2 million relating to the amortization of foreign
 22 exchange losses approved in Order No. P.U. 7 (2002-2003).

1 **Other Costs - remaining account groupings**

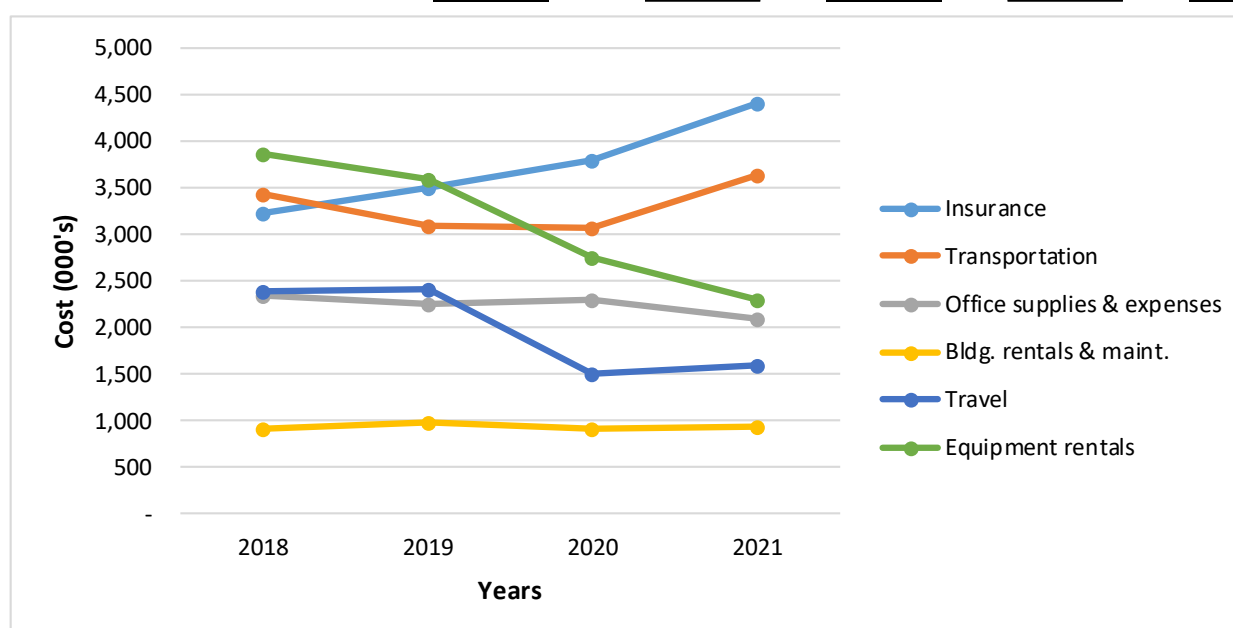
2

3 Variances in the remaining account groupings of Other Costs are detailed in the table and graph

4 below.

(000)'s	2021	2020	2019	2018	Var 21-20
Insurance	\$ 4,412	\$ 3,785	\$ 3,507	\$ 3,221	\$ 627
Transportation	3,644	3,059	3,087	3,422	585
Office supplies & expenses	2,082	2,288	2,243	2,351	(206)
Bldg. rentals & maint.	932	911	979	905	21
Travel	1,591	1,500	2,403	2,392	91
Equipment rentals	2,285	2,739	3,597	3,859	(454)
	<u>\$ 14,946</u>	<u>\$ 14,281</u>	<u>\$ 15,816</u>	<u>\$ 16,150</u>	<u>\$ 665</u>

5



6

7 Hydro provided the following explanations of larger variances in the remaining account
 8 groupings:

9

- 10
- 11
- 12
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- 16
- The increase of \$627,000 in insurance costs is primarily related to the higher premiums on renewal of the insurance policy. The 2020 insurance renewal (July 2020 to June 2021) resulted in an average increase of 20% in insurance costs, while the 2021 insurance renewal (July 2021 to June 2022) resulted in a 7% increase.
 - The transportation cost increase of \$585,000 is primarily due to the increase in fuel price for both vehicle and helicopter fuel as well as increased helicopter usage year over year.

- 1 • The decrease in office supplies and expenses of \$206,000 is primarily due to savings
2 associated with the cellphone contract, and the telephone and fax contracts from 2020 to
3 2021 totaling approximately \$200,000.
4
- 5 • The reduction in equipment rental expense in 2021 of \$454,000 consists of the following:
6
- 7 i. A reduction in Production Operations costs of \$174,000 primarily relating to Holyrood
8 and a decrease in amortization of lease costs for black start diesel generators which
9 was fully amortized in May 2021.
- 10 ii. A reduction in Transmission Operations costs of \$158,000, primarily due to lower
11 rental costs of Doble test equipment in 2021 versus 2020.
- 12 iii. A \$117,000 reduction in Engineering and Technology equipment rentals costs,
13 primarily due to the savings associated with the transition of data services from an
14 Internet Protocol Virtual Network (IPVPN) to Aliant Ethernet (AE) and a change to
15 the rate structure related to the licensing of the Very High Frequency (VHF) radio
16 system and Microwave Radio Transportation Network.

Cost Recovery Charges

Cost (recovery) charges from CF(L) Co. and external sources for 2021 resulted in an overall net charge of \$243,000 compared to a net charge of \$1,337,000 in 2020. The breakdown of cost recovery charges by nature and by division, respectively, is as follows:

(000)'s	2021	2020	2019	2018	Var 21-20
Churchill Falls	\$ (197)	\$ (168)	\$ (62)	\$ (40)	\$ (29)
External	(692)	(926)	(887)	(631)	234
Intercompany Admin Fee	(1,884)	(1,924)	(1,967)	(2,005)	40
Nalcor Admin Fee	5,111	5,015	4,270	3,791	96
Business System Admin Fee	1,450	1,599	2,168	-	(149)
Business Systems Deferral	(1,015)	(1,120)	(2,465)	-	105
CDM Program Cost Deferral	(1,136)	(555)	(1,507)	(1,530)	(581)
Deferred Phase II	(1,207)	(13)	(163)	(55)	(1,194)
Fixed Charge (Recovery)	(480)	(544)	(683)	(624)	64
Removal & Decommissioning Recovery	(276)	-	-	-	(276)
Accounts Payable Allocation	596	-	-	-	596
Intercompany Vehicle Charge (Recovery)	(27)	(27)	(27)	(27)	0
	<u>\$ 243</u>	<u>\$ 1,337</u>	<u>\$ (1,323)</u>	<u>\$ (1,121)</u>	<u>\$ (1,094)</u>

(000)'s	2021	2020	2019	2018	Var 21-20
Hydro Finance	\$ (1,816)	\$ (2,544)	\$ (2,738)	\$ (2,365)	\$ 728
Transmission Operations	134	350	183	(210)	(216)
Production Operations	(1,030)	(26)	(5)	(1)	(1,004)
Regulatory Affairs & Customer Service	(454)	274	(586)	(574)	(728)
Business Systems Admin Fee	1,449	1,599	2,168	-	(150)
Business Systems Deferral	(1,016)	(1,120)	(2,465)	-	104
Information & Operations Technology	-	2,873	2,120	2,029	(2,873)
Engineering	2,975	(70)	-	-	3,045
	<u>\$ 243</u>	<u>\$ 1,337</u>	<u>\$ (1,323)</u>	<u>\$ (1,121)</u>	<u>\$ (1,094)</u>

External recoveries decreased by \$234,000, primarily due to lower recoveries in 2021 from Emera Inc. relating to maintenance support for Bottom Brook and Granite Canal, as well as a variance related to non-firm Labrador interconnection studies. Also, 2020 included recoveries from St. Mary's River Energy Limited for equipment installation/maintenance at Mary's Harbour, Marathon Gold for a system impact study, and Natural Resources Canada for an interconnection study, which did not occur in 2021.

The CDM Program Cost Deferral recovery increased by \$581,000 primarily due to the deferral of consultant costs associated with the Isolated System Community project (\$0.8 million). This is

1 partially offset by a write off of the deferral account for unrecoverable CDM expenses for
2 Labrador Isolated (\$0.3 million).

3
4 Deferred Phase II, also known as “PUB Study Deferral” is comprised of Phase Two of the
5 Investigation and Hearing into Supply Issues and Power Outages on the Island Interconnected
6 System (“Phase Two”) proceeding and the Reliability and Resource Adequacy Study Review
7 (“RRA Study Review”) proceeding. The variance in the PUB Study Deferral account is due to
8 the timing of the deferrals. The below table provides the cost breakdown within the PUB Study
9 Deferral cost recovery account.

(000)'s	2021	2020	2019
Phase Two (Recovery)	-	13	163
RRA Study Review (Recovery)	1,207	-	-
	1,207	13	163

11
12
13 In Order No. P.U. 13 (2016), Hydro received approval to defer consulting fees and salary-
14 related costs relating to the Phase Two proceeding after the interconnection with the Muskrat
15 Falls Hydroelectric Generating Facility. This review concluded in December 2019. The 2019
16 amount was under accrued by approximately \$13,000, resulting in a deferral of \$13,000 in 2020.

17
18 In Board Order No. P.U. 29 (2019), Hydro received approval to defer external regulatory costs
19 associated with the RRA Study Review proceeding. In Order No. P.U. 8 (2021), Hydro received
20 approval to amend the Reliability and Resource Adequacy Deferral Account to include costs
21 related to the assessment to determine the potential longer-term viability of the Holyrood
22 Thermal Generating Station (“Assessment”). The \$1.2 million in 2021 is primarily because of the
23 cost of \$1.0 million associated with the Assessment.

24
25 Starting in 2021, the Accounts Payable department has been designated a common service
26 department. The \$596,000 increase in this account pertains to the fee associated with Hydro’s
27 regulated portion of the accounts payable service.

1 **Interest**

2
3 Net interest increased by approximately \$0.7 million, or 0.08%, in 2021 compared to 2020. The
4 following is a summary of interest expense for 2018 to 2021:

5

(millions)	2021	2020	2019	2018	Var 21-20
Gross interest	\$ 97.4	\$95.2	\$96.2	\$93.4	\$ 2.2
Debt guarantee fee	8.6	8.6	8.6	6.9	-
RSP	(3.2)	(1.9)	1.5	4.2	(1.3)
Other	0.9	(0.2)	(0.2)	(0.1)	1.1
	<u>103.7</u>	<u>101.7</u>	<u>106.1</u>	<u>104.4</u>	<u>2.0</u>
Less:					
Interest earned	14.1	12.9	12.2	11.3	1.2
Interest capitalized during construction	1.6	1.5	2.0	2.7	0.1
	<u>\$ 88.0</u>	<u>\$87.3</u>	<u>\$91.9</u>	<u>\$90.4</u>	<u>\$ 0.7</u>

6
7
8 The overall increase in net interest is mainly attributable to an increase in gross interest and
9 other, partially offset by an increase in interest earned and increase in interest recovery on RSP.

10
11 The increase in gross interest of \$2.2 million is primarily due to an increase in the 2021 issues
12 amount relating to new long-term debt issued by the province of Newfoundland and Labrador on
13 April 13, 2021. The debt has face value of \$300.0 million on Hydro's behalf and matures on
14 June 2, 2030 with a coupon rate of \$1.75% paid annually. This increase in gross interest was
15 partially offset by a decrease in short-term interest relating primarily to lower promissory note
16 interest due to a lower average promissory note balance held throughout 2021.

17
18 The \$1.1 million rise in other interest is mainly due to a \$1.0 million increase in long-term debt
19 accretion.

20
21 The \$1.3 million increase in RSP Interest recovery is due to a higher average RSP balance in
22 2021 compared to 2020.

23
24 Hydro attributes the rise in interest earned mainly to the increase on income from sinking funds.
25 Annual contributions of \$6.65 million to these funds have led to higher earnings.

1 **Depreciation**

2
3 ***Scope: Review Hydro's rates of depreciation and assess their compliance with the***
4 ***depreciation methodology approved in Order No. P.U. 30 (2019). Assess***
5 ***reasonableness of depreciation expense.***
6

7 Our procedures with respect to depreciation were focused on reviewing the rates of depreciation
8 used and assessing its compliance with the depreciation study as approved in Order No. P.U.30
9 (2019). In addition, our procedures included assessing the overall reasonableness of
10 depreciation expense.

