EB-2021-0002

Before the Ontario Energy Board

Enbridge Gas Inc.
Application for Multi-Year Natural Gas Demand Side Management Plan (2022 to 2027)

Green Energy Coalition (GEC) Final Argument

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Executive Summary

The challenge before the Board – Balancing competing societal goals

In its December 2020 DSM Letter the Board recognized the goals of customer energy bill reduction, lower gas consumption, GHG reductions to contribute to government policy goals, and infrastructure reduction, while indicating its expectation of a moderate near-term budget increase resulting in reasonable short-term and long-term customer bill impacts.

Enbridge, has proposed a plan which fails to meet most of these objectives. In the face of mounting urgency to confront the imperatives of the climate crisis, Enbridge would have us fiddle while the planet burns. In essence the company places blame on the Board by interpreting its guidance for 'modest budget increases in the near term' in the most constraining manner possible – while ignoring the Board's references to "near-term" and to "in order to increase natural gas savings".

Can we have our cake and eat it too? Can DSM spending and savings ramp up meaningfully without undue bill impacts?

In our submission, the answer is yes for the following reasons:

- The Board's call for "modest budget increases… in the near-term" and was preceded by the observation: "With COVID-19 creating many financial hardships, energy conservation has a role in helping to reduce energy costs and assist customers in managing their energy bills." The Board held DSM budgets flat for 2021 and 2022 and Covid's economic hardships are now receding. A ramp up of DSM spending can address the objectives contained in the DSM letter while avoiding unacceptable near-term rate impacts.
- Amortization can extend the period of low rate impact while allowing for significant DSM budget increases, while better matching customer costs and benefits over time. The urgency of the climate crisis and the need to meet 2030 policy targets warrants a concerted effort to advance energy efficiency now.
- Expanded program participation and depth of savings can assist customers by inducing gas and electricity commodity price reductions for DSM participants and non-participants alike, and by avoiding future infrastructure investment, ameliorating longer-term bill impacts.
- Past and future DSM participation means a large proportion of customers will enjoy bill reductions due to the lasting benefit of DSM measures.

- Enhanced emphasis on low-income programs coupled with targeted provincial and federal programs can help protect the most vulnerable customers.

Enbridge's plan fails to address Government GHG goals and the Board's guidance

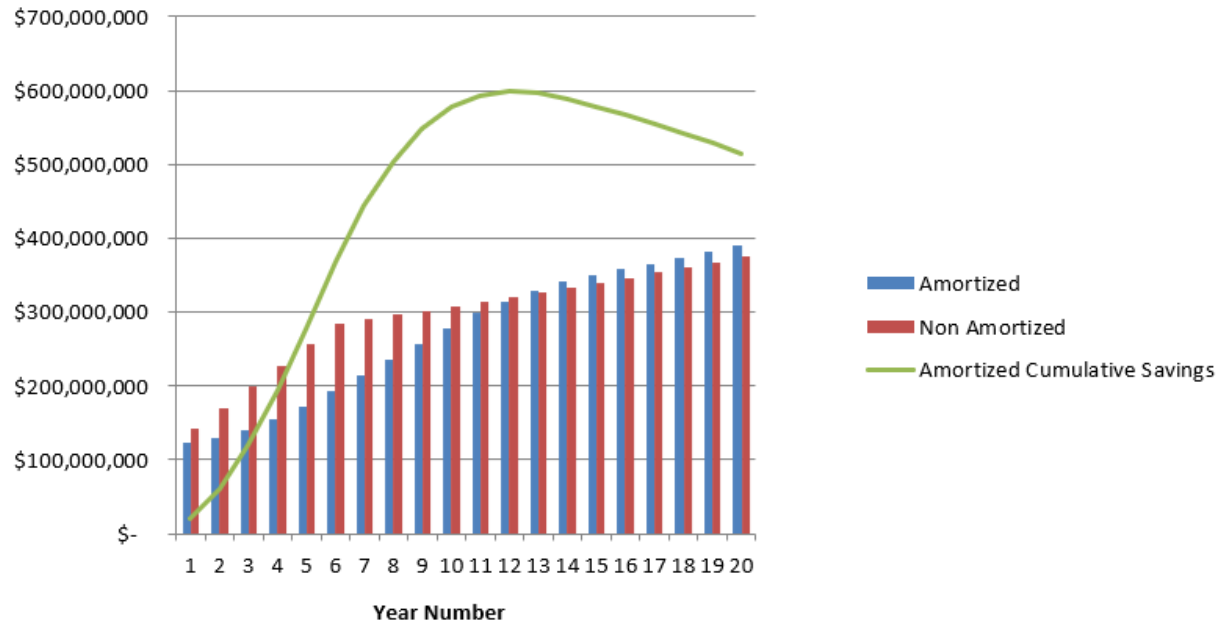
- The Board called upon Enbridge to "Play a role in meeting Ontario's greenhouse gas reductions goals". Ontario's 2018 Environment Plan which was in place when Enbridge made this application calls for 18MT of GHG reductions by 2030 from incremental gas conservation. While the Minister made it clear that Enbridge's DSM need not provide all of the reduction, Enbridge's plan would actually decrease its annual contribution to savings compared to business as usual when that plan was formulated. The company's proposal is on track to actually make a negative 12% contribution to meeting the 2018 Environment Plan's goal for incremental (beyond business as usual) GHG reductions from 2016-2030 (the Environment Plan's period).
- The Ontario government has recently published its Ontario Emissions Scenario as of March 25, 2022. In doing so it stated, "It is important to note that our modelling presents a point-in-time view. It will continue to evolve and be updated as policy development progresses." And, "As the Ontario Energy Board's decision on Enbridge's proposed 2023-2027 DSM plan is pending, MECP used a *conservative illustrative scenario*…" In other words, the government is deferring to the Board on what role DSM should play. What is clear is that the province and country have targeted absolute reductions in GHG emissions. Enbridge's DSM plan is not robust enough to offset more than half the load growth that Enbridge projects during the plan period. (emphasis added)
- The recently released federal government Emissions Reduction Plan calls for buildings emissions to fall from 91 to 53 MT (a 42% reduction) from 2019 - 2030. Enbridge proposes to make no incremental contribution to that goal relative to the level of savings it was already achieving in 2019.
- The Board called upon Enbridge to have regard to the Achievable Potential Study yet Enbridge's plan proposes savings below the most budget constrained scenario in that plan.
- The Board called for modest DSM budget increases "*in the near-term" and* "in order to *increase natural gas savings*" yet the company's plan would *reduce* savings relative to the level that they had been achieving prior to the Board's letter and treats near term as extending out 7 years!

- In its prior framework Decision the Board called upon Enbridge to have regard to net rate impacts and include analysis of demand reduction impacts on price in its next multi-year plan. Enbridge failed to provide an analysis of DRIPE or cross-fuel DRIPE for Ontario.

Savings targets and DSM budget need to ramp up aggressively

- Enbridge inappropriately bases its 2023 – 2027 savings and spending targets on the depressed performance experienced during Covid.
- Enbridge's proposes annual DSM savings at approximately 0.42% of sales in 2023 growing to 0.44 in 2027. It achieved 0.46% on average from 2017 to 2019.[1] GEC submits that the Board should indicate that it expects savings to be a minimum of 0.5% of sales in 2023 with an increase of 0.15% each year reaching 1.1% of sales in 2027. Other utilities have successfully managed ramp ups at considerably higher rates.
- GEC proposes that Enbridge be given an incentive to propose more aggressive plans. The current maximum available shareholder incentive should be available if the proposed plan targets 0.6% annual savings (with an average measure life of 15 years or more) and the maximum incentive should be linearly adjusted in proportion to the targeted sales level relative to the 0.6% level (and adjusted downward proportionately if average measure life declines below 15 years).
- Increasing savings from the 2017-19 average of 0.46 to 0.5% is an increase of 8.7%. If the Board is concerned about the potential costs of a ramp up, it could constrain budgets to an increase of 15% for 2023 and 20% annual increases (in real dollars) thereafter. However, by implementing amortization of DSM costs a more significant near-term increase can be accommodated.
- Several leading jurisdictions are achieving on the order of twice the savings to sales volume ratio that Enbridge proposes without proportionately higher budgets.
- With amortization, budget increases can enable significant increases in savings by 2027 with less rate impact than Enbridge's proposal in the near term as illustrated for a doubling of budget by 2027 in Optimal Energy J5.1:

[1] L.GEC/ED.1, p.10



- Enbridge should be directed to file an improved plan as soon as is feasible with higher targets as described above.

Putting Enbridge's *ad terrorem* arguments in perspective

Throughout the hearing Enbridge suggested that increasing DSM savings would lead to dramatic bill impacts and defeat the Board's expectation of modest budget increases in the near term and reasonable rate impacts. That claim is misleading for several reasons:

- Enbridge's depressed starting point, which in effect treats Covid effects as permanent, actually lowers DSM spending in real dollars until 2026 relative to the 2019 level that would have informed the Board's guidance.
- A significant increase in spending is possible before exceeding the Board's earlier guideline of $2/month in real dollars.
- Enbridge's analyses on the cost of higher savings, and the First Tracks reply evidence comparing Enbridge to leading jurisdictions, ignore the fact that higher participation inevitably raises the net to gross ratio resulting in more savings per program dollar spent.
- Mr. Shipley of the Posterity Group noted that the Achievable Potential Study included a residential program that accounted for 75% of the residential program costs but contributed only 2% of its savings. Removing that ineffective program

would lower the cost of the residential programs in the higher achieving scenario by 75%.

- Similarly, Mr. Shipley noted that the Achievable Potential Study included a commercial sector program that accounted for 44% of costs but achieved only "a tiny percentage" of savings. Removing that ineffective program would lower the cost of the commercial programs by 44%.
- Enbridge obfuscates by repeatedly focusing on DSM budget levels rather than the Board's obvious underlying concern for non-participant bill impacts. By largely ignoring those bill reducing impacts of DSM that are shared by non-DSM participants, Enbridge ignores the net impact of DSM on non-participant bills. Absurdly, Enbridge justifies this by saying that the Board's DSM letter did not refer to rate impacts.
- By ignoring amortization as an option, Enbridge has turned a blind eye to innovative approaches that can keep rate impacts low in the near term.
- Enbridge's proposed budget is 1.9% of gas bills which is a level swamped by the effects of both commodity price fluctuations and increasing carbon taxes. But unlike commodity price increases, it provides huge cost savings, environmental emission reductions and a risk-mitigating hedge for customers against future gas price volatility. The plan as proposed would provide $372 million in net benefits with a 3.29 benefit-cost ratio without counting price suppression effects and without utilizing a societal discount rate that would find higher net benefits. All the experts agreed that a higher budget would lead to more net benefits. The advent of inclining carbon pricing means the value of DSM will continue to grow.

Can the Board ensure that more budget would be applied effectively?

With appropriate budget and the right framework, the Board can largely avoid descending into program details.

