

ENBRIDGE GAS DISTRIBUTION INC. AND UNION GAS LIMITED

Answer to Interrogatory from
Ontario Energy Board Staff ("Staff")

Rate Setting Issues List – Issue No. 2

Reference: Exhibit B, Tab 1, p. 9

Preamble: The application states that both Enbridge Gas and Union Gas have refinanced virtually all of their existing long-term debt based on historically low interest rates that have existed over the past 10 years. Amalco will be required to refinance approximately 50% of its existing long-term debt during the deferred rebasing period. Higher interest rates combined with refinancing a significant portion of existing long-term debt could put significant pressure on Amalco's earnings

Questions:

- a) When do the applicants expect Amalco to start refinancing its existing long-term debt?
- b) Will the new debt instruments be issued by Enbridge Inc. or individually by Union Gas and Enbridge Gas?
- c) What is the expected differential in interest rates between the new debt expected to be issued and the maturing instruments?
- d) Please provide evidence of the future increase in interest rates referred to in the evidence and the expected increase over the deferred rebasing period.
- e) What is the expected increase in costs as a result of issuing the new debt?

Response

- a) During the deferred rebasing period Amalco will have maturities beginning in 2020 with a total of \$3,395,000,000 needing to be refinanced over the 10 year period. Furthermore it is anticipated that Amalco will have additional fixed rate debt requirements to support the cost to achieve targeted synergies, ongoing maintenance and sustaining capital, and growth capital required to connect new customers. /u
- b) Upon amalgamation of the two Utilities it is anticipated that the new Amalco will be issuing debt in the Canadian public market to fund its ongoing capital and operating requirements.
- c) The expected differential will be dependent on how the maturities will be re-financed at the time the security matures. The Utility will have the option to re-finance the maturities using fixed rate financing with various maturity tenors based upon the shape of the yield curve. Given the long lived nature of the Utility's assets it is likely that the maturities will be refinanced on terms similar to those prior to expiration. The analysis below illustrates the

forecasted differential in interest rates from refinancing the maturities using a combination of 10 year and 30 year issuances.

Company	Amount	Maturity Date	Interest Rate	Forecast Rate	Difference	Forecast Ave Rate	Difference
ENBRIDGE GAS DISTRIBUTION	85,000,000	2-Dec-2024	9.85%	4.80%	5.05%	4.5%	5.40%
ENBRIDGE GAS DISTRIBUTION	200,000,000	23-Nov-2020	4.04%	3.95%	0.09%	4.3%	-0.26%
ENBRIDGE GAS DISTRIBUTION	175,000,000	17-Dec-2021	4.77%	4.10%	0.67%	4.5%	0.32%
ENBRIDGE GAS DISTRIBUTION	100,000,000	5-Jul-2023	6.05%	4.80%	1.25%	4.5%	1.60%
ENBRIDGE GAS DISTRIBUTION	20,000,000	2-Oct-2025	8.85%	4.80%	4.05%	4.5%	4.40%
ENBRIDGE GAS DISTRIBUTION	100,000,000	29-Oct-2026	7.60%	4.80%	2.80%	4.5%	3.15%
ENBRIDGE GAS DISTRIBUTION	100,000,000	3-Nov-2027	6.65%	4.80%	1.85%	4.5%	2.20%
ENBRIDGE GAS DISTRIBUTION	100,000,000	19-May-2028	6.10%	4.80%	1.30%	4.5%	1.65%
ENBRIDGE GAS DISTRIBUTION	200,000,000	23-Nov-2020	4.04%	4.10%	-0.06%	4.5%	-0.41%
ENBRIDGE GAS DISTRIBUTION	215,000,000	22-Aug-2024	3.15%	4.10%	-0.95%	4.5%	-1.30%
ENBRIDGE GAS DISTRIBUTION	400,000,000	11-Sep-2025	3.31%	4.10%	-0.79%	4.5%	-1.14%
ENBRIDGE GAS DISTRIBUTION	300,000,000	5-Aug-2026	2.50%	4.10%	-1.60%	4.5%	-1.95%
UNION GAS LIMITED	200,000,000	2-Jun-2021	2.76%	4.10%	-1.34%	4.5%	-1.69%
UNION GAS LIMITED	125,000,000	25-Apr-2022	4.85%	4.80%	0.05%	4.5%	0.40%
UNION GAS LIMITED	250,000,000	10-Jul-2023	3.79%	4.10%	-0.31%	4.5%	-0.66%
UNION GAS LIMITED	200,000,000	17-Sep-2025	3.19%	4.10%	-0.91%	4.5%	-1.26%
UNION GAS LIMITED	125,000,000	10-Nov-2025	8.65%	4.80%	3.85%	4.5%	4.20%
UNION GAS LIMITED	250,000,000	1-Jun-2026	2.81%	4.10%	-1.29%	4.5%	-1.64%
UNION GAS LIMITED	250,000,000	22-Nov-2027	2.88%	4.80%	-1.92%	4.5%	-1.57%
	<u>3,395,000,000</u>						

d) Please see the following table for bank provided forecasts for the period 2019 to 2021.