11
12 During 2021, Hydro reported depreciation expense of \$88.5 million compared to \$84.4 million in
13 2020 in accordance with the depreciation methodology approved in Order No. P.U. 30 (2019).
14 The 2021 depreciation includes \$83.2 million (\$79.3 million in 2020) in depreciation of property,
15 plant, and equipment and intangible assets, in addition to \$5.3 million related to removal
16 depreciation (\$5.1 million in 2020). A removal depreciation provision is included as a component
17 of the Company's regulated accumulated amortization of its property, plant and equipment in
18 accordance with its depreciation methodology. As at December 31, 2021 the removal
19 depreciation provision is \$17 million.

20
21 In completing our procedures, we recalculated depreciation on a test basis and compared the
22 estimated average service lives used in the calculations to the 2015 Depreciation Study as
23 outlined in the 2017 GRA and approved in Order No. P.U. 30 (2019). We found no exceptions
24 in our testing.

25
26 **Based upon our review and analysis, we report that depreciation expense in 2021 is in**
27 **accordance with Hydro's methodology and in compliance with the approved depreciation**
28 **methodology outlined in Board Order No. P.U. 30 (2019).**

1 Non-Regulated Activity

2
3 **Scope:** *Review Hydro's non-regulated activity, assess the reasonableness of*
4 *adjustments in the calculation of regulated earnings and review how costs are*
5 *allocated between regulated and non-regulated operations.*
6

7 In Order No. P.U. 7 (2002-2003), the Board ordered Hydro to file separate financial statements
8 for regulated and non-regulated activities, including reconciliation to annual consolidated
9 financial statements. Included below are the details of the Company's Non-Regulated Statement
10 of Earnings and Retained Earnings for the years ended December 31, 2018 to 2021.

(000)'s	2021	2020	2019	2018
Revenue				
Energy Sales	\$ 51,231	\$ 53,486	\$ 48,566	\$ 40,396
Other Revenue (Loss)	20,632	20,443	20,679	20,695
	<u>71,863</u>	<u>73,929</u>	<u>69,245</u>	<u>61,091</u>
Operations and Administration				
Net Operating	1,134	1,978	4,045	355
Transmission Rental and Market Fees	20,632	20,443	20,541	20,695
Fuels	21	11	27	31
Power Purchased	46,882	46,806	45,763	39,694
Interest	94	87	(306)	(635)
Other expense and (income)	-	(10)	-	-
	<u>68,763</u>	<u>69,315</u>	<u>70,070</u>	<u>60,140</u>
Net Operating Income	<u>3,100</u>	<u>4,614</u>	<u>(825)</u>	<u>951</u>
Other Revenue				
Equity in CF(L) Co.	41,224	25,820	27,253	24,978
Preferred Dividends	11,204	7,630	7,625	7,994
	<u>52,428</u>	<u>33,450</u>	<u>34,878</u>	<u>32,972</u>
Net Income	<u>\$ 55,528</u>	<u>\$ 38,064</u>	<u>\$ 34,053</u>	<u>\$ 33,923</u>
Retained earnings, beginning of year	\$ 563,077	\$ 537,773	\$ 511,373	\$ 485,445
Net Income	55,528	38,064	34,053	33,923
Dividends	(15,109)	(12,760)	(7,653)	(7,995)
Retained earnings, end of year	<u>\$ 603,496</u>	<u>\$ 563,077</u>	<u>\$ 537,773</u>	<u>\$ 511,373</u>

11 Our review of non-regulated operations included the following procedures:
12

- 13 • assessed the Company's compliance with Order No. P.U. 7 (2002-2003); and
- 14 • compared non-regulated expenses and operations for 2021 to prior years and
- 15 investigated any unusual fluctuations.
- 16

1 Other Revenue of \$20.6 million in 2021 represents the recovery of the Hydro-Quebec (“HQ”)
2 non-regulated transmission costs incurred by Hydro from Nalcor Energy Marketing (“Energy
3 Marketing”). Hydro has service agreements for long-term point-to-point transmission service
4 with HQ. Under the Power Purchase Agreement between Hydro and Energy Marketing, Hydro
5 has assigned its HQ transmission rights to Energy Marketing and Energy Marketing reimburses
6 Hydro for the costs it incurs for the HQ transmission.

7
8 Energy Sales revenue decreased in 2021 from 2020. This decrease was primarily due to a
9 lower volume of firm energy sales, reduced imbalance energy, and lower firm energy sales
10 prices. This was largely a result of lower production levels than planned as well as the warmer
11 weather in 2021 which reduced the industrial customers’ heating and drying energy
12 requirements.

13
14 The decrease in net operating costs related to the Iron Ore Company of Canada (“IOCC”) (BU
15 1952) from 2020 to 2021. The decrease was primarily due to a reduction in the bad debt
16 expense related to IOCC.

17
18 The Company has complied with Order No. P.U. 7 (2002-2003) and has filed separate financial
19 statements for both regulatory and non-regulatory operations for 2021. Based on our review, we
20 conclude that Hydro has appropriately identified and defined its various non-regulated
21 operations and has established appropriate procedures for recording and reporting on these
22 activities. Separate business units for the various non-regulated operations within its financial
23 reporting system were used throughout the year.

24
25 **Based upon our review and analysis, the amounts reported as non-regulated expenses**
26 **are in compliance with Board Orders, including Order Nos. P.U. 7 (2002-2003) and P.U. 14**
27 **(2004).**

1 **Cost Allocations**

2
3 **Scope:** *Review how costs are allocated between the regulated and non-regulated operations including a review of Hydro's labour costing relating to its billing rates.*

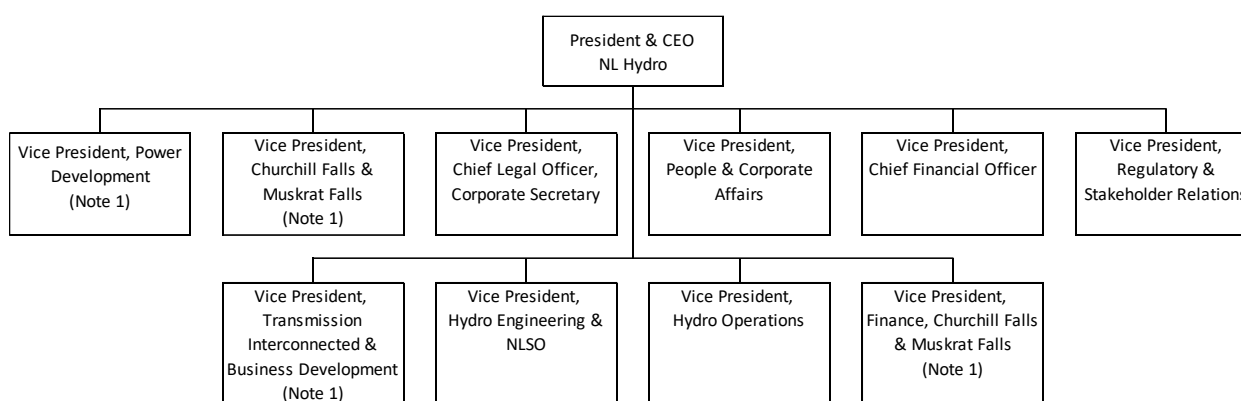
4
5
6
7 In Order No. P.U. 49 (2016), the Board required Hydro to file on or before March 31, 2017 a
8 proposal in relation to annual reporting, starting in 2017, of its intercompany activity, including a
9 description of all services rendered, the cost charged back to and from the affiliates, the
10 amounts involved and the methods used for determining these amounts. The proposal was filed
11 with the Board on March 30, 2017 and Hydro began to file quarterly intercompany transactions
12 reports starting with Q2 of 2017, for the period ended June 30, 2017.

13
14 In Order No. P.U. 49 (2016), the Board also expected that Hydro would address in the next
15 general rate application any impact of the intervening change in organization structure on
16 intercompany charges and policies governing cost recoveries of such charges. As reported in
17 the 2017 GRA there has been no change in the underlying policies that govern intercompany
18 transactions since the 2015 test year.

19
20 We reviewed Hydro's methodology relating to the procedures the Company has in place to
21 allocate costs between regulated and non-regulated operations. We also reviewed how costs
22 are allocated between shared services.

23 **Hydro's Organizational Structure**

24
25
26 The following is a diagram that illustrates Hydro's 2021 organizational structure effective
27 November 2021:



29
30
31 Note 1: Vice President accountable for non-regulated operations.

32
33 On November 2, 2021, Hydro's executive team was reduced from 18 positions down to 11. The
34 remaining team is made up of 10 vice presidents and the CEO. According to Hydro, this change
35 was in support of the June 23, 2021 announcement made by the Government of Newfoundland
36 and Labrador to move Nalcor Energy operations under Hydro.

1
2 **Determination of Billing Rates**
3

4 Bill rates for Hydro and its related companies are determined on a cost recovery basis designed
5 to cover salary, benefits, and vacation. There is no profit margin element to the billing rate.
6 However, charges for external billings do incorporate a profit margin.

7
8 According to Hydro, the time sheet policy / guidelines are as follows:
9

10 All employees (except CF(L) Co. employees) are to prepare weekly time sheets and code all
11 paid hours (i.e. 37.5 or 40 per week) to a work order or to leave. Employees are responsible
12 to record the 37.5 or 40 hour work week, plus any additional overtime and/or premiums.
13 Time sheets are to be completed and submitted no later than the following week.
14

15 The billing rates were developed to include a base wage amount (hourly wage), a variable
16 component, and a fixed charge. The Company's billing rate is derived from a base wage amount
17 and a variable component. The fixed charge is a separate charge based on each hour billed.
18

19 Variable component

20 The Company uses a proxy amount of 68% as the basis to determine bill rates which is
21 calculated as follows: total salary costs and benefits (as described below) are divided by total
22 billable hours. Billable hours are available hours less annual leave, training, sick leave, statutory
23 holidays, or other time associated with paid leave. The ratio of the bill rate to the hourly rate is
24 applied to the various pay grades to determine the charge out rates of employees. The rates
25 were determined using billable hours and were determined in aggregate for the Nalcor group of
26 companies excluding CF(L) Co.
27

28 The following costs were included in the analysis to determine the variable component:

29 **Benefits**

- 30 • Fringe benefit costs, e.g. CPP, EI, Public Service Pension Plan, Group Money Purchase
31 Plan, Prior Service Matched PSPP, WHSCC.
- 32 • Insurances, e.g. Life, A D&D, Medical, Dental.
- 33 • Company costs, e.g. EE future benefits, payroll taxes, bonus, performance contracts,
34 signing bonus.

35 **Leaves**

- 36 • Annual leave, medical travel and appointments, sick leave, training hours, floaters,
37 family leave, compassion leave, jury duty, statutory holiday, union leave, banked
38 overtime.

39 We also selected a sample of employees from the detailed intercompany salary accounts
40 including samples for charges from Nalcor Energy to Hydro, from CF(L) Co. to Hydro, and to
41 various business units from Hydro. The selection of samples included both union and non-union
42 employees.
43

44 Our procedures included:

- 1 • Agreeing hours charged to the summary of inter-corporate transactions provided by
- 2 Hydro.
- 3 • Recalculation of the billing charge in the general ledger as based on the billing rate and
- 4 hours.
- 5 • Assess the reasonableness of the billing rate(s) applied in comparison to the proxy 68%
- 6 variable component.

7

8 The bill rate mark-up of 1.68 has been in effect since January 1, 2016. As of April 23, 2018, the

9 bill rate has been applied to each individual employee hourly rate. Previously for non-union, the

10 bill rate was based on 1.68 times the top of the pay grade.

11

12 During the testing of samples selected, the proxy percentage from the base rate was expected

13 to be precisely 68% for non-union employees as billing rates have been applied to individual

14 hourly rates. The samples tested were at the expected 68% variable component.

15

16

17 **Common Service Costs Allocation**

18

19 Certain departments based in Hydro provide common services to various lines of business of

20 Nalcor. Hydro recovers costs incurred related to these common services through an

21 administration fee. During 2016 and 2017, Hydro transferred certain functions to Nalcor that

22 provided common services to all lines of business. Hydro now incurs a fee for these services

23 from Nalcor.

24

25 The following table provides a breakdown of the administration fees and cost recoveries

26 charged to and from Hydro for 2021, 2020, 2019 and 2018:

27

('000's)	Total				
<u>Costs Incurred (Recovered) by Nature</u>	<u>2021</u>	<u>2020</u>	<u>2019</u>	<u>2018</u>	<u>2021 - 2020</u>
Churchill Falls	(197)	(168)	(62)	(40)	(29)
Intercompany Admin Fee- Hydro	(1,884)	(1,924)	(1,967)	(2,005)	40
Nalcor Admin Fee	5,111	5,015	4,270	3,791	96
Fixed Charge (Recovery)	(459)	(526)	(637)	(504)	67
Nalcor Fixed Charged	(20)	(18)	(45)	(119)	(2)
	\$ 2,551	\$ 2,379	\$ 1,559	\$ 1,123	\$ 172

28

29

1 We address each of the administration's fees in turn.

2
3
4 Hydro Intercompany Administration Fee and CF(L) Co.