- Effective shareholder incentives can enhance results. Enbridge has proposed numerous incentives that incent the wrong result or amount to simple money grabs. The Board should reject Enbridge proposals for:
    - Tying shareholder incentives to annual rather than lifetime savings
    - Starting shareholder incentives at 50% of target rather than 75%
    - A Net benefits incentive (accounting for 31% of shareholder incentives) starting at as low as 21% of 2027 targets and that would vary dramatically due to factors beyond the company's control

    - A Long-term GHG Reduction incentive that includes non-persisting savings, and would encourage chasing free riders by rewarding gross rather than net savings and would thus reward false savings

- Enbridge currently has an incentive to propose poor plans. Better plans can be encouraged by tying the total available shareholder incentive to the savings of future proposed plans (or the inclusion of such an incentive in a resubmittal of a plan for all or part of the period covered in the current application). Enbridge's plan proposes a .4% savings to volumes ratio. The available shareholder incentive could vary and be calibrated to provide the current level available if a redrawn plan proposes a .6% savings to volumes ratio in 2023.
- The current Target Adjustment Mechanism (TAM) rewards failure. As in all other jurisdictions, it should not adjust targets for participation.
- Scorecards should be simplified to avoid distortions. The Energy Performance Program should be covered by the commercial sector cubic meters scorecard. Participation metrics should be discarded.
- A social discount rate should be utilized for the TRC+ test to reflect the broad societal goals of DSM.

Enhanced energy efficiency and electrification is inevitably needed to address GHG reduction goals. Enbridge's conflict of interest must not be allowed to slow that imperative.

To get Enbridge's thumb off the scale the Board should:

- Reject the Building Beyond Code program which would entrench gas use and lead to lost opportunities for GHG reduction through electrification.
- Require that programs including the Low Carbon Transition program not incent gas-fired heat pumps or gas furnace replacements and only cover NEEP approved cold climate electric air source heat pumps (as part of hybrid gas-electric systems). Programs should not require participants to retain gas as the primary heat source.
- Require Enbridge to restrict its promotion of measures in all programs to those that will be valuable after electrification to align with policy goals and optimize customer savings.
- In the mid to long-term, consider a shift to third party program administration to overcome Enbridge's conflict of interest.

What procedural steps are needed to address the shortcomings in Enbridge's application?

- The Board has recognized that the vagaries of the proposed joint delivery of DSM programs with the Federal Greener Homes program will require a mechanism to ensure customer value, program effectiveness and fair attribution. To accommodate that need and to address the need for other revisions to the proposed framework and plan, while avoiding program disruption, the Board could give interim approval to a budget, give initial guidance as above, create appropriate deferral and variance accounts, and require Enbridge to file an updated application or parts thereof. The Board could subsequently conduct an expedited review designed to reflect the extent of the refiling recognizing the issues that have been adequately addressed in this proceeding.
- Given the urgency of GHG reduction, the shifting policy context, the potential to enhance customer savings, the volatility of commodity costs, and the tremendous uncertainties surrounding the residential program co-delivery as well as the possibility of new IESO initiatives, GEC would suggest a two-to-three-year term rather than the 5 years Enbridge proposes.

Submissions by Issue

Issue 1: Does Enbridge Gas's 2023-2027 DSM Framework and DSM Plan adequately respond to previous OEB direction and guidance on future DSM activities?

Enbridge has ignored or misconstrued key aspects of this Board's guidance:

a. Help meet Ontario's GHG reduction goals and DSM policy goals

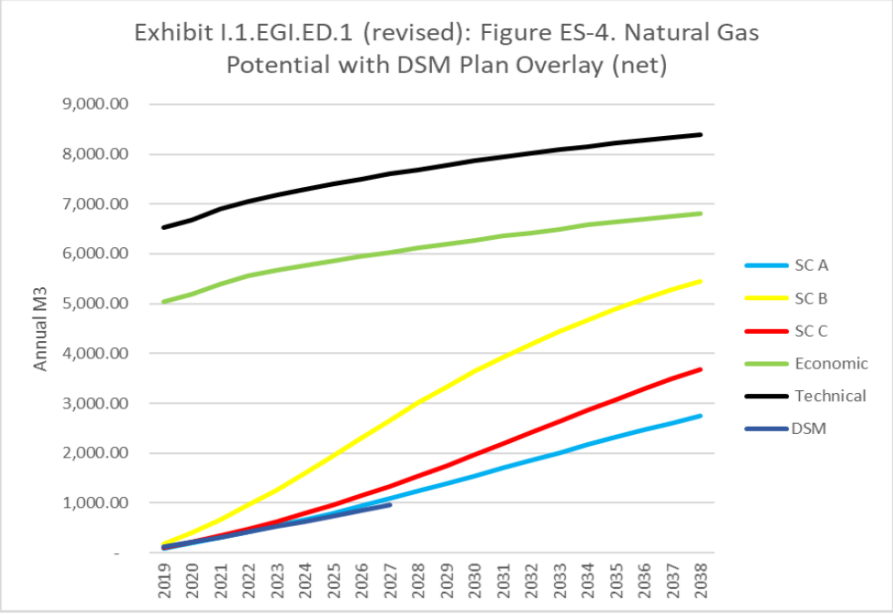
The Board called upon Enbridge to "Play a role in meeting Ontario's greenhouse gas reductions goals". As discussed below under Issue 2, the company's proposal is on track to actually make a *negative* 12% contribution to meeting the 2018 Environment Plan's goal for incremental (beyond business as usual) GHG reductions from 2016-2030 which was the government goal in place when Enbridge's plan was conceived and filed. The Ontario government has recently published its Ontario Emissions Scenario as of March 25, 2022. In doing so it stated, "It is important to note that our modelling presents a point-in-time view. It will continue to evolve and be updated as policy development

progresses." And, "As the Ontario Energy Board's decision on Enbridge's proposed 2023-2027 DSM plan is pending, MECP used a conservative illustrative scenario…" In other words, the government is deferring to the Board on what role DSM should play. What is clear is that the province and country have targeted absolute reductions in GHG emissions. Enbridge's DSM plan is not robust enough to offset more than half the load growth that Enbridge projects during the plan period.

The Board's DSM letter also asks that the application should be informed by "the Ontario government's current policy objectives related to DSM". The most current indication of that policy (i.e. specifically about DSM) can be found in the November 2021 Mandate Letter which includes support for "a framework that delivers increased natural gas conservation savings". The proposed plan does not even reach pre-Covid levels of savings per unit of gas sales by 2027.

b. Have regard to the Achievable Potential Study

The Board called upon Enbridge to have regard to the Achievable Potential Study yet Enbridge's plan proposes savings below the most cost-constrained scenario in that plan despite a higher budget.[2]



[2] L.GEC/ED.1, pp. 14-15

In considering the 2019 APS it is important to recognize several factors that indicate the study underestimated achievable savings while overestimating costs. Experts from Posterity, EFG, Optimal and GEEG all agreed that achievable potential studies have routinely underestimated cost-effective savings, in some cases finding only half of what is subsequently actually achieved.[3]

Mr. Shipley agreed that the 2019 APS appears to not to have captured the increase in carbon charges beyond $50 which would both increase the value of DSM and make more measures cost-effective. He also noted that the industrial savings fail to account for customer-specific savings opportunities in the industrial sector, could not account for emerging technologies, or for new program approaches. [4]

Mr. Shipley also noted that the Achievable Potential Study included a residential program that accounted for 75% of the residential program costs but contributed only 2% of its savings. Removing that ineffective program would lower the cost of the residential programs in the higher achieving scenario by 75%.[5]

Similarly, Mr. Shipley noted that the Achievable Potential Study included a commercial sector program that accounted for 44% of costs but achieved only "a tiny percentage" of savings. Removing that ineffective program would lower the cost of the commercial programs by 44%.[6]

Enbridge dismissed the APS scenarios as too expensive, going so far as to inflate the cost estimates of gross savings by assuming that Enbridge's 56% free-ridership could be applied to gross up the APS costs in higher achieving scenarios.[7] As discussed below under Issue 3 in regard to comparisons with leading jurisdictions, Enbridge's approach is fundamentally flawed as all the experts, including Mr. Weaver, agreed, that as budgets and participation increase, Net to Gross improves (free-ridership falls).

Similarly, when Enbridge did its sensitivity analysis in JT1.15 it overestimates costs (or underestimates savings for a given expenditure) because it failed to adjust the net-to-gross ratios upward when it estimated savings attainable from added budgets.[8] This despite explicit direction in the APS to use expected rather than current net to gross

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[3] GEEG at v.5, p. 21, Optimal at v.5, p. 171 *et seq*, Posterity at v 5, p 70, EFG at L.GEC/ED.1, p. 14
[4] Vol.5, p.70-71
[5] Vol.5, p. 86
[6] ibid
[7] See discussion at V.2, pp. 132 -135
[8] V.2. p. 139

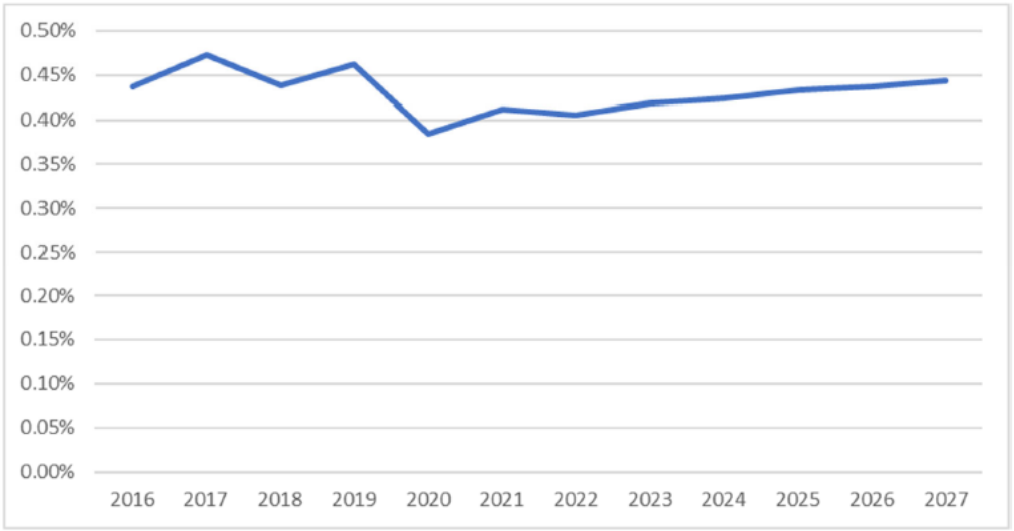
values when utilizing the study. Enbridge's dismissal of this effect reflects the fact that the utility seems to be incapable of recognizing the potential for improved program design to improve its less than stellar free-ridership rates.