CAD 3 Month T-Bill Forecast	2019	2020	2021
Bank 1	1.9%	2.1%	2.4%
Bank 2	2.4%	2.6%	2.6%
Bank 3	1.7%	2.0%	2.6%
Bank 4	1.6%	1.8%	1.8%
Bank 5	1.2%	2.0%	2.2%
Bank 6	1.8%	2.0%	2.2%
Bank 7	1.4%	1.6%	1.9%
Bank 8	2.1%	2.5%	2.5%
Average	1.7%	2.1%	2.3%
Historical Difference: 3 Month CDOR vs. 3 Month T-Bill	0.4%	0.4%	0.4%
Calculated 3 Month CDOR Forecast	2.1%	2.5%	2.7%

10 Year GOC Forecast	2019	2020	2021
Bank 1	2.6%	2.8%	2.9%
Bank 2	2.8%	3.1%	3.3%
Bank 3	2.4%	2.6%	3.0%
Bank 4	2.9%	3.2%	3.4%
Bank 5	2.5%	3.3%	3.4%
Bank 6	2.9%	3.0%	3.5%
Bank 7	2.7%	3.0%	3.3%
Bank 8	2.7%	2.9%	2.9%
Average	2.7%	3.0%	3.2%

30 Year GOC Forecast	2019	2020	2021
Bank 1	2.9%	3.1%	3.2%
Bank 2	3.1%	3.4%	3.5%
Bank 3	2.8%	2.9%	3.1%
Bank 4	3.3%	3.6%	3.8%
Bank 5	3.0%	3.8%	3.9%
Bank 6	3.1%	3.4%	3.7%
Bank 7	3.2%	3.5%	3.8%
Bank 8	3.0%	3.2%	3.2%
Average	3.0%	3.3%	3.5%

- e) The expected differential will be dependent on how the maturities will be re-financed at the time the security matures. The Utility will have the option to re-finance the maturities using fixed rate financing with various maturity tenors based upon the shape of the yield curve. Given the long lived nature of the Utility's assets it is likely that the maturities will be refinanced on terms similar to those prior to expiration. The analysis below illustrates the annual cost impact from refinancing the maturities using a combination of 10 year and 30 year issuances.

Company	Security	Currency	Issue Date	Maturity Date	Interest Rate	Amount	Maturity	Forecast Ave Rate	Difference	Annual (Cost)/Savings
ENBRIDGE GAS DISTRIBUTION	Debenture	CAD	2-Jun-1995	2-Dec-2024	9.85%	85,000,000	2024	4.5%	5.40%	4,590,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	22-Nov-2010	23-Nov-2020	4.04%	200,000,000	2020	4.3%	-0.26%	(520,000)
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	19-Dec-2006	17-Dec-2021	4.77%	175,000,000	2021	4.5%	0.32%	560,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	3-Jul-1998	5-Jul-2023	6.05%	100,000,000	2023	4.5%	1.60%	1,600,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	2-Oct-1995	2-Oct-2025	8.85%	20,000,000	2025	4.5%	4.40%	880,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	29-Oct-1996	29-Oct-2026	7.60%	100,000,000	2026	4.5%	3.15%	3,150,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	3-Nov-1997	3-Nov-2027	6.65%	100,000,000	2027	4.5%	2.20%	2,200,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	19-May-1998	19-May-2028	6.10%	100,000,000	2028	4.5%	1.65%	1,650,000
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	23-Nov-2013	23-Nov-2020	4.04%	200,000,000	2020	4.5%	-0.41%	(820,000)
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	22-Aug-2014	22-Aug-2024	3.15%	215,000,000	2024	4.5%	-1.30%	(2,795,000)
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	11-Sep-2015	11-Sep-2025	3.31%	400,000,000	2025	4.5%	-1.14%	(4,560,000)
ENBRIDGE GAS DISTRIBUTION	MTN	CAD	5-Aug-2016	5-Aug-2026	2.50%	300,000,000	2026	4.5%	-1.95%	(5,850,000)
UNION GAS LIMITED	MTN	CAD	2-Jun-2014	2-Jun-2021	2.76%	200,000,000	2021	4.5%	-1.69%	(3,380,000)
UNION GAS LIMITED	MTN	CAD	23-Nov-2006	25-Apr-2022	4.85%	125,000,000	2022	4.5%	0.40%	500,000
UNION GAS LIMITED	MTN	CAD	2-Jul-2013	10-Jul-2023	3.79%	250,000,000	2023	4.5%	-0.66%	(1,650,000)
UNION GAS LIMITED	MTN	CAD	17-Sep-2015	17-Sep-2025	3.19%	200,000,000	2025	4.5%	-1.26%	(2,520,000)
UNION GAS LIMITED	MTN	CAD	10-Nov-1995	10-Nov-2025	8.65%	125,000,000	2025	4.5%	4.20%	5,250,000
UNION GAS LIMITED	MTN	CAD	31-May-2016	1-Jun-2026	2.81%	250,000,000	2026	4.5%	-1.64%	(4,100,000)
UNION GAS LIMITED	MTN	CAD	22-Nov-2017	22-Nov-2027	2.88%	250,000,000	2027	4.5%	-1.57%	(3,925,000)
						3,395,000,000				(9,740,000)