5 The following table provides a summary of the intercompany administration fee and cost
6 recoveries charged in Hydro to Nalcor's various lines of business and CF(L) Co. for 2021, 2020,
7 2019 and 2018:

8

Cost Recoveries	2021	2020	2019	2018	2021 - 2020
<u>Intercompany Administration Fee</u>					
Regulated recovery	\$ (1,884,151)	\$ (1,923,850)	\$ (1,966,739)	\$ (2,004,657)	\$ 39,700
<u>Cost recovery</u>					
CF (L) Co.	\$ (196,983)	\$ (168,088)	\$ (62,137)	\$ (40,350)	\$ (28,895)

9
10
11 Intercompany administration fees for 2021 regulated recovery have decreased by \$39,700 and
12 for CF(L) Co. cost recoveries have increased by \$28,895. A further breakdown of these costs by
13 department is provided later in this section in 'Other Lines of Business'.

14
15 The following table provides a breakdown of the 2021 common costs allocated to each line of
16 business, along with comparative data for 2018, 2019 and 2020.

17

Common cost allocation	2021	2020	2019	2018	2021 - 2020
Nalcor divisions (Note 1)	\$ 1,884,151	\$ 1,923,850	\$ 1,966,739	\$ 2,004,657	\$ (39,700)
CF(L) Co.	196,983	168,088	62,137	40,350	28,895
Hydro Regulated	2,479,701	2,526,957	2,507,260	2,368,298	(47,256)
Total common costs allocated	<u>\$ 4,560,835</u>	<u>\$ 4,618,895</u>	<u>\$ 4,536,136</u>	<u>\$ 4,413,305</u>	<u>\$ (58,061)</u>

18 Note 1: Divisions include Oil and Gas, Bull Arm, Exploits, Menihek, Lower Churchill Project and Energy
19 Marketing (non-regulated).

20 The following table provides a breakdown of common costs by department for actual 2021,
21 along with comparative data for 2018, 2019 and 2020:

1

Department / Costs (000's)	Total				
	2021	2020	2019	2018	2021 - 2020
Information Systems	255	288	385	223	(33)
Office space and related costs	3,360	3,498	3,601	3,901	(138)
Network Services	945	833	550	289	112
	\$ 4,560	\$ 4,619	\$ 4,536	\$ 4,413	\$ (59)

	Hydro Regulated				
	2021	2020	2019	2018	2021 - 2020
Information Systems	130	146	196	108	(16)
Office space and related costs	1,868	1,954	2,015	2,119	(86)
Network Services	482	427	296	141	55
	\$ 2,480	\$ 2,527	\$ 2,507	\$ 2,368	\$ (47)

	Other Lines of Business (Note 1)				
	2021	2020	2019	2018	2021 - 2020
Information Systems	125	142	189	115	(17)
Office space and related costs	1,492	1,544	1,586	1,782	(52)
Network Services	463	406	254	148	57
	\$ 2,080	\$ 2,092	\$ 2,029	\$ 2,045	\$ (12)

 2 Note 1: Other lines of business include non-regulated divisions and CF(L) Co.
 3

 4 **Nalcor Administration Fee**

 5 In 2015, Information Systems services were provided by Hydro to all lines of business. Changes
 6 to Hydro's organizational structure were implemented in 2016 resulting in the transfer of these
 7 services from Hydro to Nalcor. In 2016, Nalcor charged Hydro an administration fee for services
 8 provided for Information Systems. In 2017, Hydro specific software acquisition and maintenance
 9 costs were incurred directly by the Information and Operational Technology department in
 10 Hydro. The remaining services associated with Information Systems were provided by Nalcor
 11 and charged to Hydro through an administration fee on an average user basis. In 2018, the only
 12 change on this service cost is due to the addition of new maintenance contracts and support for
 13 Hydro's business operations. Costs included within the Information Systems element of the
 14 Nalcor Admin fee include costs for the day-to-day operations of the Information Technology and
 15 Information Management groups for the organization. Depreciation and amortization associated
 16 with shared software and infrastructure is also included within this component of the fee.
 17

 18 Human Resources services were transferred from Hydro to Nalcor in 2017. The Human
 19 Resources department is responsible for the administration and coordination of all employee
 20 related services. Operating costs incurred in providing Human Resources services are allocated
 21 to Hydro and other lines of business based on a per FTE basis.
 22

 23 Safety and Health services were transferred from Hydro to Nalcor in 2017. The Safety and
 24 Health department is responsible for occupational health services including coordinating
 25 corporate efforts with regard to employee safety, wellness, disability and sick leave
 26 management, and medical screening. Operating costs incurred in providing Safety and Health
 27 services are allocated to Hydro and other lines of business on a per FTE basis.

1 Environment services were provided by Nalcor to Hydro in 2017. The Environment department
 2 is responsible for coordinating corporate efforts with regard to environmental stewardship.
 3 Operating costs incurred in providing Environment services are allocated to Hydro and other
 4 lines of business based on a per FTE basis.

5
 6 The 2021 administration fee charged to Hydro totaled approximately \$5,111,000, compared to
 7 \$5,015,000 in 2020.

8
 9 The following table provides a breakdown of costs by department for actual 2021, along with
 10 comparative data for 2020:

Department / Costs (000's)	2021	2020
Human Resources	\$ 501	\$ 600
Safety and Health	324	305
Environmental	35	52
Information Systems	4,122	3,914
Newfoundland and Labrador System Operator (Note 1)	129	144
	\$ 5,111	\$ 5,015

11
 12 Note 1: NSLO is a department within regulated Newfoundland and Labrador Hydro.

13
 14 **Fixed Charge (Recovery)**

15 According to Hydro, the Fixed Charge (Recovery) is booked to account for the additional cost of
 16 having an employee available for service beyond salary and benefits. The fixed charge recovers
 17 costs originally charged in the administration fee allocation, as well as other employee related
 18 costs described above. The fixed charges netted to a credit of \$459,340 in 2021 compared to a
 19 credit of \$525,964 in 2020.

20
 21 **Nalcor Fixed Charge**

22 In addition to labour costs, a fixed rate will be applied to each hour of regular labour charged to
 23 lines of business. The fixed charge accounts for the additional cost beyond basic salary and
 24 benefits costs of having an employee available to provide service. The fixed charge recovers
 25 costs originally charged in the Business System Administration Fee as well as other employee
 26 related costs. The Nalcor fixed fee netted to a credit of \$20,438 in 2021, compared to a credit of
 27 \$17,594 in 2020.

1 Department Cost Allocations

2
3 According to Hydro, the department/costs included in the determination of the administrative
4 fees charged to Nalcor and other lines of business, along with the allocation basis, is
5 summarized in the following table:

6 Department/ Costs	Allocation Basis
Information systems	Average Users
Office space and related costs	Square footage
Network Services	Average Users

7
8 We address each of the departments/costs allocations in turn.

9 Information Systems

10
11
12 The Information Systems (“IS”) department is responsible for providing assistance and support
13 in the areas of Software Applications, Planning and Integration and Business Solutions,
14 providing maintenance and administration of the corporate wide computer infrastructure and
15 network, and providing technical support. Operating costs incurred in providing IS services are
16 allocated to the lines of business on an average user basis. Depreciation expense and a return
17 on rate base at the weighted average cost of capital (“WACC”) for costs capitalized such as
18 servers and software are allocated to each line of business on an average user basis. Costs
19 specific to a particular line of business are charged to that line of business and are excluded
20 from the determination of shared costs.

21 Office Space

22
23
24 Each line of business occupying floor space at Hydro Place is charged a rental charge. The
25 square footage rental rate reflects the average annual capital and operating cost for Hydro
26 Place as determined by the following formula:

$$27 \text{ Rental Rate} = \text{Hydro Place operating costs} + \text{return on rate base} + \text{annual depreciation} /$$

$$28 \text{ (divided by) Hydro Place total square footage.}$$

29
30
31 According to Hydro, the cost based rental rate includes the following expenses for Hydro Place:

- 32 • Annual depreciation for all common assets.
- 33 • System Equipment Maintenance and operating projects.
- 34 • Expenses relating to salaries, fringe benefits, group insurance and employee future
35 benefits for Office Services, Building Maintenance, and Transportation.
- 36 • Heat & Light.
- 37 • Office Supplies.
- 38 • Postage.
- 39 • Safety Supplies.
- 40 • Consulting expenses related to Hydro Place.
- 41 • Security Card Maintenance Contract.
- 42 • Return on Rate base at WACC for all common assets.

1 In 2021, the cost per square footage rental rate was \$22.03 (2020 - \$22.93) which resulted in a
2 decrease in office space and rental costs recovered.

3
4 Network Services

5
6 In prior years network services were charged through Telephone Infrastructure costs where all
7 lines of business were charged for their share of the following:

- 8
9 1) Local Area Network (LAN) costs divided by the total number of LAN ports to derive a
10 cost per user;
11 2) Telephone costs were divided by the number of telephone, fax, and modem lines to
12 derive a cost per telephone per user; and,
13 3) Mobile devices costs were divided by the number of mobile devices to derive a cost
14 per user.

15
16 The average number of users was the factor used for the allocated costs per line of business.

17
18 Effective 2020 Hydro started charging each line of business using Hydro's network services
19 under one unit charge. In 2020 the total network service costs were divided by the number of
20 users based on the average of FTE, Lotus Notes users, personal computers, and JD Edward
21 users to derive an average cost per user. The average cost per user in 2021 was \$506.11 as
22 compared to \$442.48 in 2020.

23
24 In completing our procedures, we obtained the Company's supporting calculation of its
25 intercompany administration fees charged for 2021. Our procedures included a recalculation of
26 administration fee charged based on the allocation basis included in the table above. We did not
27 note any exceptions in our procedures.

28
29 **As a result of completing our procedures, we report that cost allocations for 2021 are in**
30 **accordance with Hydro's methodology.**

1 Rate Stabilization Plan (“RSP”)

2
3 **Scope: Conduct an examination of the changes to the Rate Stabilization Plan to**
4 **assess compliance with Board orders.**

5
6 Our examination of the RSP for 2021 included reviewing compliance with Board Orders and
7 assessing the charges and credits including financing charges for reasonableness.

8
9 In Order No. P.U.33 (2021) Hydro was directed to file for the approval of revised Rate
10 Stabilization Plan rules to be effective on the date that the Supply Cost Variance Deferral
11 account comes into effect.

12
13 In Order No. P.U. 4 (2022) the Board ordered the discontinuation of the existing RSP rules as of
14 November 1, 2021, and the approval of RSP rules for Balance Disposition with an effective date
15 of November 1, 2021. As a result of the RSP disposition, and the creation of the Supply Cost
16 Variance Deferral Account effective November 1, 2021, there is no Net Hydraulic Production
17 Variation, No.6 fuel Variation or Load Variation subsequent to October 31, 2021.

18
19 The Board ordered that the RSP should be maintained to provide for a transparent and timely
20 recovery of the historical balances, which has resulted in the continuation of the RSP recovery
21 and interest charges for the full 12-month period beyond October. The Supply Cost Variance
22 Deferral Account is examined in the next section of our report.

23
24 The RSP reviewed in this section describes the RSP operations based on 2019 Test Year
25 inputs, which are in accordance with the Order Nos. P.U. 16 (2019) and P.U. 30 (2019).
26 The RSP using 2019 Test Year inputs had an accumulated debit balance or due from
27 customers balance of approximately \$56.488 million at December 31, 2021. The breakdown of
28 the various components included in the 2021 Plan is as follows:

29

	2021		2020	
Utility Customer	\$ 7,503,079	due from customer	\$ 13,454,219	due from customer
Industrial Customer	4,319,655	due from customer	(886,830)	due to customer
Sub-total	11,822,734		12,567,389	
Hydraulic Balance	44,665,085		27,293,551	
Total Plan Balance	\$ 56,487,819		\$ 39,860,940	

30 31 32 **Highlights of the RSP for 2021 include:**

- 33
- 34 • Unfavorable hydraulic conditions contributed to lower hydraulic production relative to the
35 cost of service production resulting in more fuel costs of \$32.3 million. Actual net
36 hydraulic production in 2021 was 3,668.3 GWh in comparison to the cost of service net
37 hydraulic production of 3,816.9 GWh for the period ended October 31, 2021.
 - 38 • The weighted average No. 6 fuel price in 2021 was approximately \$75.16 per barrel in
39 comparison to the 2021 cost of service price of \$105.90 per barrel which resulted in a
40 fuel variation of approximately \$28.8 million due to customers.
 - 41 • The load variation for 2021 contributed positively to the Plan in the amount of \$37.1
42 million. The load variation is primarily the result of the load requirements of industrial
customers being 268 GWh lower than the COS load requirement.