Notably, in considering the cost of APS scenarios Enbridge did not adjust the APS cost estimates for the residential and commercial programs for the 75% and 44% cost reductions that its own consultant, Posterity, suggested were appropriate.

c. Increase natural gas savings

The Board called for modest DSM budget increases in the near-term "in order to *increase natural gas savings*" yet the company's plan would *reduce* savings for DSM eligible customers relative to the level that they had been achieving per unit of sales in 2019, which is the level that the Board would have had information on when drafting its letter. Savings averaged 0.46% of sales in the 2017-2019 period but Enbridge proposes targets of 0.42% in 2023 growing to 0.44% in 2027.[9]

Historic and Planned Savings as a Percentage of Eligible Sales (L.GEC/ED.1 Fig. 3)



The statistics indicating which program results fell from 2019 to 2019 indicate that over 88% of the total savings drop was in the C&I Direct Instal and Prescriptive 84%

[9] L.GEC/ED.1, p.10

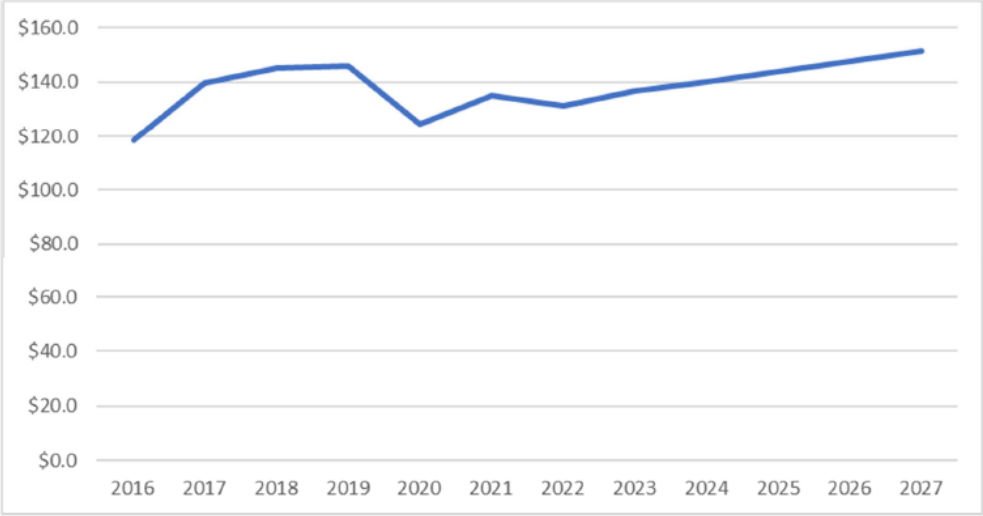
programs. This is consistent with most of the drop being a temporary phenomenon due to Covid:[10]

Program	2020 (million m3)			2019 (million m3)			Difference (million m3)		
	Enbridge	Union	Total	Enbridge	Union	Total	Enbridge	Union	Total
C&I Custom	21.7	32.0	53.7	24.3	33.4	57.7	-2.6	-1.4	-4.0
C&I Direct Install	1.7	0.3	2.0	7.7	4.9	12.6	-6.0	-4.6	**-10.6**
C&I Prescriptive	1.6	1.6	3.2	3.0	7.8	10.8	-1.4	-6.2	**-7.6**
Other C&I	0.2	0.0	0.2	0.3	0.0	0.3	-0.1	0.0	-0.1
Res T-stats	3.1	1.2	4.3	2.3	0.6	2.9	0.8	0.6	1.4
Res Retrofit	7.0	5.0	12.0	8.8	6.2	15.0	-1.8	-1.2	-3.0
Low Income	4.5	3.0	7.5	5.8	3.6	9.4	-1.3	-0.6	-1.9
Large Volume	0.0	12.2	12.2	0.0	7.0	7.0	0.0	5.2	5.2
Total	39.8	55.3	**95.1**	52.2	63.5	**115.7**	-12.4	-8.2	**-20.6**

d. Modest budget increases in the near term

Enbridge's depressed starting point, which in effect treats Covid effects as permanent, actually lowers DSM spending in real dollars until 2026 relative to the 2019 level that would have informed the Board's guidance when it crafted its DSM letter.

Enbridge Historic and Planned DSM Spending (Millions of 2021$ - L.GEC/ED.1 Fig. 3)



Moreover, the Board's call for "modest budget increases… in the near-term" was preceded by the observation: "With COVID-19 creating many financial hardships, energy

[10] JT3.1

conservation has a role in helping to reduce energy costs and assist customers in managing their energy bills." Accordingly, we interpret the Board's reference to the "near-term" as being a particular concern about rate impacts during the currency of the economic disruption caused by the Covid pandemic. Fortunately, despite repeated Covid waves, Covid-induced economic hardships are already receding. Thus "near-term" within the meaning of the Board's letter might reasonably be considered to have been the 2021-2022 period during which there were no DSM budget increases in nominal terms and a decrease in real dollars.

It is notable that the Minister's mandate letter to the Board issued a year after the Board's DSM letter expresses "strong interest in a framework that delivers increased natural gas conservation savings".

A ramp up of DSM spending starting in 2023 can address the objectives contained in the DSM letter as "near-term" budget increases have already been avoided. If the Board is concerned that 2023 is too soon to ramp up spending to meet its other stated objectives, amortization (discussed below) can be utilized to defer rate increases while allowing expansion of DSM.

We address the issue of budget increases in greater detail under Issue 6, below.

e. Analyse net rate impacts

In its prior framework Decision the Board called upon Enbridge to have regard to net rate impacts and include analysis of demand reduction impacts on price in its next multi-year plan.[11] Given that gas-fired generation is the marginally dispatched resource (and therefore market price-setting resource) on Ontario's electricity system, cross-fuel DRIPE may be particularly important in Ontario. All gas customers are electricity customers and could see energy bill reductions due to DSM affecting the market price of gas. Enbridge's evidence referenced DRIPE in selected U.S. jurisdictions but failed to provide an analysis of DRIPE or cross-fuel DRIPE in the Ontario context as the Board requested.

The EFG, GEEG and Optimal experts all agreed that DRIPE should be considered in evaluating bill impacts.[12]

[11] EB-2015-0029 / EB-2015-0049, Decision p. 87 (included in I.1.EGI.ED.2)
[12] GEEG at v. 5 p. 24, Optimal at v.5, p 173, EFG at L.GEC/ED.1, p.17

Enbridge's proposed DSM budget is just 1.9% of gas bills which is a level swamped by the effects of both commodity price fluctuations and increasing carbon taxes.[13]

Issue 2: Does the Framework and Plan support energy conservation in accordance with Ontario's policies, including having regard to consumers' economic circumstances?

As noted above, Ontario's 2018 Environment Plan called for 18MT of GHG reductions from 2016 to 2030 from incremental gas conservation. Enbridge's plan would actually *decrease* its annual contribution to savings compared to the status quo when that plan was formulated. The company's proposal is on track to actually make a *negative* 12% contribution to meeting the 2018 Environment Plan's goal for incremental (beyond business as usual) GHG reductions from 2016-2030.[14] Even Enbridge's analysis (inappropriately based on a depressed 2020 baseline) finds that it contributes only 1/18th of the gas conservation in the 2018 Environment Plan despite the fact that Enbridge delivers the vast majority of gas used in Ontario.

Also as noted above, the Ontario government has recently published its "Ontario Emissions Scenario as of March 25, 2022. In doing so it stated, "It is important to note that our modelling presents a point-in-time view. It will continue to evolve and be updated as policy development progresses."[15] And, "As the Ontario Energy Board's decision on Enbridge's proposed 2023-2027 DSM plan is pending, MECP used a conservative illustrative scenario…" In other words, the government is deferring to the Board on what role DSM should play.

The Minister's mandate letter to the Board issued a year after the Board's DSM letter expresses "strong interest in a framework that delivers **increased** natural gas conservation savings".

The recently released federal government Emissions Reduction Plan calls for buildings emissions to fall from 91 to 53 MT (a 42% reduction) in the buildings sector from 2019 - 2030. Enbridge proposes to make no incremental contribution to that goal relative to the level of savings it was already achieving in 2019.

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[13] Compared to 2.9% experienced for 2017-2019

[14] KP1.6 EFG Presentation slide 8. For different base years see K2.4. excel tabs 2-5

[15] https://prod-environmental-registry.s3.amazonaws.com/2022-04/Ontario%20Emissions%20Scenario%20as%20of%20March%2025_1.pdf and https://ero.ontario.ca/notice/019-5316#supporting-materials

The province and country have targeted absolute reductions in GHG emissions. Enbridge's DSM plan is not robust enough to offset even half the load growth that Enbridge projects. Enbridge forecasts that gas volumes before DSM will rise by 1,606,547 10^3m^3 from 2023 to 2030 whereas DSM will save 758,351 10^3m^3 in that same period.[16]

As discussed under issue 6 greater savings can be achieved while having regard to consumers' economic circumstances, i.e. without unreasonable rate impacts.

Issue 3: Is Enbridge Gas's plan consistent with energy conservation industry best practices in other jurisdictions?

EFG provided a high-level comparison of Enbridge's savings to sales ratio with those of leading cold climate jurisdictions. While all the experts agreed that budget is a key factor, three of the five jurisdictions had savings ratios that were more than twice Enbridge's without having budgets that were disproportionately higher (Massachusetts utilities being the exception).[17]

In his reply evidence, Mr. Weaver identified four adjustments, other than spending levels, that he suggested one would need to address in making comparisons between Enbridge savings levels and those of utilities in other jurisdictions. In JT3.3 Mr. Neme provided a detailed response noting that without such adjustments, the average annual savings in these jurisdictions was nearly three times Enbridge's planned savings for 2023. With Mr. Williams' adjustments, other than the adjustment of net to gross (NTG) which we address below, their average savings are still more than double Enbridge's planned savings for 2023.

It is important to note that Mr. Weaver only included adjustments that lowered the comparator jurisdiction results. He did not include relevant adjustments that would raise the relative performance of the comparison jurisdictions. As a conservatism Mr. Neme did not either, although he noted that asymmetry in his analyses and offered one such example.

This was all summarized in KP1.6, EFG presentation slide 9:

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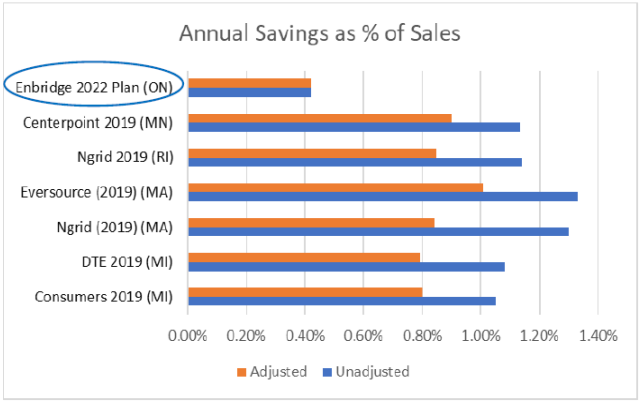
[16] I.EGI.SEC.1 (a) and (d)

[17] JT3.3 and KP1.4, First Tracks slide 32 "Enbridge spends slightly more than Michigan and Minnesota utilities when normalized for throughput".

Planned Savings – at Best – ~50% Less than Leading Gas Utilities



- 60-70% less than reported savings of leaders
- ~50% less after adjusting for advantages of leaders (other than higher budgets)
  - Proper adjustments for all issues raised by Enbridge witness Weaver
  - Conservatively made no adjustments in the other direction for advantages Enbridge has relative to others (e.g., ability to claim much larger savings from commercial boilers)

The largest difference between the EFG adjusted values and those of First Tracks was due to Mr. Weaver's further derating of the savings for these leading jurisdictions by applying Enbridge's relatively low Net-to-Gross ratio (NTG). Mr. Neme rejected such an adjustment noting:

> "There is no reason to normalize for different NTG ratios because those ratios are primarily a function of program design rather than something that is endemic to a given jurisdiction. Put another way, Enbridge could increase its NTG ratio by changing its program design. Ontario's Evaluation Consultant has actually made recommendations to this effect."[18]

The falacy of Mr. Weaver's application of Enbridge's NTGs in his comparisons is best illustrated by his own testimony:

Under cross-examination Mr. Weaver agreed that NTG is a function of program design:

> MR. POCH: Okay. Let me see if I understand. Over time, if a utility can refine its program designs, it can affect its free rider rate. I think you would agree with that.
>
> MR. WEAVER: Yes. I think there are things that a utility can do to improve the program design to improve the free rider rate.[19]

Mr. Weaver went on to say:

[18] JT3.3, p. 2 of 5
[19] Vol.4, p. 185

> …I don't think it is reasonable or good policy or best practices that whatever net-to-grosses are determined today should be applied to Enbridge over the next five or six years.[20]

He further noted:

> …And so with higher budgets you can afford higher rebates, and I agree, and Mr. Neme has been saying this, that with higher rebates you have fewer free riders and therefore a higher net-to-gross.[21]

And:

> MR. POCH:… -- if you can increase your participation you are going to likely improve your net-to-gross –
>
> MR. WEAVER: Yes.[22]…
>
> MR. POCH: Just to wrap this up, by applying Enbridge's -- what are lower net-to-gross numbers to these other utilities, you are removing any difference in net-to-grosses that may be due to these utilities either having better program design -- well, having better program design whether it is due to higher budgets or otherwise.
>
> MR. WEAVER: I guess so….[23]

Mr. Weaver went on to defend Enbridge's performance, which defence should be taken with a grain of salt given his acknowledgement that he had not made an assessment of Enbridge's program design, or performance, or portfolio savings goals, or cost-effectiveness:[24]

> MR. POCH: …Given that you haven't assessed Enbridge -- as you indicated at the start today, you haven't assessed Enbridge's program designs. Isn't it possible that Enbridge has low net-to-gross ratios for values for some programs in part because its program designs and incentives are just sub optimal? You're not in a position to say, really?