- During 2021, the RSP adjustment for the utility customer resulted in an \$8.8 million refund (See Table B below). The RSP adjustment rate for the utility was 0.598 cents per kWh effective July 1, 2021, as per Order No. P.U. 22 (2021). Prior to July, a rate of (0.188) cents per kWh was used in accordance with P.U. 30 (2019).
- In accordance with Order No. P.U. 6 (2021), the RSP adjustment rate for Industrial customers was (0.4) cents per kWh effective February 1, 2021. Prior to February, the RSP adjustment rate was 0.167 cents per kWh in accordance with Order No. P.U. 8 (2020). For the twelve months ended December 31, 2021, there was \$1,468,494 in recovery (See Table B below)

The tables below provide a breakdown of the activity in the RSP for 2021, as well as a continuity of the various component balances:

2021 RSP activity – Table A

(000)'s	Hydraulic Variation	Fuel Variation	Load Variation	Rural Rate Alteration	Total
Hydraulic balance	\$ 32,260	\$ -	\$ -	\$ -	\$ 32,260
Utility customers	-	(26,741)	(34,449)	(3,479)	(64,669)
Industrial customers	-	(1,947)	(2,509)	-	(4,456)
Labrador Interconnected	(48)	-	-	-	(48)
Net change 2021	\$ 32,212	\$ (28,688)	\$ (36,958)	\$ (3,479)	\$ (36,913)

2021 RSP activity – Table B

(000)'s	Balance Beginning of Year	Current Variation	Current Interest	Hydraulic Allocation	Recovery (Refund)	Transfers (3)	Balance December 31 2021
Hydraulic balance	\$ 27,294	\$ 32,260	\$ 2,390	\$ (17,279)	\$ -	\$ -	\$ 44,665
Utility customers	13,454	\$ (64,669)	676	16,062	(8,848)	50,828 ⁱ	7,503
Industrial customers (1)	1,861	\$ (4,456)	146	1,170	1,468	4,131 ⁱⁱ	4,320
Labrador Interconnected (2)	-	\$ (48)	-	48	-	-	-
Net change 2021	\$ 42,609	\$ (36,913)	\$ 3,212	\$ 1	\$ (7,380)	\$ 54,959	\$ 56,488

(1) The opening balance was adjusted by \$2,747,776 for industrial customers. This was due to a transfer of \$271,092 relating to the 2017 GRA Cost Recovery as at Dec 31, 2020 for Industrial customers, which was approved in Order No. P.U. 6 (2021). An additional transfer of \$2,476,684 to Island Industrial Customers RSP at Dec 31, 2020 was also approved in the aforementioned Board order.

(2) The amount is written off to net income.

(3) Transfers relate to RSP activity which have been approved in the Board Orders noted below.

i) Recovery of Supply Deferrals were approved in Order No. P.U. 15 (2021).

ii) Recover of the supply deferrals was approved in Order No. P.U. 15 (2021) which resulted in a transfer to the Island Industrial Customers RSP Current Plan of \$4,145,931. In addition, Order No. P.U. 6 (2021) approved a credit transfer of \$15,388 to reflect the over collection of the GRA Recovery Rider in February.

1 There were various Orders issued by the Board during 2021 that impacted the operation of the
2 RSP. We have provided highlights of them below:

3
4 **Order No. P.U. 6 (2021)**

5 On February 10, 2021, Hydro filed an application requesting the Board to approve revised
6 Island Industrial Customer rates effective February 1, 2021, reflecting the following:

- 7 i) An alternate forecast of 1,174,603 barrels be used in the calculation of the Industrial
8 Fuel Price Projection and RSP Fuel Rider for 2021.
- 9 ii) A revised Island industrial customer RSP Fuel Rider of (0.823) cents per kWh
- 10 iii) A transfer of the Island Industrial Customer 2017 GRA Cost Recovery Rider balance
11 of \$271,092 as of December 31, 2020, to the Island Industrial Customer 2017 GRA
12 Cost Recover Rider effective January 31, 2021.
- 13 iv) A debit transfer of \$2,476,684 to the island Industrial Customer RSP Current Plan
14 Balance as at December 31, 2020.
- 15 v) An Island Industrial customer one-time bill credit in the amount of \$2,476,684
16 allocated by customer based on 2020 energy ratios and reflected on Island Industrial
17 Customer bills in March 2021.
- 18 vi) A revised Island Industrial Customer RSP Current Plan Adjustment of 0.423 cents
19 per kWh.

20
21 On February 25th, 2021, the Board stated it was satisfied with the above application proposals,
22 and noted it would contribute to rate stability, intergenerational equity, and fairness for
23 customers and approved the application.

24
25 **Order No. P.U. 15 (2021)**

26 On March 31, 2021, Hydro filed an application requesting approval of the allocation of the 2020
27 balances in the Supply Deferral Accounts, totaling approximately \$55.0 million, consistent with
28 the methodologies approved in Board Orders P.U. 16 (2019), P.U. 21(2019) and P.U. 13 (2020).

29
30 On May 12, 2021, the Board approved the following:

- 31 i) The balances in the Revised Energy Supply Cost Variance Deferral Account
32 (“RESCVDA”), the Holyrood Conversion Rate Deferral Account and the Isolated
33 Systems Supply Cost Variance Deferral Account for 2020.
- 34 ii) Hydro’s proposals for the allocation by customer class of the balances in the
35 RESCVDA, the Holyrood Conversion Rate Deferral Account and the Isolated
36 Systems Supply Cost Variance Deferral Account for 2020.
- iii) Hydro’s proposal to recover the amounts allocated to Newfoundland Power and the
Island Industrial customers through a transfer of balances to the respective RSP
Current Plans effective March 31, 2021, with recover from Newfoundland Power and
the Island Industrial customers starting July 1, 2021 and January 1, 2022,
respectively.

Order No. P.U. 22 (2021)

On May 28, 2021, Hydro filed an application of revised Utility rates effective July 1, 2021 reflecting:

- i) An alternate forecast of 447,114 barrels to be used in the calculation of the RSP Fuel Rider;
- ii) a revised RSP Fuel Rider of (0.151) cents per kWh;
- iii) a revised RSP Current Plan Adjustment of 0.749 cents per kWh;
- iv) a revised CDM Cost Recovery Adjustment of 0.031 cents per kWh.

On June 18, 2021, the Board approved the following:

- i) The proposal to use 447,114 barrels of No. 6 fuel in the calculation of the Utility Rate Stabilization Plan Fuel Rider for the period of July 1, 2021 to June 30, 2022.
- ii) The proposed Utility rates to be effective on all electrical consumption on and after July 1, 2021 set out in Schedule A of the Order.

Order No. P.U. 33 (2021)

On July 29, 2021, Hydro filed an application requesting the approval of:

- i) A Supply Cost Variance Deferral Account to become effective on the date upon which Hydro is required to begin payments under the Muskrat Falls Power Purchase Agreement ("Muskrat Falls PPA");
- ii) the discontinuance, on the date of the implementation of the proposed Supply Cost Variance Deferral Account, of the following established deferral accounts:
 - a) Rate Stabilization Plan (RSP);
 - b) RESCVDA;
 - c) Isolated Systems Supply Cost Variance Deferral Account; and
 - d) Holyrood Conversion Rate Deferral Account;

On December 8, 2021, the Board ordered the following:

- i) The proposal to establish an account to defer payments under the Muskrat Falls Project agreements, rate mitigation funding, project cost recovery from customers and supply cost variances is approved, and Hydro is to file for the approval of the Board a Supply Cost Variance Deferral Account definition reflecting the determinations of the Board in this Order, to be effective on the date upon which Hydro is required to begin payments under the Muskrat Fall Power Purchase Agreement.
- ii) The proposals to discontinue the Rate Stabilization Plan, the Revised Energy Cost Variance Deferral Account, the Isolated Systems Supply Cost Variance Deferral Account and the Holyrood Conversion Rate Deferral Account are not approved. Hydro shall file for the approval of the Board revised RSP Rules and RESCVDA and Holyrood Conversion Rate Deferral Account definitions reflecting the determinations of the Board in this Order, to be effective on the same date that the Supply Cost Variance Deferral Account is effective.

Order No. P.U. 4 (2022)

In Order No. P.U. 4 (2022) the Board approved the following with an effective date of November 1, 2021:

- 1 • the Supply Cost Variance Deferral Account;
2 • the RSP Rules for Balance Disposition;
3 • the RESCVDA: Rules for Balance Disposition;
4 • the Holyrood Conversion Rate Deferral Account: Rules for Balance Disposition, and,
5 • the discontinuance of the existing rules of the RSP, the RESCVDA and Holyrood
6 Conversion Rate Deferral account.

7

8 The Board also approved the Holyrood Thermal Generating Station Accelerated Depreciation
9 Deferral Account effective January 1, 2022.

10

11 **Based upon our review, we report that the RSP is operating in accordance with Board Orders**
12 **and the charges and credits made to the Plan in 2021 are supported by Hydro's**
13 **documentation and accurately calculated.**

1 **Supply Cost Variance Deferral Account**

2
 3 The Supply Cost Variance Deferral Account had an accumulated debit balance or due from
 4 customers balance of approximately \$18.260 million at December 31, 2021. The breakdown of
 5 the Section A and Section B components included in the 2021 account as defined in Order P.U.
 6 4 (2022) is as follows:
 7

	2021	
Section A		
Supply Cost Variance Deferral Account Balance	\$ 18,989,681	Due from Customers
Section B		
Utility Customer	(729,396)	Due to Customer
Industrial Customer	-	
Total	<u>\$ 18,260,285</u>	Due from Customers

8
 9
 10 The table below provide a breakdown of the activity in the Section A and Section B of the
 11 Supply Cost Variance Deferral Account for 2021 as follows:

	Current Year Activity (1)
Section A	
Muskkrat Falls Project Cost Variance	\$ 39,876,511
Rate Mitigation Fund	-
Project Cost Recovery - Utility	-
Project Cost Recovery - Industrial	-
Holyrood Thermal Generating Station Fuel Cost Variance	(26,879,560)
Other Island Interconnected System	(3,220,124)
Net Revenue from Exports Variance	-
Transmission Tariff Revenue Variance	(700,298)
Load Variation - Utility	10,532,226
Load Variation - Industrial	2,485,599
Greenhouse Gas Credit Revenues Variance	(3,096,317)
Financing costs (2)	(8,356)
Net change 2021	<u>\$ 18,989,681</u>
Section B	
Utility Customer	
Allocation Rural Rate Alternation	\$ (729,046)
Financing Costs (2)	(350)
Net change 2021	<u>\$ (729,396)</u>
Section B	
Industrial Customer (3)	
	<u>\$ -</u>

12

1 **Notes:**

2 (1) The Supply Cost Variance Deferral Account is effective November 1, 2021, as such the activity is for the
3 months of November and December 2021. Positive value denotes amounts owing from customers to Hydro,
4 while negative values denote amounts owing from Hydro to customers.

5
6 (2) The financing costs were determined using a financing rate based on Hydro's short-term borrowing costs.
7 The financing rate determined by Hydro for 2021 was 1.84%.

8
9 (3) There were no transactions applied to the Industrial Customer balance in 2021 until further approval is
10 obtained from the Board in compliance with Order No. P.U. 4 (2022)

11
12 **Muskrat Falls Project Cost Variance**

13 The balance applied to the Muskrat Falls Project Cost Variance represents the difference from
14 actual purchased power and test year purchase power under the Muskrat Falls Purchase Power
15 Agreement ("Muskrat Falls PPA") and Transmission Funding Agreement ("TFA"). The actual 2021
16 Muskrat Falls PPA costs was \$39,876,511, with \$Nil for test year purchased power. The TFA
17 costs for both actual and test year in 2021 were \$Nil. As a result, the balance at December 31,
18 2021 represents the Muskrat Falls PPA costs incurred of \$39,876,511 for November and
19 December 2021.

20
21 **Rate Mitigation Fund**

22 The Rate Mitigation Fund component is any funding to provide rate mitigation to offset the cost of
23 the Muskrat Falls Project. There was no activity in the Rate Mitigation Fund in 2021.

24
25 **Project Cost Recovery – Utility and Industrial**

26 The Project Cost Recovery component is charges applied to customers to recover Muskrat
27 Project costs. There were no project costs recovery in 2021 for both the Utility customer and the
28 Industrial customers.

29
30 **Holyrood Thermal Generating Station ("Holyrood TGS") Fuel Cost Variance**

31 This component is based on difference between actual and test year Holyrood TGS fuel costs
32 incurred monthly to supply firm energy to the customers on the Island Interconnected System.
33 The balance at December 31, 2021 for the Holyrood TGS was (\$26,879,560) due to customers,
34 represented by the difference between November and December actual fuel costs of \$24,454,300
35 and test year fuel costs of \$51,333,860.

36
37 **Other Island Interconnected System**

38 Other Island Interconnected System component includes cost variances, i.e. differences between
39 actual and test year, in thermal generation costs, on-island power purchases, Corner Brook Pump
40 and Paper ("CBPP") firm energy power purchases and off-island power purchases, in excess of
41 the Cost Variance Threshold. The Cost Variance Threshold is applied on a calendar year, equals
42 +/- \$500,000, and for purposes of this component its effective date is at January 1, 2022 in order
43 to avoid a duplication of the cost variance threshold applied on the 2021 RESCVDA. The cost
44 variance balances at December 31, 2021 for the thermal generation is \$1,147,744, for the on-
45 island power purchases is (\$760,970), for the CBPP firm energy power purchases is \$Nil and for
46 the off-island power purchases of (\$3,606,898), for a combined account balance of (\$3,220,124).

1 **Net Revenue from Exports Variance**

2 Net revenue from exports variance is the difference between actual and test year net revenues
3 from exports. Additionally, revenue from non-firm sales on the Island Interconnected System
4 supplied by hydraulic generation is also included. There was no actual or test year net revenue
5 from exports or non-firm sales in 2021.

6
7 **Transmission Tariff Revenue Variance**

8 Transmission Tariff Revenue Variance is the difference between actual and test year transmission
9 tariff revenues paid by third parties. There was no test year 2021, however there was a total of
10 (\$700,298) in actual transmission tariff revenue in 2021.

11
12 **Load Variation**

13 Load Variation component represents firm load variation based on the revenue variation for firm
14 energy sales compared to the test year Cost of Service Study firm sales and its calculated
15 separately for Newfoundland Power firm sales and Island Industrial firm sales. As at December
16 31, 2021 the load variation for Newfoundland Power was \$10,532,226 and the load variation for
17 Island Industrial was \$2,485,599.

18
19 **Greenhouse Gas Credit Revenues Variance**

20 The Greenhouse Gas Credit Revenues Variance is the difference between actual and test year
21 Greenhouse Gas Credit Revenues. For 2021 Hydro received actual Greenhouse gas credit
22 revenues of (\$3,096,317), with \$Nil balance included in test year.

23 **Rural Rate Alteration**

24 The Rural Rate Alteration represents the changes in Hydro's rural revenues resulting from
25 changes in Rural Rates between test years and the change in Rural revenues on the Island
26 Interconnected System because of changes in Rural load between test years. The balance of the
27 Rural Rate Alteration for the Utility as at December 31, 2021 is (\$729,046).

Deferred Charges

Scope: Conduct an examination of the changes to deferred charges and assess their reasonableness and prudence in relation to sales of power and energy.

The following table shows the transactions in the deferred charges account for 2021, including prior year:

(000)'s	Balance Jan 01/21	Add. (Disp.)	Add. (Recovery)	Amort.	Balance Dec 31/21	Balance Dec 31/20	21A - 20A
Realized Foreign Exchange Losses	\$ 45,296	-	-	\$ (2,157)	\$ 43,139	\$ 45,296	(2,157)
CDM Program	8,750	1,136	-	(1,584)	8,302	8,750	(448)
Deferred Foreign Exchange on Fuel	(656)	640	-	-	(16)	(656)	640
Deferred Lease Costs	132	-	-	(132)	-	132	(132)
Phase II Hearing Costs (Note 1)	1,364	-	-	-	1,364	1,364	-
Asset Disposal	311	-	-	(19)	292	311	(19)
Supply Cost Deferrals	59,703	12,317	(59,697)	-	12,323	59,703	(47,380)
Deferred Power Purchases	(213)	-	-	36	(177)	(213)	36
Business System Deferral (Note 1)	3,585	1,015	-	-	4,600	3,585	1,015
2018 Revenue Deficiency	(1)	-	-	-	(1)	(1)	-
2019 Revenue Deficiency	77	-	-	-	77	77	-
Power Purchase Expense Recognition (Note 1)	-	17,573	-	-	17,573	-	17,573
Reliability And Resource Adequacy (Note 1)	765	1,292	-	-	2,057	765	1,292
Hydraulic Resource Optimization	(1,268)	(1,280)	-	-	(2,548)	(1,268)	(1,280)
Frequency Converter	(244)	(229)	-	-	(473)	(244)	(229)
	<u>\$ 117,601</u>	<u>\$ 32,464</u>	<u>\$ (59,697)</u>	<u>\$ (3,856)</u>	<u>\$ 86,512</u>	<u>\$ 117,601</u>	<u>\$ (31,089)</u>
Deferred charges excluded from Rate Base (Note 1)					<u>\$ (25,594)</u>	<u>\$ (5,714)</u>	<u>\$ (19,880)</u>
Deferred charges included in Rate Base					<u>\$ 60,918</u>	<u>\$ 111,887</u>	<u>\$ (50,969)</u>
Average deferred charges					<u>\$ 86,402</u>	<u>\$ 100,981</u>	<u>\$ (14,578)</u>

Note 1: The calculation of Deferred Charges for Rate Base excludes Phase II Hearing Costs, the Business System Transformation Deferral, Reliability and Resource Adequacy Deferral and Power Purchase Expense Recognition deferral. Recovery of these expenditures are subject to approval by the Board.

Realized Foreign Exchange Losses

Hydro continues to amortize costs associated with foreign exchange losses consistent with past practice.

Conservation Demand Management (CDM) Program

Pursuant to Order No. P.U. 49 (2016), Hydro received approval to defer 2016 costs related to the CDM Program. In Order No. P.U. 22 (2017), the Board approved the CDM deferral account definition which stated that the account balance as at December 31 each year shall be recovered over a period of seven years using a CDM Recovery Adjustment and that recovery of annual amortizations of costs in this account shall be through an annual application. The rates came into effect and recovery of the balance began on July 1, 2017. Actual costs deferred in 2021 were \$1.1 million (2020 - \$0.6 million). Costs recovered in 2021 were \$1.5 million (2020 - \$1.5 million).

Deferred Foreign Exchange on Fuel

Hydro purchases a significant amount of fuel for the Holyrood TGS in US dollars. Hydro notes that there are regulatory mechanisms that allow Hydro to defer variances in fuel prices, including foreign exchange fluctuations. According to Hydro the foreign exchange deferral is a change in accounting required due to adoption of IFRS. Prior to IFRS, Hydro recorded the full amount of the foreign exchange gain or loss in inventory. Upon adoption of IFRS, Hydro segregated the foreign exchange gain or loss which would require immediate charge to the company's profit and loss instead of inventory. In order to keep accounting for the RSP consistent with prior years, Hydro created a regulatory asset/liability to segregate the foreign exchange gain or loss until the fuel is consumed at which time the fuel inventory used and the relevant deferred foreign exchange on inventory would be realized and flow through the relevant regulatory mechanisms (e.g. RSP). In Order No. P.U. 30 (2019), the Board approved revised RSP rules to clarify that No. 6 fuel costs in Canadian dollars reflect foreign exchange gains and losses. During 2021, Hydro recognized in regulatory assets, foreign exchange losses on fuel purchases of \$0.6 million (2020 - \$0.2 million gain).

Deferred Lease Costs

Pursuant to Order No. P.U. 38 (2013), Hydro received approval to defer lease costs associated with the 16 MW diesel plant and other necessary infrastructure estimated to be \$5.8 million. Actual costs deferred in 2014 were \$3.7 million. In 2015, Hydro deferred an additional \$1.4 million. In 2016, pursuant to Order Nos. P.U. 17 (2016) and P.U. 23 (2016) Hydro received approval to defer additional lease costs of \$1.3 million and \$0.3 million respectively. The actual cost incurred in 2016 were \$1.6 million. In Order Nos. P.U. 17 (2016), P.U. 23 (2016) and P.U. 49 (2016), the Board approved the amortization of lease costs associated with mobile diesel units at Holyrood Thermal Generating Station (HTGS) over a period of five years. In 2021, Hydro recorded amortization of \$0.1 million (2020 - \$0.3 million) of the deferred lease costs.

Phase II Hearing Costs

In Order No. P.U. 13 (2016), Hydro received approval to defer costs for 2014, 2015 and subsequent years, including consulting fees, salary transfers and overtime, relating to Phase II of the investigation into the reliability and adequacy of power on the Island Interconnected System after the interconnection with the Muskrat Falls generating station. In 2021, there were no additional costs incurred, resulting in a total deferred balance of \$1.364 million (2020 - \$1.364 million). According to Hydro Phase II hearing costs are being excluded from rate base as

1 the Company has an internal administrative policy to exclude items where it has not received
2 approval of the mechanism to recover costs from customers.

3 4 **Asset Disposal**

5 In Order No. P.U. 49 (2016), the Board ordered that Hydro recognize a regulatory asset of \$0.4
6 million related to the Sunnyside transformer that was disposed of in 2014. Hydro is required to
7 recover the deferred asset in rate base and amortize the asset over a 22.4-year period, which
8 commenced in 2015. Hydro is required to exclude the new Sunnyside transformer from rate
9 base until the Sunnyside Transformer Original Asset Deferral has been fully amortized.

10 11 **Supply Cost Deferrals**

12 Pursuant to Order No. P.U. 22 (2017), the Board approved the Supply Cost Deferrals which
13 included the Energy Supply, Holyrood Conversion and Isolated Systems Supply Deferrals.
14 During the 2021 period, Hydro recorded a net decrease to the supply deferrals of \$47.4 million
15 (2020 – net increase of \$24.3 million), which resulted in a balance owing from customers of
16 \$12.3 million (2020 - \$59.7 million). The decrease to the supply deferral asset is primarily due to
17 the recovery of the 2020 supply cost deferral of \$54.9 million from the RSP in accordance with
18 Board Order P.U. 15 (2021). Further, Order No. P.U. 21 (2019) approved the recovery from
19 customers of \$18.4 million over a 20-month period, of which \$4.5 million was recovered by
20 Hydro in 2021 (2020 – \$10.9 million). Order No. P.U. 6 (2021), which approved a transfer of the
21 remaining balance in the 2017 GRA cost recovery Rider to the Island Industrial Customer,
22 resulted in a net decrease to the supply deferral of \$0.3 million (2020 - \$nil). Finally, the normal
23 operation of the supply deferral resulted in a net increase of \$12.3 million (2020 - \$54.9 million).
24 Recovery of the period's activity is to be determined through the annual application process.

25
26 As discussed earlier in our report in accordance with Order No. P.U. 33 (2021), the Energy
27 Supply and Holyrood Conversion Deferrals were discontinued as at October 31, 2021 with the
28 account maintained to provide a timely recovery of historic balances.

29 30 **Deferred Power Purchases**

31 In 1997, the Board ordered Hydro to defer \$1.1 million related to reduced purchase power rates
32 resulting from the interconnection of communities in the area of L'Anse au Clair to Red Bay to
33 the Hydro-Quebec system and amortize the balance over a 30-year period. In 2021, the
34 remaining unamortized savings in the amount of \$0.2 million (2020 - \$0.2 million) are deferred
35 as a regulatory liability.

36 37 **Business System Deferral**

38 As per Order Nos. P.U. 23 (2019) and P.U. 30 (2019), the Board approved the deferral of
39 business system transformation program costs commencing in 2018. The recovery of the
40 deferral is subject to a future Board order. During the year, Hydro deferred \$1.0 million (2020-
41 \$1.1 million).