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[20] Vol.4, p. 186
[21] Vol.4, P.188
[22] Vol.4, p.189
[23] Vol.4,p.196
[24] Vol.4, p.183

> MR. WEAVER: Yeah. Again, I don't know what each of their program designs are and how they have done that. But I will say I know that -- I know they're operating under a budget constraint.[25]

Of course, alleviating that budget constraint is the very topic before the Board.

Both the Optimal Energy and GEEG expert witnesses agreed that net to gross is a function of program design.[26]

It is clear that Enbridge's proposed plan does not compare favourably with leading jurisdictions and that much higher savings have been demonstrated to be achieved without disproportionate increases in spending.

Issue 4. Is Enbridge Gas's proposed DSM Plan term appropriate?

We are now in an era where we are seeing dramatic changes in the role of gas and efficiency unfolding. For example, during the course of the oral hearing the Massachusetts utilities filed a proposal to cut natural gas sales to zero by 2050 with a 60% reduction in throughput and the balance met by RNG.[27] We also witnessed how the volatile situation in Ukraine may have lasting impact on North American energy pricing.

Given the urgency of GHG reduction, the shifting policy context, the potential to enhance customer savings, the volatility of commodity costs, and the tremendous uncertainties surrounding the residential program co-delivery as well as the possibility of new IESO or federal initiatives, GEC would suggest a two-to-three-year term rather than the 5 years Enbridge proposes. This would allow time for results of two or three years to inform any needed changes. However, GEC appreciates that a longer planning horizon assists the company and can offer some regulatory efficiency. Accordingly, GEC submits that the Board should only consider approving a five-year term if it includes a significant ramp up in savings and if the mid-point review is a substantial review that can adjust targets and budgets as required to ensure that DSM makes a meaningful

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[25] Vol.4, p.195 Further, even in making his NTG adjustment Mr. Weaver erred by applying Enbridge's combined commercial and industrial NTG value to the predominantly commercial savings of the comparison jurisdictions. Since Enbridge has more large volume and industrial sales and a very low large volume NTG, applying the combined value to the largely commercial savings of these other jurisdictions resulted in an exaggerated adjustment (See Vol.4, p. 193).

[26] GEEG at v 5 p. 22, Optimal at v 5 p. 172 *et seq*

[27] K2.3, tab 11

contribution to meeting GHG policy goals and providing customer savings. However, as discussed under Issue 5.c, GEC proposes that Enbridge be required to refile an improved plan as soon as is feasible with higher budgets and targets and clarity concerning the Green Homes program coordination.

Enbridge should be required to refile its plan and any approval should be limited to a two or three-year period.

Issue 5. Is the proposed DSM policy framework, including guiding principles and guidance related to budgets, targets, programs, evaluation, and accounting treatment appropriate?

a. Guiding Principles:

GEC generally agrees with Enbridge's proposed guiding principles.

b. Budgets:

Given that DSM measures are highly cost-effective and provide significant benefits to participants and the environment, the acceptability of budgets turns on the reasonableness of its rate impact in light of the scale and necessity of benefits. This is addressed in GEC's submissions under Issue 6.

c. Targets:

With respect to targets, the company's proposed or estimated natural-gas savings for 2023 to 2027 are on average less than what it achieved on average from 2017 to 2019, inappropriately start at a depressed level based on performance during the peak of Covid, ramp up slowly, and are simply inadequate to achieve the Board's stated objectives for DSM. See this discussed under issues 1 and 2, above.

As noted above, over 88% of the total savings drop from 2019 to 2019 was in the C&I Direct Instal and Prescriptive 84% programs. This is consistent with most of the drop being a temporary phenomenon due to Covid:[28]

As discussed under issue 9.a, The Target Adjustment Mechanism provides a perverse incentive to the company and should be dropped. Instead, annual targets should ramp up from the 2019 level of 0.46% to a minimum of 0.5% of sales in 2023 with an increase of 0.15% each year reaching 1.1% of sales in 2027. Other utilities have successfully

[28] JT3.1

managed ramp ups at considerably higher rates.[29] The rate impact of this proposal is discussed below under issue 6.

As discussed under Issue 8, Enbridge's should be offered an incentive to propose even more aggressive plans. GEC proposes that the Board call upon the company to refile its application in a subsequent phase of this proceeding. In the current phase the Board should create an incentive for the company to propose a more aggressive plan by linking the size of the total available shareholder incentives to the savings to volume ratio that Enbridge proposes (See discussion under Issues 8.d). Mr. Neme cited the example of Michigan where after such an incentive was introduced the utility proposed to ramp up its savings from 1% to 1.5% within months.[30]

d. Evaluation:

Enbridge appears to be proposing a freeze on evaluation protocols that are currently subject to updating during the plan period.[31]

GEC submits that there is no rationale for freezing evaluation methods rather than using best available methodology as it evolves.

e. Accounting Principles:

See discussion of amortization below, under Issue 7.

Issue 6. Does Enbridge Gas's proposed budget result in reasonable rate impacts while addressing the OEB's stated objectives?

The reasonableness of rate impacts is not something that can be determined without evaluating the scale of benefits that DSM can provide, the necessity of meeting the Board's stated objectives including customer savings and GHG reductions, and the extent to which vulnerable consumers can be protected. In the absence of these competing factors any rate impact would be unsupportable.

In 2022 the need to reduce GHG emissions has become an increasingly dominant consideration that the Board has recognized in its stated objectives and that all levels of government have endorsed.

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[29] K2.3 tab 38
[30] TC transcript March 2, p. 6
[31] EGI Argument para. 41

The Intergovernmental Panel on Climate Change (IPCC)'s latest report on climate change mitigation was released during the course of this proceeding. UN Secretary-General António Guterres warns of an "enormous, growing emissions gap," adding up to a "file of shame" the puts humanity "on a fast track to climate disaster: Major cities underwater. Unprecedented heat waves. Terrifying storms. Widespread water shortages. The extinction of a million species of plants and animals."

In the face of this existential crisis, Enbridge has offered a plan that is actually worse than business as usual. Adding insult to injury, it reduces the proportion of spending directed toward low income customers. And displaying the company's true colours, as seen in the table below[32], the only increase in real dollars over the plan period is for market transformation programs that are largely about fostering use and development of gas-fired equipment and adding or retaining gas customers – i.e. putting Enbridge's thumb on the scale of customer and contractor choice and code development.

Proposed Budgets - 2023-2027							
	2023	2024	2025	2026	2027	% Change (2023 versus 2027)	% Change (2023 versus 2027)
						Nominal	Inflation Adjusted[1]
Resource Acquisition (incl. all but market transformation)	$110.9M	$113.1M	$115.3M	$117.6M	$120.0M	8.2%	0.0%
Percent Increase	N/A	2.0%	2.0%	2.0%	2.0%		
Market Transformation	$13.0M	$17.0M	$21.3M	$25.8M	$30.6M	135.0%	117.1%
Percent Increase	N/A	30.7%	24.9%	21.3%	18.7%		
Total Program	$123.9M	$130.1M	$136.6M	$143.4M	$150.6M	21.6%	12.3%
Portfolio Overhead[2]	$18.4M	$18.7M	$19.1M	$19.5M	$19.9M	8.2%	0.0%
Total	$142.3M	$148.8M	$155.7M	$162.9M	$170.5M	19.8%	10.7%

[1]Assumed 2% annual inflation.
[2]Includes all Portfolio level costs (admin & non-admin)

It is not until 2025 that, in inflation adjusted terms, the company's proposed budget would be greater than the actual budget in 2018 -- not just the 2018 spend which was higher due to the DSMVA enabled overspend, but the 2018 budget.[33]

In 2019 dollars Enbridge's 2023 budget is $102 million which is actually lower than its 2020 budget of $105 million or its 2019 budget of $104 million.[34]

[32] I.6.EGI.ED.20, p.5 and see J1.4 p.2
[33] Vol 4, p.83
[34] I.6.EGI.ED.20,p.4

As discussed below under Issue 7, amortization can enable a substantial increase in the DSM budget while containing rate impacts in the near-term. While amortization will tend to raise the revenue requirement in later years, DSM offers several offsetting rates reducing and/or bill reducing effects over time.

Past DSM participants continue to enjoy bill reductions for the life of the measures they installed. Future DSM participants will similarly benefit in future periods. The plan as proposed will create $372,260,124 of net benefits, the bulk of which is the commodity savings enjoyed by DSM participants.[35] The cumulative net benefits of Enbridge's historic DSM programs now amounts to billions of dollars in customer savings.

Mr. Mosenthal gave the example of a study he did in New Hampshire for electric conservation where he found that buying just two efficient lightbulbs offset the rate impact of the DSM programs.[36] In Ontario we have had gas DSM for decades and these programs, whether resource acquisition programs or market transformation programs, have accelerated penetration of cost-saving technologies, and advanced energy efficiency codes and regulations. It is virtually certain that all customers are enjoying reduced gas bills today as a result, whether they were direct participants in those programs or not.

All customers including non-participants will enjoy the infrastructure cost savings that DSM will provide by deferring or avoiding the need for T&D investment over time. Enbridge's witnesses agreed that customers are enjoying lower rates and bills today due to the long history of DSM programs in Ontario.[37] Current programs will add to that effect for future customers.

All customers will enjoy the benefit of lower gas demand lowering marginal commodity costs for both gas and electricity, known as DRIPE and cross-fuel DRIPE. In its prior framework Decision the Board called upon Enbridge to have regard to net rate impacts and include analysis of demand reduction impacts on price in its next multi-year plan. Enbridge provided some U.S. data but failed to provide an analysis of DRIPE or cross-fuel DRIPE in the Ontario context. However, Mr. Johnson, commenting on cross-fuel DRIPE noted "your price impacts in one jurisdiction can vary dramatically from another".[38] Given the reliance of Ontario's electricity system on gas-fired generation at the price

[35] Exhibit D, Tab 1, Schedule 4, Page 2 of 2
[36] V.5p.173
[37] Vol. 2, p. 150
[38] Vol.2, p. 151

setting margin for the foreseeable future, cross-fuel DRIPE may be of considerable benefit to all gas customers who are invariably electricity consumers too.