42 43 **Power Purchase Expense Recognition**

44 In Order No. P.U. 9 (2021) and Order No. P.U. 33 (2021), the PUB approved Hydro's proposal
45 to deviate from IFRS to allow recognition of expenses related to the purchase of energy in
46 accordance with the commercial terms of the Muskrat Falls Power Purchase Agreement. As at
47 December 31, 2021, IFRS power purchase expenses were \$14.8 million higher during Muskrat
48 Falls pre-commissioning and \$2.8 million higher during post-commissioning than commercial
49 payments, which resulted in the deferral of a regulatory asset of \$17.6 million.

1 **Reliability and Resource Adequacy**

2 Pursuant to Order No. P.U. 29 (2019), the Board approved the deferred costs associated with
3 the Reliability and Resource Adequacy proceeding. Hydro deferred \$1.3 million in 2021 (2020-
4 \$0.6 million). The recovery of the balance is to be determined in a future Board Order.
5
6

7 **Hydraulic Resource Optimization**

8 In Order No. P.U. 49 (2018), a deferral account to capture the revenues and costs associated
9 with the hydraulic optimization activities was approved. For the year ended December 31, 2021,
10 the balance of hydraulic optimization activities is a net gain of \$1.3 million (2020 - \$1.0 million)
11 recorded as a deferred liability.
12

13 **Frequency Converter**

14 In Order No. P.U. 35 (2020), the Board approved the deferral of the cumulative revenue
15 requirement impact associated with the loss on the sale of a frequency converter, commencing
16 December 2019. The disposition of the cumulative revenue requirement impact included in the
17 deferral account balance will be addressed as part of Hydro's next general rate application.
18 During 2021, Hydro deferred \$0.2 million as a regulatory liability (2020 - \$0.2 million) for a total
19 of \$0.4 million.
20

21
22 **In summary, based upon our analysis we noted that recovery of Phase II Hearing Costs,
23 the Business System Deferral, Power Purchase Expense Recognition and the Reliability
24 and Resource Adequacy balance has not yet been approved by the Board. These deferral
25 accounts have been appropriately excluded from rate base.**

1 **Key Performance Indicators and Initiatives and Efforts Targeting Productivity and**
2 **Efficiency Improvements**

3
4 **Scope:** *Review Hydro’s Annual Report on Key Performance Indicators and any other*
5 *information on initiatives and efforts targeting productivity or efficiency*
6 *improvements in 2021.*

7
8 In Order No. P.U. 14 (2004) Hydro was ordered to file annually with the Board a report outlining:

- 9 i. a strategic overview highlighting core strategies, corporate goals and achievements;
10 ii. appropriate historic, current and forecast comparisons of reliability, operating,
11 financial and other key targeted outcomes/measures, including certain specified
12 KPI’s; and
13 iii. initiatives targeting productivity or efficiency improvements, including the status of
14 ongoing projects and improved performance resulting from completed projects.

15
16 The 2021 annual report on strategic goals and objectives and productivity initiatives was filed
17 with Hydro’s December 31, 2021 quarterly report.

18
19 In addition to the filing requirements identified above, Order No. P.U. 14 (2009) requires the
20 filing of a report on Hydro’s Conservation and Demand Management activities. This report is
21 included as Return 21 in the 2021 annual financial return.

22
23 **Strategic Goals and Objectives**

24 The quarterly report referenced above provides information on Hydro’s achievements relative to
25 its 2021 strategies, goals and initiatives. This section provides details on activities and
26 outcomes relative to a broad range of initiatives undertaken during the 2021 fiscal year.

27
28 **Safety**

29 To track their performance on this objective, Hydro continued to monitor All Injury Frequency,
30 Lost Time Injury Frequency, the ratio of condition and incident reports to lost time and medical
31 treatment injuries (“Lead/lag ratio”), and the severity rate. According to Hydro, during 2021, the
32 safety team continued to focus on the evolving COVID-19 pandemic and developing strategies,
33 policies, and procedures to ensure the safety of Hydro’s staff, contractors, and the general
34 public, while also continuing to execute critical field work. During 2021 Hydro advanced its 2021
35 work plan initiatives related to mental health and wellness, improving contractor safety
36 management, and the annual safety and health monitoring plan.

37
38 The results of the All Injury Frequency and Lead/lag ratio metrics have been presented in the
39 table below:

40

Measurement	2021 Actual	2021 Plan	2020 Actual	Target Met
All Injury Frequency (AIF)	1.01	0.50	0.52	No
Ratio of condition and incident reports to lost time and medical treatment injuries (lead/lag ratio)	1,032:1	1,000:1	1,452:1	Yes

1 In 2021 Hydro met its Lead/Lag ratio safety target as noted above. With regards to the All Injury
2 Frequency metric, Hydro did not meet its target for 2021.

3 Environment and Conservation

4
5
6

Targets used to evaluate this goal are summarized below:

Measurement	2021 Actual ¹	2021 Target	2020 Actual	Target Met
Achievement of EMS targets	100%	100%	100%	Yes
Annual energy savings from Residential and Commercial Conservation and Demand Management Programs	1,681 MWh	1,719 MWh	975 MWh	No

7 *1 - Actual year-to-date energy savings reported are unaudited. Audited figures will be provided in Hydro's annual CDM report.*

8 According to Hydro, the ability to deliver its planned 2021 programs were impacted by COVID-
9 19. This was a result of factors such as travel restrictions limiting ability to effectively deliver
10 commercial programs, businesses being less inclined to invest in energy efficiency due to
11 reduced income, and supply chain challenges. The measurement of annual energy savings
12 from Residential and Commercial Conservation and Demand Management Programs reached
13 98% of its target for 2021.

14
15

These results are primarily due to partnerships and programs detailed below:

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- The takeCHARGE partnership offers rebate programs to assist residential and commercial customers in reducing their electricity usage;
- The Hydro Residential Program relates to four programs offered jointly by Hydro and Newfoundland Power;
- The takeCHARGE is partnering with the Government of Newfoundland and Labrador under the Low Carbon Leadership Funding Agreement to extend takeCHARGE's current insulation and thermostat rebate program to oil heated customers;
- Isolated Systems Community Energy Efficiency Program provides outreach, education, and energy efficient products in the remote diesel-system communities within Newfoundland and Labrador free of charge; and,
- Hydro's Commercial Program includes the Business Efficiency and Isolated Business Efficiency programs, which are available to business customers in Hydro's interconnected system and isolated diesel service areas.
- In Q3 2021 the Government of Newfoundland and Labrador requested Hydro administer two new electrification programs, one which provides residents with a rebate of \$2,500 towards the purchase of an Electric Vehicle (EV), and another which provides a \$2,500 rebate towards the cost of transitioning oil-heated homes to electric based heat. The Newfoundland and Labrador Government is paying all costs associated with these programs, including administrative costs.

37 Hydro's strategy for Internal Energy Efficiency savings ended in 2019, however Hydro noted
38 they will continue to identify opportunities that improve energy efficiency at its site. In 2021,
39 Hydro was delayed in developing a new three-year internal program but intends to continue
40 these efforts into 2022.

1 Key Performance Indicators

 2
 3
 4
 5
 6

Section 2 to the December 31, 2021 quarterly report filed by Hydro includes the 2021 Annual Report on Key Performance Indicators. The Key Performance Indicators (“KPI”) results for 2021 as compared with prior years are summarized in the following table:

Category / KPIs ⁴	Measure Definition	Units	2016	2017	2018	2019	2020	Avg. 16-20	2021	Variance from Average
Reliability										
Generation										
Weighted Capability Factor	Availability of Units for Supply	%	77.1	81.8	78.1	83.2	88.0	81.6	79.2	(2.4)
Weighted DAFOR	Unavailability of Units due to Forced Outage	%	10.0	6.4	7.9	2.0	1.9	5.6	11.7	6.1
Transmission										
SAIDI	Outage Duration per Delivery Point	Minutes / Point	325.0	398.3	488.7	403.6	449.2	413.0	247.0	(166.0)
SAIFI	Number of Outages per Delivery Point	Number / Point	2.9	2.1	3.9	3.4	1.7	2.8	1.9	(0.9)
SARI	Outage Duration per Interruption	Minutes / Outage	112.0	189.5	125.3	118.7	265.8	162.3	130.7	(31.6)
Distribution										
SAIDI	Average Outage Duration for Customers	Hours / Customer	15.7	19.6	19.5	15.0	17.9	17.5	21.3	3.8
SAIFI	Number of Outages for Customers	Number / Customer	6.6	5.3	6.7	5.1	4.6	5.7	6.0	0.3
End User SAIDI	Average Outage Duration for Customers	Hours / Customer	2.4	2.8	3.0	2.7	2.7	2.7	3.0	0.3
End User SAIFI	Number of Outages for Customers	Number / Customer	1.3	1.3	1.4	0.9	0.8	1.1	1.5	0.4
Under Frequency Load Shedding										
UFLS	Customer Load Interruptions Due to Generator Trip	Number of Events	6	9	5	1	-	4	2	(2)
Operating										
Hydraulic Conversion Factor ¹	Net Generation / 1 Million m ³ Water	GWh / MCM	0.432	0.432	0.429	0.425	0.434	0.430	0.427	(0.003)
Thermal Conversion Factor ²	Net kWh / Barrel No. 6 HFO	kWh / BBL	608	601	592	588	586	595	568	(27)
Financial (Regulated)										
Controllable Unit Cost ³	Controllable OM&A\$ / Energy Deliveries	\$ / MWh	\$ 20.07	\$ 13.90	\$ 14.55	\$ 14.04	\$ 14.37	\$ 15.39	\$ 13.78	\$ (2)
Generation Controllable Costs	Generation OM&A\$ / Installed MW	\$ / MW	\$27,095	\$28,457	\$30,064	\$30,173	\$30,292	\$ 29,216	\$28,602	\$ (614)
	Generation OM&A\$ / New Generation	\$ / GWh	\$ 7,738	\$ 7,991	\$ 8,674	\$ 9,117	\$ 9,640	\$ 8,632	\$ 9,574	\$ 942
Transmission Controllable Costs	Transmission OM&A\$ / 230 kV Eqv Circuit	\$ / Km	\$ 6,148	\$ 4,979	\$ 4,266	\$ 4,172	\$ 4,194	\$ 4,752	\$ 4,086	\$ (666)
Distribution Controllable Costs	Distribution OM&A\$ / Circuit Km	\$ / Km	\$ 3,338	\$ 3,493	\$ 3,146	\$ 3,073	\$ 3,079	\$ 3,226	\$ 3,628	\$ 402
Other										
Percent Satisfied Customers	Satisfaction Rating	Max = 100%	90%	N/A	89%	N/A	90%	90%	N/A	-

1. For the Bay d’Espoir hydroelectric plant.

2. For Holyrood thermal.

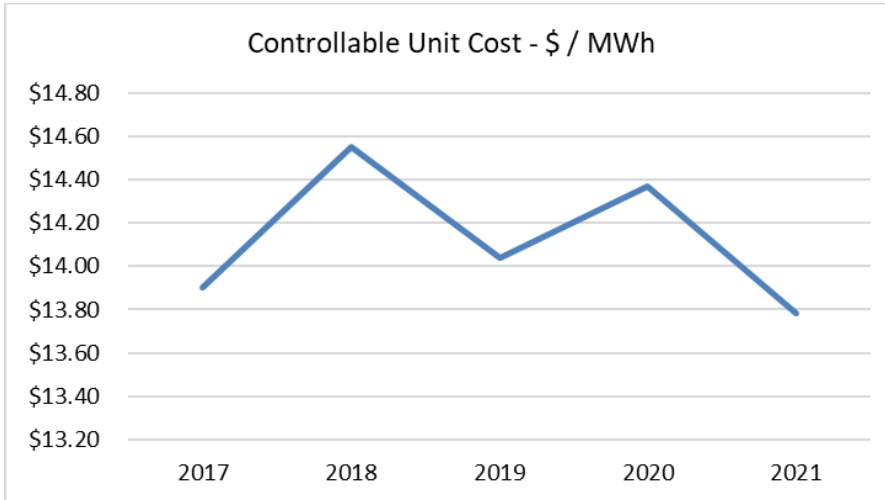
3. Energy deliveries have been normalized for weather, customer hydrology, and industrial strikes.

4. Grant Thornton did not independently verify the calculation of KPIs.

The following graphs illustrate the trends in the actual financial metrics from 2017 to 2021.

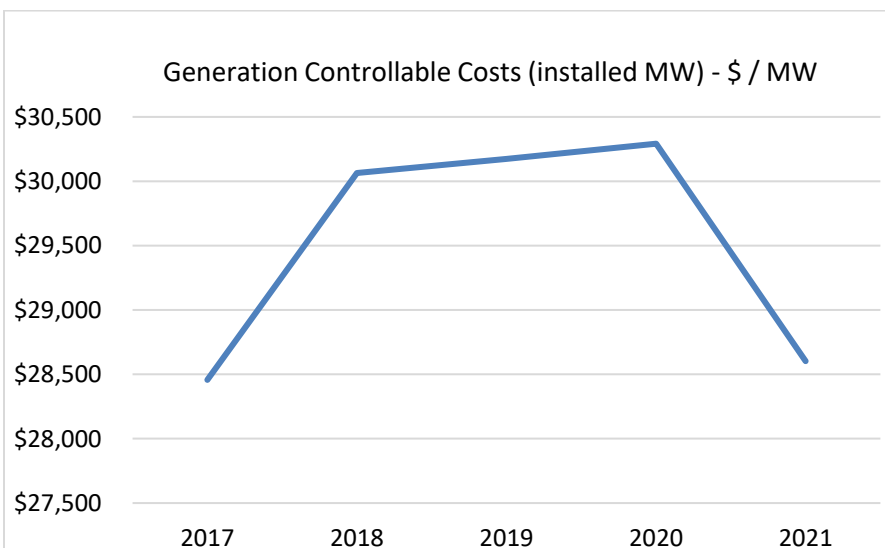
Controllable Unit Costs:

Controllable Unit Cost is a high-level corporate KPI that tracks Hydro’s Operations, maintenance, and administration (“OM&A”) expenses in relation to its total energy delivered, expressed as dollars per MWh. The following chart provides a line graph for years 2017 to 2021 of this KPI:



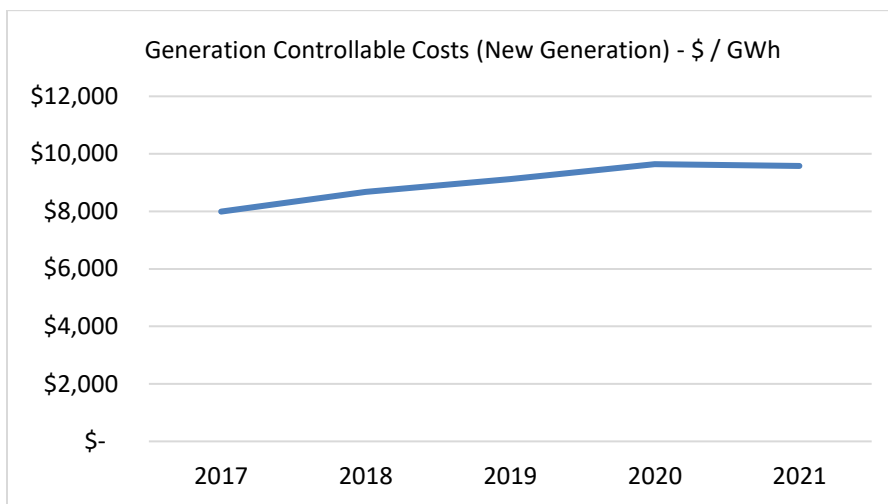
The decrease in Controllable Unit Cost from \$14.37 per MWh in 2020 to \$13.78 per MWh delivered in 2021 was largely due to a decrease in OM&A costs. According to Hydro, OM&A costs decreased from \$133.5 million in 2020 to \$126.1 million in 2021, a \$7.4 million decrease. While the figures for OM&A costs for purposes of this KPI were determined by Hydro, the decrease is consistent with our presentation of ‘Other costs’ included in our revenue requirement section which includes OM&A costs from \$136.1 million in 2020 to \$128.9 million in 2021, a decrease of \$7.2 million.

Generation Controllable Costs – Installed MV



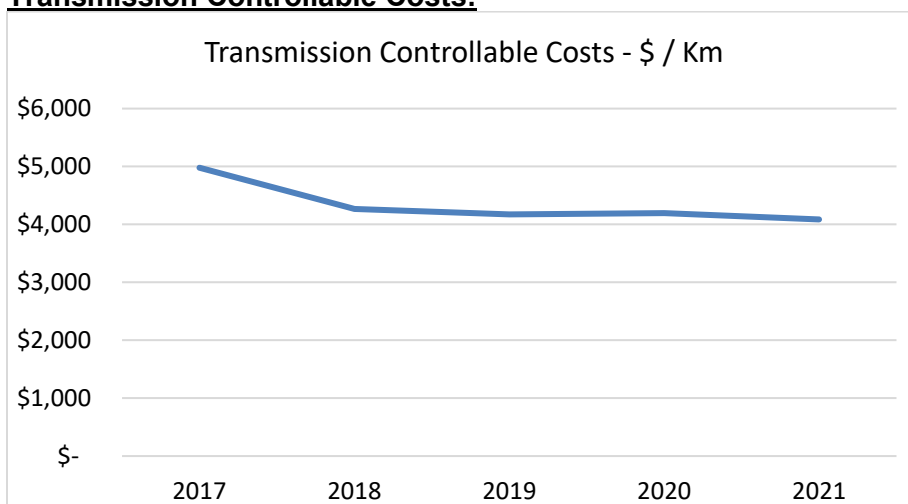
1 There was a decrease to Generation Controllable Costs of \$1,690 per MW from \$30,292 per
 2 MW to \$28,602 per MW. Similar to the table above, the decrease in Generation Controllable
 3 costs is largely attributed to a decrease in OM&A costs in 2021 relative to 2020.
 4

5 **Generation Controllable Costs – New Generation**
 6
 7



8
 9
 10 In 2021, Generation Output Controllable Costs decreased slightly to \$66 per GWh compared to
 11 2020. Overall, this cost remained consistent when compared to the 2017-2020 period.
 12
 13

14 **Transmission Controllable Costs:**



15
 16
 17 In 2021, Transmission Controllable costs were \$4,086 per kilometer, a \$109 decrease from
 18 2020. These costs have remained stable over the past four years.

1 **Distribution Controllable Costs:**



2
3
4
5
6
7

In 2021, Hydro's Distribution Controllable Cost increased by \$549 per kilometer compared to 2020. Hydro attributes this rise to a change in the methodology for calculating distribution circuit length. Under the previous method, the cost would have been \$2,905 per kilometer, showing a \$174 per kilometer decrease from 2020 due to lower OM&A costs.

1 As consistent with prior year, Hydro reports on 18 KPIs covering the following four areas:
 2 reliability, operating, financial and customer related.
 3

Category	KPI	Units	2021 Target	2021 Results	Target Achieved
Reliability	Weighted Capability Factor (WCF)	%	80.1 ¹	79.2	No
	Weighted DAFOR	%	5.9	11.7	No
	T-SAIDI	Minutes / Point	384.9	247.0	Yes
	T-SAIFI	Number / Point	2.7	1.9	Yes
	T-SARI ²	Minutes / Outage	N/A	130.7	N/A
	D-SAIDI	Hours / Customer	17.7	21.3	No
	D-SAIFI	Number / Customer	5.7	6.0	No
	End User SAIDI	Hours / Customer	2.7	3.0	No
	End User SAIFI	Number / Customer	1.1	1.5	No
	Underfrequency Load Shedding	# of events	6	2	Yes
Operating	Hydraulic CF	GWh / MCM	0.433	0.427	No
	Thermal CF	kWh / BBL	583	568	No
Financial	Controllable Unit Cost	\$/MWh	N/A	\$13.78	N/A
	Generation Controllable Costs	\$/MW	N/A	\$28,602	N/A
	Generation Output Controllable Cost	\$/GWh	N/A	\$9,574	N/A
	Transmission Controllable Cost	\$/Km	N/A	\$4,086	N/A
	Distribution Controllable Cost	\$/Km	N/A	\$3,628	N/A
Other	Customer Satisfaction (Residential)	Max = 100%	N/A	N/A	N/A

1. WCF Target is based on planned annual maintenance outages, an allowance for other short duration maintenance outages and targeted forced outage durations.

4 2. According to Hydro, they do not establish a restoration index target.
 5

6 During 2021, Hydro met 3 out of the 9 reliability KPIs as noted above. Within the reliability
 7 category, Hydro did not achieve its target for Weighted Derated Adjusted Forced Outage Rate
 8 (DAFOR), which was a result of significant forced outages in the year. Furthermore, Hydro did
 9 not achieve its targets for Distribution – System Average Interruption Duration Index (D-SAIDI),
 10 Distribution – System Average Interruption Frequency Index (D-SAIFI), End User SAIDI, End
 11 User SAIFI, and Weighted Capability Factor (WCF).
 12

13 The hydraulic conversion factor for Bay d’Espoir was not met with 0.427 GWh/MCM, compared
 14 0.433 GWh/MCM set as the Company’s target. This was a result of low inflows experienced in
 15 the summer and spring of 2021, in conjunction with a prolonged outage of the Upper Salmon
 16 Hydroelectric Generating Station, which lead to a lower than targeted conversion factor. The net
 17 thermal conversion factor of 568 kWh per barrel was also unmet, being lower than the target of
 18 583 kWh per barrel. Thermal conversion factor for the Holyrood TGS is proportional to the
 19 output level of the three units and varies based on hydraulic production on the island, heating
 20 content in fuel consumed at plants, customer demand, and energy requirements. The Holyrood
 21 TGS showed decreased performance in 2021 when compared to 2020 on a net heat basis.
 22

23 The most recent Customer Satisfaction Survey was completed in 2020 and showed that 90% of
 24 customers were either very satisfied or somewhat satisfied with Hydro. The next satisfaction
 25 survey will be completed in 2022 and as such there is no target or results set for 2021.

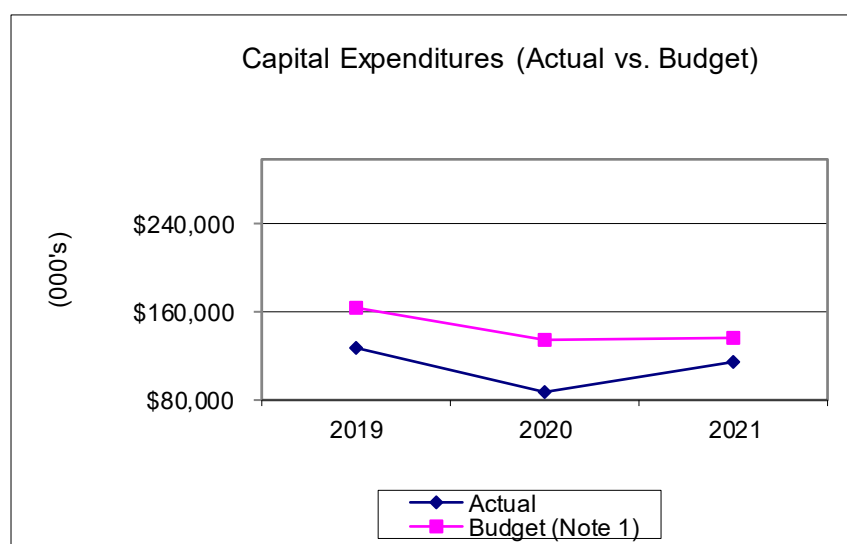
- 1 **We have reviewed the KPI results and the explanations provided by Hydro for the**
- 2 **changes and variations experienced in 2021 and find them to be consistent with our**
- 3 **observations and findings noted in conducting our annual financial review. There were**
- 4 **no internal inconsistencies identified in Hydro's report.**

Capital Expenditures

Scope: *Review the Company's 2021 capital expenditures in comparison to budgets and follow up on any significant variances.*

The following table details the actual versus budgeted capital expenditures for the past three years from 2019 to 2021:

(000's)	2019	2020	2021
Actual	\$ 126,575	\$ 87,555	\$ 113,492
Budget (Note 1)	\$ 164,194	\$ 134,752	\$ 136,304
Under/Over Budget	(22.91%)	(35.03%)	(16.74%)



Note 1: The 2021 budget consists of the following:

- 2021 capital budget approved under Order No. P.U. 2 (2021) - \$107,453,000;
- new projects approved under Order No. P.U. 25 (2020) - \$165,000;
- new projects approved under Order No. P.U. 26 (2020) - \$216,000;
- top-up approved under Order No. P.U. 17 (2021) - \$108,000;
- new projects approved under Order No. P.U. 18 (2021) - \$443,000;
- new projects approved under Order No. P.U. 20 (2021) - \$350,000;
- new projects approved under Order No. P.U. 27 (2021) - \$3,479,000;
- new projects approved under Order No. P.U. 28 (2021) - \$308,000;
- new projects approved under Order No. P.U. 30 (2021) - \$1,410,000;
- top-up approved under Order No. P.U. 34 (2021) - \$1,000,000;
- 2021 new projects under \$50,000 approved by Hydro (2021) - \$95,000 and;
- projects carried forward to 2021 - \$21,277,000.