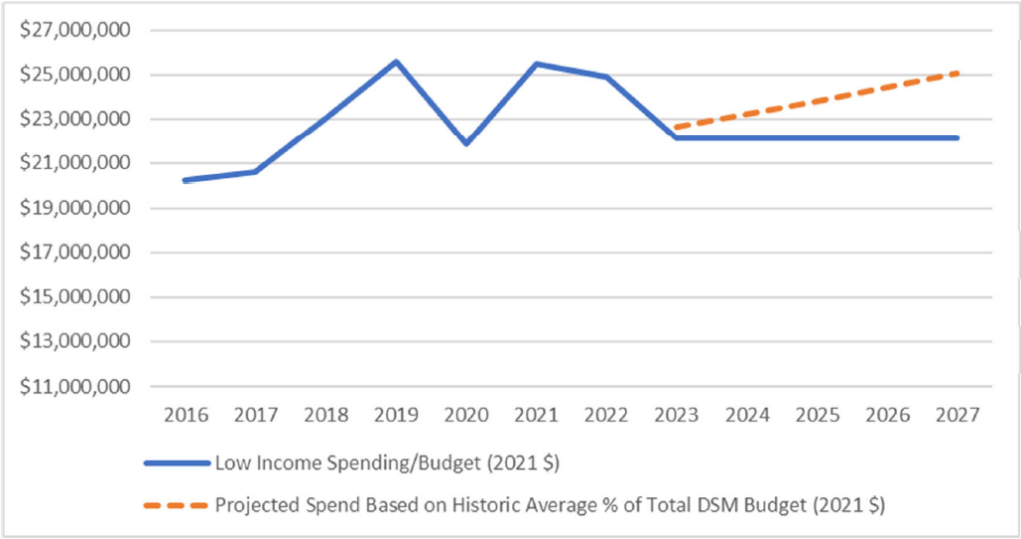
One available yardstick for a reasonable rate increase can be found in the Board's prior framework Decision where the Board offered a $2/month guideline for acceptable rate impact. Enbridge has calculated that the $2 value escalated ($2.27 in 2019) would allow a $187,305 spend in 2023 as opposed to the $132,107 they propose, a 42% increase.[39]

Further, the $2 value does not account for the rate reducing impacts that all customers, including non-DSM participants, will enjoy as a result of T&D avoidance, DRIPE and cross-fuel electricity DRIPE nor the bill reductions that past participants enjoy.

Enbridge predicts that its plan will cost Rate 1 customers $1.76 per month, the price of one medium coffee at Tim Hortons. Given the immense need for DSM and its immense benefits, a rate impact three or four times this level cannot be considered unreasonable for all but the most vulnerable of Enbridge's customers.

Accordingly, the best mechanism to mitigate the deleterious effects of any rate impact is an increased focus on low income programs. As evident from the graphic below and discussed under Issue 9.c, Enbridge's plan rejects that option:

Historic, Planned and Projected Spending on the Low Income Program (2021 $) L.GEC/ED.1 Figure 6



The proposed joint delivery of residential programs with the Federal Greener Homes program offers a potential avenue to free up budget for reallocation to improve

[39] I.5.EGI.ED.12 at p. 7. It is not clear whether Enbridge adjusted for the growth in the number of customers it forecasts which would reduce the rate impact of the DSM budget per customer.

coverage of the low income sector. The Board may wish to direct Enbridge to place emphasis on this objective.

As noted above, the Board's call for "modest budget increases… in the near-term" was preceded by the observation: "With COVID-19 creating many financial hardships, energy conservation has a role in helping to reduce energy costs and assist customers in managing their energy bills." Accordingly, we interpret the Board's reference to the "near-term" as being a particular concern about rate impacts during the currency of the economic disruption caused by the Covid pandemic. Fortunately, despite repeated Covid waves, Covid-induced economic hardships are already receding. Thus "near-term" within the meaning of the Board's letter might reasonably be considered to have been the 2021-2022 period during which there were no DSM budget increases in nominal terms and a decrease in real dollars.

A ramp up of DSM spending starting in 2023 can address the objectives contained in the DSM letter as "near-term" budget increases have already been avoided. If the Board is concerned that 2023 is too soon to ramp up spending to meet its other stated objectives, amortization (discussed below) can be utilized to defer rate increases while allowing expansion of DSM.

Enbridge provides ramp up scenarios in JT1.15 and JT1.16. However, as discussed under Issues 1 and 3, Enbridge's failure to account for improving Net to Gross as participation rises, and its failure to correct major errors in the APS that Mr. Shipley uncovered, suggest that Enbridge's assumed cost for savings increases will be significantly exaggerated.[40]

Finally, it should be noted that Enbridge is forecasting customer numbers to increase roughly 1% per year which alone would offset a similar increase in budget.[41]

GEC submits that a significant increase in the DSM budget can occur without unreasonable rate impacts especially if increased emphasis is placed on low income program participation. GEC has suggested Increasing savings from the 2017-19 average of 0.46 to 0.5% in 2023 which would be an increase of 8.7%. Such an increase could be expected to require less than a 15% budget increase. If the Board is concerned about the potential costs of such a ramp up, it could constrain budgets to an increase of 15% for

[40] In its Argument at para. 61 Enbridge laughingly refers to its sensitivity analyses as "proving" dramatically diminishing savings returns for added budget. This is simply self-serving conjecture.
[41] I.5.EGI.LIEN.5, b.

2023 and 20% annual increases (in real dollars) thereafter. However, by implementing amortization of DSM costs a more significant near-term increase can be accommodated.

Issue 7. Is Enbridge Gas's proposed cost recovery approach appropriate while addressing the OEB's stated objectives in its letter issued on December 1, 2020?

a. Amortization

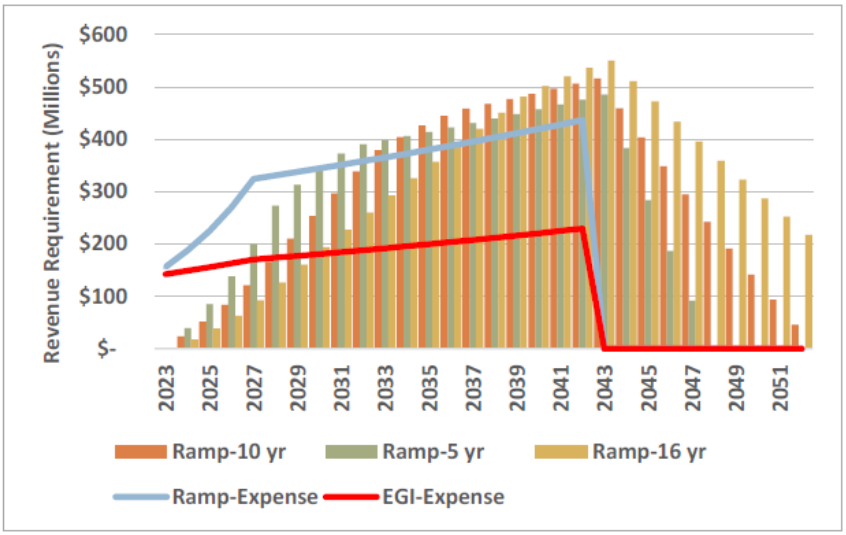
In its Mid-Term Review Report the Board noted that it would consider amortization as part of its post 2020 DSM Framework. Board staff and Enbridge, in its reply evidence, addressed the issue. As we have already noted, GEC is supportive of amortization as it offers a mechanism to offer modest (or even reduced) rate increases in the near term if the Board determines that that is desirable, while enabling a significant ramp up of DSM spending and savings over time to address the Board's objectives of reducing customer costs and contributing to GHG reduction.

As discussed above, the urgency of the climate crisis and the need to meet 2030 policy targets warrants a concerted effort to advance energy efficiency now. If concern for near-term rate increases is a barrier, amortization is the answer.

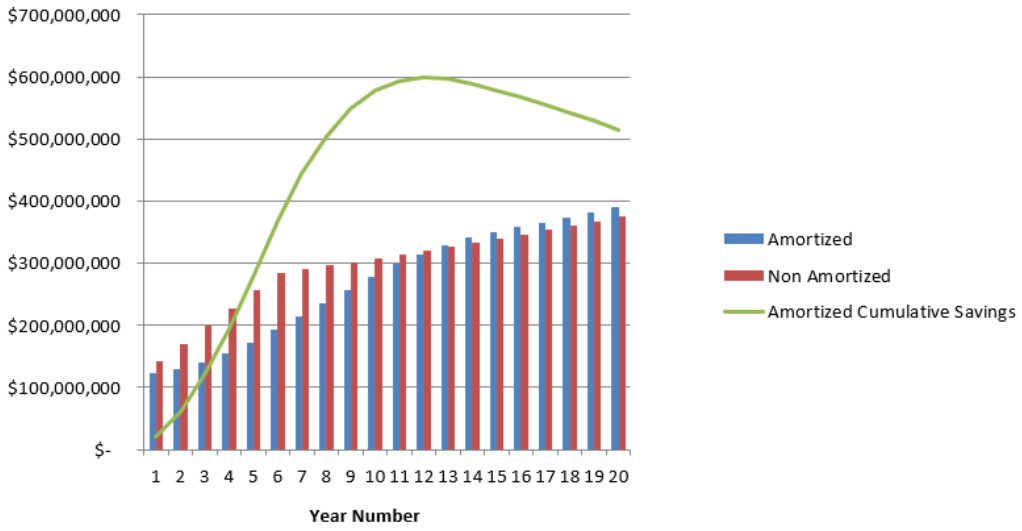
Amortization is also desirable since it can better match customer costs and benefits over time.

Mr. Weaver raised a potential concern that utility investors might be wary of the regulatory assets due to amortization. However these balances pale in comparison to the roughly $25 billion in undepreciated rate base and several experts noted that they would be far more concerned about the possibility of gas infrastructure assets being stranded versus efficiency investments that will continue to have value after electrification.

The impact of amortization in the context of a DSM ramp up is illustrated in Mr. Weaver's exhibit J4.5, Figure 5 which has a 10% budget increase for 2023 and 20% each year thereafter for 2024 – 2027 and assuming the tax benefit reduces the size of the regulatory asset:



Optimal provided their analysis of a similar ramp up to a doubling of budget by 2027 with a 10 year amortization in J5.1. with a range of assumptions for tax treatment and discount rate. Their chart reproduced below illustrates the scenario with a 10 year amortization and 0% discount rate with tax savings reducing the amortized expense:



The experts generally agree that the ideal period of amortization is the average life of measures, as it best matches customer costs and benefits. Enbridge's average measure life is over 16 years. However, Mr. Weaver suggested that in light of the possible major disruption to the gas sector due to GHG concerns, a shorter, 5 year period may be preferable. GEC suggests that a reasonable compromise would be a 10 year amortization period.

As Optimal and EFG noted, given the purposes of DSM a social discount rate is an appropriate basis to analyse the impact of amortization.

The Board should consider amortizing DSM costs to enable higher budgets in the near term and to achieve better temporal matching of customer costs and benefits.

Issue 8. Are Enbridge Gas's proposed shareholder incentives appropriate?

a. Is Enbridge Gas's proposed annual maximum shareholder incentive, including structure, and amount appropriate?

GEC submits that the maximum level of the available shareholder incentives is only acceptable if it is tied to a commendable level of savings. As discussed under Issues 1, 2, and 3, we do not view the proposed plan as achieving that standard.

Further, as discussed under Issue 8.d, GEC submits that there is no incentive for Enbridge to propose better plans. The amount should vary according to the aggressiveness of the proposed plan.

GEC does support the proposal to disaggregate the incentive among the various scorecards as that will help ensure equitable sectoral coverage. However, Enbridge has proposed a total of 21 different performance metrics. There are numerous components in the proposed set of shareholder incentives which should be removed, or altered. In summary:

- All of Enbridge's proposed shareholder incentives apart from those incenting net gas savings should be rejected (with the possible retention of participation-based incentives for the Low Carbon Transition and Building Beyond Code programs if those programs are appropriately reconfigured).
- Net gas savings incentives should be based on lifetime not annual savings.
- The separate Energy Performance scorecard should be eliminated with cubic meter savings from that program captured under the Commercial scorecard.
- Incentives should be available for a range from 75% to 125% of target not 50% to 150% as proposed.