The above graph demonstrates that in 2019 and 2020 the Company was under budget on its capital expenditures by 22.91% and 35.03%, respectively. In 2021, the Company was again under budget

1 on its capital expenditures by 16.74% or \$22,812,000. As explained further in our report,
2 expenditures were substantially below budget due to Transmission and Rural Operations. Section
3 5.0 of Hydro's 2021 capital expenditure report provides an analysis of the main contributors to these
4 variances, including strategic deferral of work, pandemic related supply chain challenges, and later
5 than anticipated project approvals.

6
7 The following table presents a breakdown of the total assets excluded from rate base for 2020
8 and 2021:
9

(000's)	2021	2020
HRD Unit 1	303	513
Holyrood Fuel Oil Heat Trace	150	254
Charlottetown Diesel Plant	262	281
Sunnyside Transformer T8	4,029	4,137
Sunnyside Breaker, B1L17, Overhaul	314	314
Lab City Voltage Conversion	168	174
WAV Transformer T5 - Perform Upgrades	1,158	1,192
Holyrood Air Heaters Units 1, 2, & 3	447	756
Other (Note 1)	613	636
Phase 1 - EV Charging Network (note 2)	177	-
Unit #1 CR Line Failure 2021 (Note 3)	531	-
Total	8,154	8,257

Note 1: Relating to expenditures within the Prudence Review Order No. P.U. 13 (2016). Also includes expenditures related to TRF Upgrade which involved upgrading power transformers. According to Hydro during replacement of the transformer bushings on Come-By-Chance transformer T1, a draw lead was dropped inside the transformer tank, which required additional cost and effort to remedy. As these additional costs were incurred as a result of an error, Hydro did not seek recovery of these additional costs from the customer.

Note 2: P.U. 7 (2020) approved capital expenditures for the construction and installation of an electric vehicle fast charging network, however this was not approved to be included in Hydro's rate base.

Note 3: Management's decision to exclude from rate base.

10 Capital Budget Guidelines Policy

11
12 The Company is required to follow Capital Budget Guidelines Policy number 1900.6. Within
13 these guidelines the Company must apply for approval of supplemental capital budget
14 expenditures and file an annual capital expenditure report by March 1 of the following year
15 explaining variances of both \$100,000 and 10% from budget. Included in the Company's
16 'Capital Expenditures and Carryover Report' revised filing dated March 8, 2022 (original was
17 filed on March 1, 2022), the Company has provided explanations for variances on 59 projects.
18 We confirm that the Company is in compliance with this guideline.

19
20 Guideline 1900.6 also requires that the Company provide a summary of the actual versus
21 budget variance for the past 10 years and "should the overall variance in any two years exceed

1 10% of the budgeted total the report should address whether there should be changes to the
 2 forecasting or capital budgeting process which should be considered". In the Company's
 3 'Capital Expenditures and Carryover Report' the required schedule was provided which
 4 compared budget versus actual expenditures for 2012 to 2021. Of this 10-year period, the
 5 Company was under budget for 9 years (ranging from a 16.7% variance in 2021 to a 59.8%
 6 variance in 2015). In 2017, the Company's capital spending was consistent with budget. The
 7 average percent variance during this 10-year period is 27.4%.

8
 9 In 2021, Hydro reported that four capital projects were the main contributors to the (16.8%) variance
 10 between the actual expenditures and capital budgets. These projects include: \$3,000,000 on
 11 combustor inspections for the Holyrood Gas Turbine; \$2,800,000 for circuit breaker upgrades;
 12 \$2,700,000 for the Valentine Gold Interconnection project; and \$2,500,000 for replacement lights
 13 and Heavy-duty vehicles.

14
 15 A breakdown of the total capital expenditures and budget for 2021 with variances by asset category
 16 is as follows:

(000's)	2021 Actual	2021 Budget	Variance	%
Generation	\$ 50,477	\$ 52,251	\$ (1,774)	(3.40%)
Transmission and Rural Operations	51,524	65,903	(14,379)	(21.82%)
General Properties	4,630	9,045	(4,415)	(48.81%)
Allowance for Unforeseen Events	4,007	2,108	1,899	90.09%
Supplemental Projects	2,767	6,902	(4,135)	(59.91%)
New Projects Approved under \$50,000	87	95	(8)	(8.42%)
Total	\$ 113,492	\$ 136,304	\$ (22,812)	(16.74%)

17
 18
 19 As indicated in the table above, total capital expenditures are under the budget. This budgeted
 20 amount includes the approved capital budget projects by the Board for \$115,027,000 and
 21 carryovers from 2020 to 2021 of \$21,277,000. The Company has reported that there are 44
 22 projects which were included in the 2021 budget which have expenditures totaling \$33,242,000
 23 net of CIACs, carried forward to 2022.

- 1 Hydro's 'Capital Expenditures and Carryover Report' discloses actual and budgeted past
 2 expenditures, as well as actual and budget forecasted expenditures beyond 2021 for each project.
 3 A breakdown of these expenditures with variances by category is as follows:

(000's)	Budget				Actual				Variance	
	Up to 2020	2021	Forecast	Total	Up to 2020	2021	Forecast	Total	\$	%
Generation										
Hydro Plants	\$ 9,927	\$ 21,501	\$ 15,389	\$ 46,817	\$ 9,478	\$ 20,193	\$ 19,698	\$ 49,370	\$ 2,553	5%
Thermal Plants	1,630	22,794	916	25,340	2,515	26,371	2,818	31,703	6,362	25%
Gas Turbines	13,789	6,428	2,878	23,095	7,416	3,913	6,880	18,208	(4,887)	(21%)
Total Generation	25,346	50,723	19,183	95,252	19,408	50,477	29,396	99,281	4,029	4%
Transmission and Rural										
Terminal Stations	87,244	24,237	35,994	147,474	61,105	20,523	46,792	128,421	(19,054)	(13%)
Transmission Lines	19,979	2,897	-	22,875	17,188	6,238	1,374	24,801	1,925	8%
Distribution	1,020	12,415	806	14,240	290	14,363	1,029	15,682	1,442	10%
Generation	19,580	6,562	286	26,429	15,641	8,543	2,326	26,510	81	0%
Properties	92	293	-	384	98	51	-	150	(235)	(61%)
Metering	-	233	-	233	-	229	-	229	(5)	(2%)
Tools and Equipment	500	1,545	-	2,045	68	1,577	414	2,058	13	1%
Total Transmission and Rural	128,414	48,182	37,085	213,682	94,391	51,524	51,935	197,850	(15,831)	(7%)
General Properties										
Information Systems	243	2,203	-	2,445	282	1,490	513	2,285	(160)	(7%)
Telecontrol	-	1,034	-	1,034	-	1,107	-	1,107	73	7%
Transportation	3,468	3,204	1,335	8,008	2,022	1,085	5,227	8,334	326	4%
Administrative	89	1,106	939	2,134	64	949	1,105	2,118	(16)	(1%)
Total General Properties	3,800	7,547	2,274	13,621	2,368	4,630	6,845	13,843	222	2%
Allowance for Unforeseen Events	-	2,108	-	2,108	-	4,007	-	4,007	1,899	90%
Supplemental Projects	2,436	6,371	14,636	23,443	1,905	2,767	18,902	23,574	131	1%
New Projects Approved under \$50,000	-	95	-	95	-	87	-	87	(8)	(8%)
Total	\$ 159,996	\$ 115,027	\$ 73,178	\$ 348,200	\$ 118,073	\$ 113,492	\$ 107,078	\$ 338,642	\$ (9,558)	(3%)

- 4 The largest variances relate to the following asset classes: Terminal Stations (\$19,054,000
 5 under budget), Thermal Plants (\$6,362,000 over budget), and Gas Turbines (\$4,887,000 under
 6 budget).

- 7
 8 As discussed earlier in this report, the Company has provided detailed explanations on budget
 9 to actual variances in its 'Capital Expenditures and Carryover Report'. For a complete review of
 10 the budget variance we refer the reader to the Company's 'Capital Expenditures and Carryover
 11 Report'.

12 Allowance for Unforeseen Events

13
 14
 15 Guideline 1900.6 sets out the requirements that Hydro must follow regarding these
 16 expenditures. These include the following:

- 17
 18 • "Before proceeding with work using the Allowance for Unforeseen Items account, or as
 19 soon as practical thereafter, the utility must notify the Board in writing that it intends to
 20 proceed with an expenditure greater than \$50,000 without the approval of the Board
 21 using the Allowance for Unforeseen Items account. This notice must set out the detailed
 22 circumstances, including the justification for the expenditure and the reason for the use

1 of the Allowance for Unforeseen Items account, providing to the extent available at the
2 time, a scope and costing for the expenditure.”

- 3 • “Within 30 days after the completion of the work the utility shall file a detailed report
4 setting out:
- 5 i. the circumstances of the expenditure;
 - 6 ii. any reliability or safety issues;
 - 7 iii. why the work was not anticipated in the annual capital budget;
 - 8 iv. the alternatives considered;
 - 9 v. the financial effects of each alternative and the reasons for the chosen
10 alternative;
 - 11 vi. a timeline setting out all relevant dates;
 - 12 vii. the nature and scope of the work;
 - 13 viii. the detailed costs incurred; and
 - 14 ix. any other implications for other aspects of the utility business/systems.

15
16 This asset category has an allowance amount of \$2,108,000. The Board approved an amount of
17 \$1,000,000 for the “Allowance for Unforeseen Events” in Order No. P.U. 2 (2021), in addition to
18 a supplementary amount of \$108,000 in Order No. P.U. 17 (2021). Per Order No. P.U. 34
19 (2021), the Board approved a reset to the 2021 Allowance for Unforeseen Items to \$1,000,000
20 effective December 17, 2021, which Hydro noted remained unused for 2021. Actual costs
21 incurred by Hydro were \$4,007,000. From our review, we noted the following uses of the
22 “Allowance for Unforeseen Events”:

- 23
- 24 • Port Hope Simpson Engine Replacement – On September 8th, 2020, Unit 2099 tripped
25 offline and it was determined that a valve had dropped and contacted the piston, causing
26 substantial damage to the engine. Hydro determined that immediate replacement of the
27 failed unit was necessary to continue to reliably meet Hydro’s Firm Capacity
28 Requirements and would be required in Port Hope Simpson until at least 2024. The
29 original estimate of expenditures for this project was \$112,700, with actual costs falling
30 slightly below this at \$108,000.
 - 31 • Holyrood Unit 3 Boiler Tube Failure – On September 11, 2021, a rupture occurred on
32 boiler tube #5 while Hydro was in the process of returning Holyrood TGS Unit 3 to
33 service, following planned maintenance. As a result, a section of the tube was ejected
34 and debris and steam were both released into the powerhouse. Upon further
35 investigation, Hydro determined that there was a risk of additional failures for the Unit 3
36 boiler tubes and initiated a level 2 condition assessment to ensure that all tubes at risk of
37 failure are fit for service. Hydro estimated expenses for this project to amount to
38 \$2,225,275 because of the specialized engineering and magnitude of work. Actual costs
39 recorded in the Allowance for Unforeseen amounted to \$2,250,000, which were slightly
40 higher than budget due to final invoicing from contractors.
 - 41 • Holyrood T2 Replacement – On November 12, 2021, Holyrood TGS Unit 2 experienced
42 a failure. Hydro had to immediately commence work to restore this significant generation
43 source to operation given the winter period. Due to the timeframe required to develop a
44 proposal and move through the required regulatory proceedings to obtain approval of
45 this work as a supplement to the capital budget application, there would have been
46 delays to the restoration of Unit 2. This would result in unacceptable risk to adequately
47 supply the Island Interconnected System. As such, Hydro notified the Board of its
48 intention to utilize the Allowance for Unforeseen Items Account to fund costs associated
49 with completing the work necessary to replace the T2 transformer and return TGS Unit 2

1 to service. Actual costs for this project amounted to \$1,929,000, with \$1,649,000
2 recorded to the Allowance for Unforeseen in 2021 and the remainder in 2022.

3

4 **Based upon our analysis, Hydro filed reports on the use of the Allowance for Unforeseen**
5 **Events within 30 days of the completion of the work on the occasions as described**
6 **above.**