We discuss these in the following sections.

First year (annual) vs Lifetime Savings

Enbridge proposes to move to annual rather than lifetime savings as its primary incented metric but offers no compelling reason to do so. As discussed in the EFG

report at page 22, under an annual savings metric the Company would be indifferent between efficiency measures that save 100 m3 of gas for one to five years and different measures that saved 100 m3 of gas for 20 or 25 years which is clearly problematic.

Enbridge has offered three reasons for its shift to first year savings: (1) that it is a metric that is better understood by its customers and potential business partners; (2) that it makes it easier to explore "potential coordinated or collaborative program delivery"; and (3) that its proposal for an additional metric based on economic net benefits provides an incentive to focus on longer-lived measures. These are all flawed arguments.[42] As EFG noted: "neither customers nor potential business partners will know – or want to know, or need to know – how Enbridge's shareholder incentives are structured" and "there may be short-lived measures and/or programs that provide comparable or greater net benefits per dollar than longer-lived measures. In other words, there is imperfect alignment between a net benefits metric and a lifetime savings metric". Enbridge suggested that joint evaluation would need to occur prior to attribution so a simpler metric will appeal to partners. However, that suggests that NRCan and other partners are not interested in measuring actual savings, which is an absurd assumption. Further, even if the joint evaluation looks at first year savings, there's no reason to base Enbridge shareholder rewards on that without further adjusting for the life of the measures.

In response to this objection the company proposes to guard against a shift toward shorter lifetime measures by keeping the weighted average measure life within 20% of its current average. Given that the only real benefit of an annual savings metric is simplified calculation, it is bizarre that Enbridge would posit that a potential 20% reduction in savings is a reasonable trade-off.

Mr. Weaver's presentation to Enbridge in December of 2021 noted:[43]

- Annual savings is the simplest performance driver
    - But can skew investment to shorter lived measures (behavior, electric lighting)
    - Lifecycle savings fundamentally drives most planning objectives (GHG reduction; UC/TRC cost reduction)…
- ***Lifecycle savings is (Ted's) preferred metric*** (emphasis added)

[42] See discussion at L.GEC/ED.1, p. 22
[43] EGI Interrogatory Responses to GEC, Attachment 2, Page 52 of 60

The proposal to move to an annual rather than lifetime savings metric should be rejected.

Incentives based on 50-100-150% of target vs 75-100-125%

Ads discussed at L.GEC/ED.1, page 26, "Achieving only half of planned savings levels would be a miserable failure. The notion that the utility should be allowed to earn shareholder incentives at performance levels that can only be considered failures is antithetical to the notion that shareholder incentives should encourage and be rewards for excellent performance." The Board has previously rejected such a proposal.[44]

Enbridge's pre-filed evidence offers no rationale for its move from 75%-125% to the 50% -150% proposal. Mr.Weaver defended the proposal based on the logic that the disaggregation of the incentive into separate sectoral pools reduces Enbridge's flexibility to chase the rewards relative to other utilities. While that may be true, it does not address the fundamental flaw of the proposal to allow a multi-million-dollar reward to endorse mediocrity.

Given that past performance has been within the 75-125% of target range, it makes sense to maintain that structure to keep the reward more effective by keeping the curve steep within the range that is likely to be experienced. Accordingly, moving the upper band to 150% has no compelling merit.

Enbridge's proposal to move to shareholder rewards with a 50% - 150% of target range rather than 75% to 125% should be rejected.

b. Is Enbridge Gas's proposed Long Term shareholder incentive appropriate?

Enbridge has proposed two long-term incentives, Low Carbon Transition and Long-Term GHG Reduction:

Low Carbon Transition

The focus of the Low Carbon Transition program is on hybrid heat pumps – i.e., electric heat pumps installed in concert with a gas furnace; and gas-fired heat pumps. There may be merit to near-term investment in hybrid heat pump configurations, provided they are cold climate models (see discussion under Issue 10.a) and this does not prolong

[44] I.5.EGI.SEC.10

reliance on gas. It is inappropriate to invest in promoting gas-fired heat pump technology which is not cost-effective, is unlikely to be cost-effective in the near term, and will forestall electrification needed to address GHG reduction imperatives. Tying a shareholder incentive payment to Enbridge's success in promoting gas-fired technology is counterproductive. Thus, the performance metrics for the Low Carbon Transition Program, if any, should focus solely on training for and installations of NEEP listed cold climate electric heat pumps where the existing gas furnace does not need replacement.

The shareholder incentive for Low Carbon Transition should only be available if the program is reconfigured to avoid promoting gas-fired equipment.

Long-Term GHG Reduction

As discussed under Issue 9.m, Enbridge's proposed Long-term GHG Reduction metrics are highly flawed and would measure illusory reductions. The associated incentive would not cause the Company to do anything it wouldn't plan to do anyway to achieve real net energy savings under the other performance incentives. To the extent that it may cause any change in behavior, it would be detrimental rather than positive.

The Long-term GHG Reduction incentive is flawed and redundant and should be eliminated.

c. Is Enbridge Gas's Annual Net Benefits Shared Savings proposal appropriate?

The company has proposed a Net Benefits incentive accounting for 31% of shareholder incentives.

In its evidence the company repeatedly mischaracterised GEC's past support for an incentive to propose better plans as support for this concept. GEC has not and does not support the company proposal.

There are multiple problems with the proposal. It would start rewarding Enbridge for savings as low as 21% of 2027 targets (27% in 2023).[45] This is simply ridiculous.

The reward level would vary dramatically due to factors beyond the company's control. For example, due to changing avoided costs, Enbridge's shared savings incentive would be 59% – or nearly $2 million – higher in 2027 than in 2023 for achieving exactly the same amount of savings.[46]

[45] L.GEC/ED.1, p. 27
[46] L.GEC/ED.1, p. 28

The proposal would also increase the reward for shifting DSM resources away from difficult sectors, competing with sectoral equity objectives.[47]

Finally, the proposal would increase the contentiousness of evaluations by adding additional variables including: electricity savings, water savings, efficiency measure costs and avoided costs to the reward equation. As EFG noted: "If Enbridge's efficiency programs are estimated to have a benefit-cost ratio of 3 to 1, it does not matter that much if the estimate is accurate within a range of 2.5 to 3.5 to one if the only purpose of the cost-effectiveness assessment is to ensure there is sufficient value for the DSM dollars being spent. However, if that 15-20% swing in cost-effectiveness could mean $1 million or more in shareholder incentive, the level of accuracy will become much more important and contentious"[48].

Mr. Weaver offered:

- **First Tracks Compromise:** Agree with EFG:
  - Savings scorecards already provide incentive to increase net benefits, by increasing savings within available budgets.
  - Separate metric adds complexity without substantially improving management incentive.
  - (Note this change reduces Enbridge's management flexibility.)

Enbridge's Annual Net Benefits Shared Savings proposal should be rejected.

d. Are there any other incentive mechanisms that should be included in addition to or to replace those proposed by Enbridge Gas?

Enbridge currently has an incentive to propose poor plans – lower targets make shareholder rewards easier to achieve while protecting the company and its parent shareholder from lost profits on gas infrastructure investment and lost profits to its parent due to lower volumes in the pipelines.

Better plans can be encouraged by tying the total available shareholder incentive to the savings of future proposed plans (or the resubmittal of a plan for all or part of the period covered in the current application). Enbridge's plan proposes a .4% savings to volumes ratio. Mr. Neme has suggested that the available shareholder incentive for a future or refiled plan could be a function of the proposed savings to volumes ratio and be

[47] ibid
[48] L.GEC/ED.1 at p. 30

calibrated to make available the current incentive level if a redrawn plan proposes a .6% savings to volumes ratio and to make available more or less total reward as the proposal deviates from that level.

While not addressing that specific proposal, Enbridge witnesses saw no particular problem with that concept so long as it doesn't supplant other constraints such as low income allocation.[49]

The Board should encourage better plans by tying the total available shareholder incentive to the savings target of future proposed plans (or the resubmittal of a plan for all or part of the period covered in the current application). This could be calibrated to offer the current level of available shareholder incentive for plan proposals that reach a .6% savings to sales target level and to make available more or less total reward as the proposal deviates from that level.

Issue 9. Are Enbridge Gas's proposed scorecards, including performance metrics, metric weightings, and targets appropriate?

Targets for all programs:

Enbridge acknowledged that Covid depressed recent savings but suggested that much of the drop from 2019 to 2021 for savings it achieved was due to changes to regulations, specifically the change in the furnace standard from 90 to 95% AFUE. In JT3.1 Mr. Neme analysed the reductions in savings and found that 88 percent of the reductions (18.2 of the 20.6 million m3 drop) could be attributed to two commercial and industrial programs; the commercial and industrial direct install program and the commercial and industrial prescriptive rebate program. He found that the reduction in savings from the residential sector was only about 10 percent. Accordingly, it seems clear that the drop in savings that Enbridge relies upon to lower its starting point and subsequent targets is attributable in large measure to Covid and should not be considered a valid reason to lower expectations 5 or 6 years out.[50]

Enbridge also asserted that it overspent its budget in 2018 and 2019 by accessing the DSMVA. However, EFG pointed out that the overspends were just 3 and 5.5%

[49] Vol. 2, p. 165
[50] Discussed at Vol.4, p. 82

respectively, which cannot justify the company's proposal for significantly depressed targets relative to 2019 achievements going forward.[51]

As detailed below and under Issues 8 and 10, several of Enbridge's proposed programs, scorecards, targets or incentives should be eliminated and funds redirected to other programs.

Those targets that are not eliminated (see below) should be adjusted upward to reflect performance achieved in 2019, any increase in budget awarded, and to ramp up from there.

a. Is Enbridge Gas's proposed annual target adjustment mechanism appropriate?

Enbridge's overly broad Target Adjustment Mechanism (TAM) rewards failure. If the company underperforms in year one it is rewarded by having targets fall in subsequent years. In the same fashion, the TAM discourages good performance since higher savings would raise subsequent targets.

While it may be appropriate to adjust future targets for factors outside of the company's control, adjusting them for lower participation rates is simply counterproductive. The current TAM adjusts for the cost of participant acquisition (the savings to budget ratio) thus lowering future targets if participation has fallen for a given budget level.

Both EFG and Optimal were unaware of any other utility having a TAM that would adjust for participation.[52]

Similarly, other jurisdictions do not lock in savings assumptions for custom measures as Enbridge proposes.[53]

No Target Adjustment Mechanism should be included in the framework. Targets should be set for the plan period at the outset subject to adjustments at a mid-term review. Absent extraordinary events, adjustments to targets during the plan period should only occur when there are changes made in the technical resource manual.

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[51] Vol.4,p.83
[52] Vol.4, p.85
[53] ibid

b. Is Enbridge Gas's proposed Residential Program Scorecard, including targets and performance metrics appropriate?

See above: Issue 9 Targets for all programs.

The uncertainty associated with the joint delivery of the Greener Homes Program will require an update to the specifics of the residential program scorecard.

c. Is Enbridge Gas's proposed Low Income Program Scorecard, including targets and performance metrics appropriate?

As EFG noted, Enbridge's allocation of spending to low income programs was 19.1% in 2019 but is projected to be lower, at 17.5% in the 2023-2017 period. For the reasons discussed under Issue 6, this is the wrong direction for change. Many leading jurisdictions allocate 23-25% to low income programs.[54]

Low income program spending should be increased to at least 20% of total annual spending with commensurate increases in the target.

d. Is Enbridge Gas's proposed Commercial Program Scorecard, including targets and performance metrics appropriate?

See above: Issue 9 Targets for all programs.

e. Is Enbridge Gas's proposed Industrial Program Scorecard, including targets and performance metrics appropriate?

See above: Issue 9 Targets for all programs.

[54] L.GEC/ED.1, p.37

f. Is Enbridge Gas's proposed Large Volume Program Scorecard, including targets and performance metrics appropriate?

See above: Issue 9 Targets for all programs.

g. Is Enbridge Gas's proposed Energy Performance Program scorecard, including targets and performance metrics appropriate?

The Company can earn nearly twenty times as much shareholder incentive per unit of energy savings produced by the Energy Performance program as it can per unit of energy savings produced by its other commercial sector programs – and at a cost that is nearly ten times higher per unit of savings produced.[55] This would create a perverse incentive to focus disproportionate attention on what is expected to be a relatively lower performing program.

The Energy Performance Program should not have a separate scorecard. Its savings should be captured within the commercial program on the same basis as other commercial savings.

h. Is Enbridge Gas's proposed Building Beyond Code Program scorecard, including targets and performance metrics appropriate?

As discussed under Issue 10.t, this program should not promote gas technology and be limited to projects being built in existing neighbourhoods where gas infrastructure is already in place or should not be offered.

Building Beyond Code targets and metrics will need to be altered in a refiled application to reflect the available opportunities of a reconfigured program or be eliminated if the program is not approved.

i. Is Enbridge Gas's proposed Low Carbon Transition Program scorecard, including targets and performance metrics appropriate?

As discussed below under Issue 10.w, there may be merit to near-term investment in hybrid heat pump configurations, provided they are cold climate models (see discussion under Issue 10.a) and this does not prolong reliance on gas. It is inappropriate to invest

[55] L.GEC.1 p.25

in promoting gas-fired heat pump technology which is not cost-effective, is unlikely to be cost-effective in the near term, and will forestall electrification needed to address GHG reduction imperatives. Thus, the performance metrics for the Low Carbon Transition Program, if any, should focus solely on training for and installations of cold climate electric heat pumps where the existing gas furnace does not need replacement or completely electric ccASHP systems.

Suitable metrics and targets that reflect the reconfiguration of the program to delete support for new gas-fired installations should be proposed before the Board considers the Low Carbon Transition Program scorecard.

j. Is Enbridge Gas's proposed Long Term Greenhouse Gas Reduction target appropriate?

Enbridge proposes to measure gross savings (i.e., without adjusting for free rider or spillover effects) and be equal to its 2023 planned level of gross savings multiplied by five (for the number of years in the plan) and then increased by 15% (what the Company calls a "stretch"). Unlike with its other metrics, the Company would earn no incentive if it fell short of this goal and the full 5% incentive if it met or exceeded the goal. The problems with this metric were canvassed in the EFG report which noted:

A gross savings target is not appropriate because it isn't actually a measure of GHG emissions reductions resulting from Enbridge's programs. All gross savings – and therefore all related emissions reductions – that were produced by free riders would, by definition, have occurred without Enbridge's programs.

Because Enbridge proposes to sum first year savings rather than lifetime savings, it fails to quantify the full lifecycle GHG emission reductions resulting from the Company's programs.

Further, because it simply sums first year savings, it could even overstate the amount of annual emission reductions being realized after 2027. For example, any savings from measures with a 3-year life that were installed in 2023 would not still be persisting in 2028.

The 15% "stretch" factor is not in fact a stretch because it does not account for the fact that the Company is proposing budgets that increase each year. In other words, the Company would not need to do much more than achieve its 100% targets for each year to earn the incentive available from this proposed metric.

Finally, the proposal to make this an "all or nothing" metric – where the Company either earns it in its entirely for meeting or exceeding the goal, but earns nothing if it falls short could create perverse incentives. For example, if the Company knows in early to mid-2027 that it will be close to meeting this five-year goal, there will be a strong incentive to pursue free rider projects because the $5 million payoff would be far greater than the incremental effect that pursuing more difficult or expensive non-free rider savings would have on other 2027 performance metrics.

Put simply, this proposed metric would not cause the Company to do anything it wouldn't plan to do anyway to achieve real net energy savings under the other performance metrics. To the extent that it may cause any change in behavior, it would be detrimental rather than positive.

Enbridge's GHG reduction metric should not be approved. The Company should be directed to propose meaningful long-term GHG reduction metrics such as a metric that compares average, weather-normalized residential energy consumption in 2027 to 2022 and a metric that is focused on lowering the energy intensity of business customers' use of gas (per unit of output).

k. Should there be any other scorecards, targets and/or metrics included in addition to or to replace those proposed by Enbridge Gas?

No submissions.

Issue 10. Has Enbridge Gas proposed an optimal suite of program offerings that will maximize natural gas savings and provide the best value for rate payer funding?

General comments applicable to all sectors:

GEC submits that an appropriate framework with suitable scorecards and shareholder incentives should allow and encourage the company to offer an array of measures and to refine its program designs. If those prerequisites are met, with a few exceptions that are noted in the following sections, the company can be left with flexibility in regard to program designs.

As discussed below, for all sectors Enbridge should encourage the most energy-efficient, GHG-reducing, and cost-effective options. It should not be permitted to incent gas technology where electrification is a better societal option. While we appreciate that

providing incentives to non-gas customers may stray beyond the role of the gas utility, providing fuel neutral advice should be expected, and providing incentives to reduce or eliminate gas burning among current gas users is squarely within the proper role of the utility.

a. Are Enbridge Gas's proposed program offers for residential customers appropriate?

The uncertainty associated with the joint delivery of the Greener Homes Program will require an update to the specifics of the residential program offering and targets as well as review of the proposed attribution of savings. GEC has called for a refiling of the plan with higher savings goals at which time these details could be reviewed in an expedited process. With or without a refiling, this program will still require review. Details such as incentive stacking, the impact on the low income sector, and implications for Enbridge's various program offerings should be considered at that time in light of the proposal.

At this time there is one issue that the Board can and should address – Enbridge's inclusion of gas heating and water heating measures. Efficiency regulations have raised the standard for these end uses to the level that promotion of higher performing units is a misdirection of limited DSM funds. Further, given government policy to move loads off gas to efficient electrical options, no program should encourage measures that will not remain valuable after fuel switching to electricity.

More generally, the Minister in his November 2021 Mandate letter to the Board expressed an expectation that DSM would "help customers make the right choices regardless of whether that is through more efficient gas or electric equipment". Thus, it is not appropriate for Enbridge with a vested interest in gas sales to be providing incentives for gas equipment where a cost-effective electric alternative is available but Enbridge does not incent that option, as this would distort consumer choice.

Where Enbridge does propose program support for electric air source heat pumps (in a hybrid heating mode) they require that gas remains the principal heating fuel. This may require, or at least allow support for, heat pumps that do not perform in colder temperatures. As Mr. Neme noted: given the types of carbon emission reductions that are going to be required, it would be highly problematic to develop a market for heat pumps that don't function below freezing in lieu of developing a market for ones that

can function at much colder temperatures.[56] This restriction may also result in gas furnace replacements that could be avoided with complete electrification.

Enbridge's restriction amounts to an ill-concealed attempt to protect the company's load and customer base at the expense of customer and GHG savings.

Mr. Neme noted that NEEP maintains a list with hundreds of cold climate heat pumps from numerous manufacturers that maintain efficiency at low outdoor temperatures.

Enbridge's residential programs should not encourage measures that will not remain valuable after fuel switching to electricity. Programs addressing space heating appliances should only cover NEEP listed cold climate electric heat pumps. Programs should not require participants to retain gas as the primary heat source.

As part of a refiled plan with higher savings targets, Enbridge should provide complete details of its proposed joint delivery of the Greener Homes program.

l. Are Enbridge Gas's proposed program offerings for low-income customers appropriate?

See our comments under Issue 6.

m. Are Enbridge Gas's proposed program offerings for commercial customers appropriate?

See above under Issue 10: General comments applicable to all sectors.

GEC generally supports the recommendations provided by GEEG.

Enbridge's commercial programs should not encourage measures that will not remain valuable after fuel switching to electricity. Programs addressing space heating appliances should only cover NEEP listed cold climate electric heat pumps.

n. Are Enbridge Gas's proposed program offerings for industrial customers appropriate?

[56] Vol.4, p. 93

See above under Issue 10: General comments applicable to all sectors.

o. Are Enbridge Gas's proposed program offerings for large volume customers appropriate?

In his cross-examinations on behalf of IGUA Mr. Mondrow suggested that large volume customers do not need the self-direct program to encourage them to invest in cost-effective DSM. At the same time he suggested that capital availability or competing opportunities for available capital can limit their ability to do so.

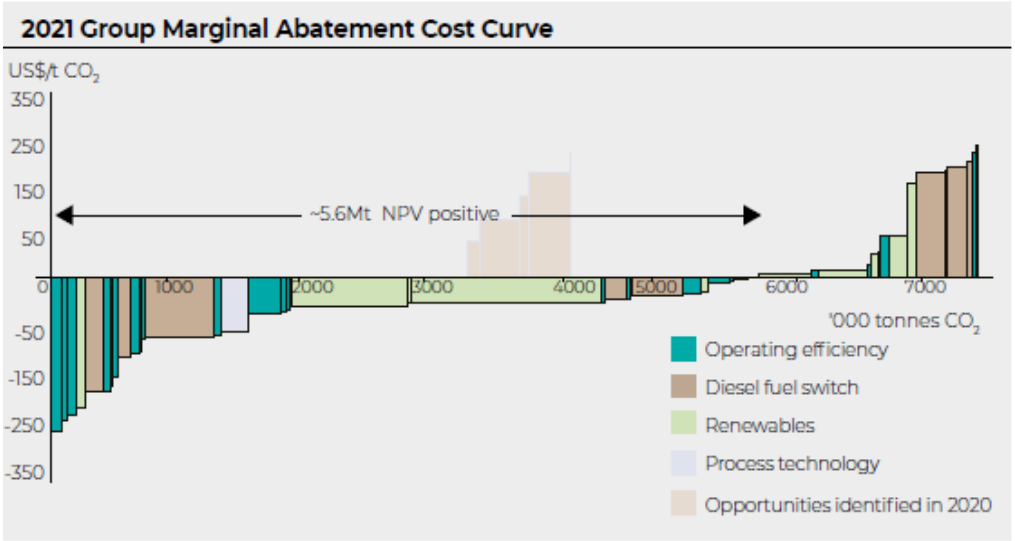
This is not a new issue. IGUA has challenged the merit of large volume programs in the past and Mr. Neme has testified before this Board in response as did experts from Synapse and Union Gas panelists.[57] Based on an extensive record the Board concluded that a Large Volume program is appropriate.

Mr. Neme recited several reasons why that the program remains important:[58]

- There are numerous studies that have taken place over decades that show that large industrial customers, as sophisticated and as large as their energy bills are, routinely leave unaddressed significant energy savings potential.
- Companies tend to focus on short, one or two year paybacks.
- There can be a competition for capital which ignores the societal and system benefits that DSM brings.
- There can be a lack of awareness of DSM opportunities.
- The situation is not materially different today. As Mr. Neme noted:
- About 15, 16 years ago, we had gas commodity costs that were in excess of 40 cents a cubic metre. In today's dollars, it would be approaching sixty cents a cubic metre, which is higher than current commodity costs plus the cost of carbon. In fact, it is higher than current commodity costs plus the cost of carbon and it will be 170 dollars a tonne in 2030. And yet when we had those very high gas prices 15 years ago, studies were still repeatedly showing that there was large untapped efficiency potential in the -- among industrial customers.[59]
- Indeed, Mr. Mondrow provided a Glencore graphic that indicated there are significant negative cost effective GHG reduction measures available to the

[57] See ED compendium for Staff Experts, pp. 3-27
[58] Vol.4, p. 89 *et seq.*
[59] Vol.4, p. 90

company that were not identified as 'new opportunities in 2020' (i.e. they had been known for some time) but had not been acted on:[60]



IGUA suggested that an opt out option should be available. Mr. Neme noted that in some other jurisdictions an opt out is available if an independently funded assessment can demonstrate that the company has invested in all cost-effective measures with a payback less than a minimum period such as 7 years. He suggested that few if any would meet that test.

Large volume customers are in effect asking to be free riders on the DSM benefits created by the participation of other customer classes. This is so because benefits such as transmission and distribution infrastructure avoidance and DRIPE are of the greatest benefit to these large volume users. It is also notable that the DSM unit rate charge for these users is amongst the lowest.

The real issue with the Large Volume program is that it is too meek, favouring cherry picking of low hanging fruit which tends to have a high free ridership rate (an NTG of only 15%). Given that this sector offers the most cost-effective savings, providing 8.7% of 2023 targeted savings for just 2.3% of the budget[61], increasing the budget would offer very cost-effective savings and the likelihood of lower free-ridership as harder to reach savings are incented.

[60] IGUA Cross Compendium, p.15
[61] L.GEC.1 table 5, and I.6.EGI.EP.3

The very cost-effective savings in the Large Volume program can be greatly enhanced and the Net to Gross ratio improved. Consistent with our recommendation for budgets and targets generally, budget and targets for the L.V. program should start higher and ramp up throughout the plan period. Opt-out should only be permitted where an independent audit finds that all measures with a 7 year payback or less have been implemented.

p. Are Enbridge Gas's proposed energy performance program offerings appropriate?

The Board heard from BOMA about the potential for savings in this program. GEC supports the inclusion of such programs as part of a broad portfolio of programs. While care will need to be taken to ensure that measured savings are durable, that is a matter for the evaluator and continued program evolution.

However, as discussed under Issue 9.g, GEC's concern related to this program is the proposal to have a separate scorecard for this program with associated shareholder incentives starting at a much lower performance level rather than have its savings captured within the commercial program.

q. Are Enbridge Gas's proposed building beyond code program offerings appropriate?

Enbridge will offer contractors incentives only if they invest in gas infrastructure. As detailed in the evidence and testimony of Dr. McDiarmid, high efficiency electric cold climate heat pumps and heat pump water heating are far more cost-effective options where gas infrastructure costs can be avoided. This program would encourage less cost-effective solutions, distort contractor and customer choice, and conflict with government GHG reduction policies.

Enbridge, with its obvious conflict of interest, should not be allowed to use ratepayer dollars to promote gas use. (Lest there be any doubt about Enbridge's agenda, see Mr. Elson's letter of April 21st in regard to EGI's promotion of gas use at ratepayer expense.)

While better building construction practices and better building codes should be encouraged, that should not be contingent on fuel choice. Enbridge has suggested that

the Board has directed it to avoid DSM programs for non-gas customers. If that is indeed the Board's intention, then this program should be limited to projects being built in existing neighbourhoods where gas infrastructure is already in place or not be offered.

Ideally, a non-profit, fuel neutral entity, or an entity such as the IESO if appropriately directed, should be funded to promote better building practices.

The Building Beyond Code program should not promote gas technology and be limited to projects being built in existing neighbourhoods where gas infrastructure is already in place or not be offered.

r. Should there be any other program offerings included in addition to or to replace those proposed by Enbridge Gas?

See above under Issue 10: General comments applicable to all sectors.

s. Are Enbridge Gas's proposed program offerings appropriate for customers in Indigenous communities?

GEC defers to the directly affected intervenors.

t. Is Enbridge Gas's proposed low carbon transition program appropriate?

The focus of the Low Carbon Transition program is on hybrid heat pumps – i.e., electric heat pumps installed in concert with a gas furnace; and gas-fired heat pumps. There may be merit to near-term investment in hybrid heat pump configurations, provided they are NEEP listed cold climate models (see discussion under Issue 10.a) and this does not prolong reliance on gas. It is inappropriate to invest in promoting gas-fired heat pump technology which is not cost-effective, is unlikely to be cost-effective in the near term, and will forestall electrification needed to address GHG reduction imperatives.

The Low Carbon Transition Program, should focus solely on training for and installations of NEEP listed cold climate electric heat pumps where the existing gas furnace does not need replacement.

Issue 11. Are Enbridge Gas's proposed research and development activities appropriate?

Given the imperative of GHG reduction, no ratepayer funding should be provided for R&D with respect to gas appliances where efficient electric alternatives exist.

Issue 12. Are Enbridge Gas's proposed changes to the OEB's evaluation, measurement and verification process appropriate, including the proposed Terms of Reference?

See above under Issue 5

Issue 13. Are Enbridge Gas's proposed updates to the treatment of input assumptions, cost-effectiveness screening, and avoided costs appropriate?

Environmental Defence has noted that Enbridge's use of average electricity rates is not an appropriate proxy for electricity avoided costs.

The Board should direct the company to confer with the IESO and utilize appropriate marginal costs for electricity avoided costs.

Issue 14. Is Enbridge Gas's proposed accounting treatment, including the function of various deferral and variance accounts appropriate?

No submissions

Issue 15. Does Enbridge Gas's proposed 2023-2027 DSM Plan require any changes to be consistent with the OEB's decision and guidance regarding Enbridge Gas's Integrated Resource Planning proposal (EB-2020-0091)?

No submissions

Issue 16. Has Enbridge Gas proposed a reasonable approach to ensure natural gas DSM programs are effectively coordinated with electricity conservation programs and other energy conservation and greenhouse gas reduction programs applicable in its service territory?

As noted under Issue 10.a, the Board has recognized that the vagaries of the proposed joint delivery of DSM programs with the Federal Greener Homes program will require a regulatory mechanism to ensure customer value, program effectiveness and fair attribution.

Issue 17. Is Enbridge Gas's stakeholder engagement proposal reasonable, including its engagement with Indigenous communities?

GEC supports SEC's proposal for an enhanced role for an advisory committee during the plan period. With respect to Indigenous communities, GEC defers to the directly affected intervenors.

The Board should consider an enhanced role for a stakeholder advisory committee during the plan period.

Issue 18. What transition and implementation steps are appropriate as a result of the OEB's decision on the 2022 DSM Plan and its final decision and order?

No submissions.

Summary of Specific Recommendations

Term:
Enbridge should be required to refile its plan and any approval should be limited to a two or three-year period.

Overall Budget, Targets and Rate Impacts:
GEC submits that a significant increase in the DSM budget can occur without unreasonable rate impacts especially if increased emphasis is placed on low income program participation. GEC has suggested Increasing savings from the 2017-19 average of 0.46 to 0.5% in 2023 which would be an increase of 8.7%. Such an increase could be expected to require less than a 15% budget increase. If the Board is concerned about the potential costs of such a ramp up, it could constrain budgets to an increase of 15% for 2023 and 20% annual increases (in real dollars) thereafter. However, by implementing amortization of DSM costs a more significant near-term increase can be accommodated.

Cost Recovery:
The Board should consider amortizing DSM costs to enable higher budgets in the near term and to achieve better temporal matching of customer costs and benefits.

Shareholder Incentives:
The proposal to move to an annual rather than lifetime savings metric should be rejected.

Enbridge's proposal to move to shareholder rewards with a 50% - 150% of target range rather than 75% to 125% should be rejected.

The shareholder incentive for Low Carbon Transition should only be available if the program is reconfigured to avoid promoting gas-fired equipment.

The Long-term GHG Reduction incentive is flawed and redundant and should be eliminated.

Enbridge's Annual Net Benefits Shared Savings proposal should be rejected.

The Board should encourage better plans by tying the total available shareholder incentive to the savings target of future proposed plans (or the resubmittal of a plan for

all or part of the period covered in the current application). This could be calibrated to offer the current level of available shareholder incentive for plan proposals that reach a .6% savings to sales target level and to make available more or less total reward as the proposal deviates from that level.

Program Scorecards, Targets and Budgets:
Those targets that are not eliminated (see below) should be adjusted upward to reflect performance achieved in 2019, any increase in budget awarded, and to ramp up from there.

No Target Adjustment Mechanism should be included in the framework. Targets should be set for the plan period at the outset subject to adjustments at a mid-term review. Absent extraordinary events, adjustments to targets during the plan period should only occur when there are changes made in the technical resource manual.

The uncertainty associated with the joint delivery of the Greener Homes Program will require an update to the specifics of the residential program scorecard. As part of a refiled plan with higher savings targets, Enbridge should provide complete details of its proposed joint delivery of the Greener Homes program.

Low income program spending should be increased to at least 20% of total annual spending with commensurate increases in the target.

The Energy Performance Program should not have a separate scorecard. Its savings should be captured within the commercial program on the same basis as other commercial savings.

Building Beyond Code targets and metrics will need to be altered in a refiled application to reflect the available opportunities of a reconfigured program or be eliminated if the program is not approved.

Suitable metrics and targets that reflect the reconfiguration of the program to delete support for new gas-fired installations should be proposed before the Board considers the Low Carbon Transition Program scorecard.

Enbridge's GHG reduction metric should not be approved. The Company should be directed to propose meaningful long-term GHG reduction metrics such as a metric that compares average, weather-normalized residential energy consumption in 2027 to 2022 and a metric that is focused on lowering the energy intensity of business customers' use of gas (per unit of output).

Programs:

Enbridge's residential programs should not encourage measures that will not remain valuable after fuel switching to electricity. Programs addressing space heating appliances should only cover NEEP listed cold climate electric heat pumps. Programs should not require participants to retain gas as the primary heat source.

Enbridge's commercial programs should not encourage measures that will not remain valuable after fuel switching to electricity. Programs addressing space heating appliances should only cover NEEP listed cold climate electric heat pumps.

The very cost-effective savings in the Large Volume program can be greatly enhanced and the Net to Gross ratio improved. Consistent with our recommendation for budgets and targets generally, budget and targets for the L.V. program should start higher and ramp up throughout the plan period. Opt-out should only be permitted where an independent audit finds that all measures with a 7 year payback or less have been implemented.

The Building Beyond Code program should not promote gas technology and be limited to projects being built in existing neighbourhoods where gas infrastructure is already in place or not be offered.

The Low Carbon Transition Program, should focus solely on training for and installations of cold climate electric heat pumps where the existing gas furnace does not need replacement.

R&D:

Given the imperative of GHG reduction, no ratepayer funding should be provided for R&D with respect to gas appliances where efficient electric alternatives exist.

TRC Assumptions:

The Board should direct the company to confer with the IESO and utilize appropriate marginal costs for electricity avoided costs.

EM&V:

GEC submits that there is no rationale for freezing evaluation methods deviating rather than using best available methodology as it evolves.

Stakeholder Engagement:
The Board should consider an enhanced role for a stakeholder advisory committee during the plan period.

All of which is respectfully submitted this 19th day of May, 2022

David Poch

Counsel for GEC