

BEFORE THE NEW MEXICO PUBLIC REGULATION COMMISSION

**IN THE MATTER OF THE JOINT)
APPLICATION FOR APPROVAL TO)
ACQUIRE NEW MEXICO GAS COMPANY,)
INC. BY SATURN UTILITIES HOLDCO, LLC.)
JOINT APPLICANTS)
_____)**

Case No. 24-00266-UT

**DIRECT TESTIMONY OF MICHAEL KENNEY
ON BEHALF OF WESTERN RESOURCE ADVOCATES**

APRIL 18, 2025

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**WESTERN RESOURCE ADVOCATES
DIRECT TESTIMONY OF MICHAEL KENNEY**

1 **I. INTRODUCTION**

2 **Q. Please state your name, business address and position.**

3 A. My name is Michael Kenney. I am the Building Decarbonization Manager for Western
4 Resource Advocates (“WRA”), and I advocate for policies which reduce greenhouse gas
5 emissions from the building sector, focusing on building energy efficiency, electrification
6 and grid modernization. I work to maximize the environmental and economic benefits of
7 building decarbonization for communities across the West in line with the scientific
8 realities of climate change. WRA is a nonprofit conservation organization focused on
9 protecting the Interior West’s land, air, and water resources. My business address is 141
10 East Palace Avenue, Suite 220, Santa Fe, NM 87501.

11 **Q. Please summarize your professional experience and educational background.**

12 A. I joined WRA in 2024 in the role described above. Prior to WRA, I worked for the
13 Southwest Energy Efficiency Project on issues related to utility energy efficiency
14 programs, building decarbonization, and grid modernization. Before that I worked for
15 the California Energy Commission where I researched and developed equitable energy
16 efficiency and building decarbonization policy. I hold a bachelor's and master’s degree
17 in geological science. Please refer to WRA Exhibit MK-1 for my resume.

18 **Q. Have you previously testified before the New Mexico Public Regulation
19 Commission (“Commission” or “PRC”)?**

20 A. Yes. I have provided testimony in eight cases to date before the PRC. Please refer to
21 WRA Exhibit MK-1 for a list of cases.

22 **Q. Have you testified as an expert witness in prior NMGC cases?**

1 A. Yes, in Case No. 22-00232-UT, NMGC’s 2023-2025 Energy Efficiency Program
2 Application, and in Case No. 25-00002-UT, NMGC’s Proposed Line Extension Plan.

3 **Q. Have you testified as an expert witness before other public utilities commissions?**

4 A. Yes. I have also testified before the Public Utilities Commission of Nevada.

5 **Q. On whose behalf are you testifying?**

6 A. I am testifying on behalf of WRA.

7 **Q. Are you the only expert providing testimony on behalf of WRA?**

8 A. No. Brad Cebulko is a consultant with Current Energy Group who is also providing
9 testimony in this case on behalf of WRA.

10 **Q. What is the purpose of your direct testimony?**

11 A. My testimony addresses the proposed acquisition of New Mexico Gas Company
12 (“NMGC”) by Bernhard Capital Partners, the various intermediaries, and Saturn Utilities
13 Holding Co. (“Buyer”) from Emera, Inc. My testimony raises concerns with the proposed
14 acquisition around the strategy of the Buyer and NMGC to spend an increasing amount of
15 capital and pursue costly decarbonization opportunities considering the need to mitigate
16 rate impacts and reduce greenhouse gas (“GHG”) emissions.

17 **Q. Please explain how your testimony is organized.**

18 A. I will give an overview of my issues and recommendations to address those issues. I will
19 then present information about the proposed acquisition, Commission review of
20 acquisitions, and plans by NMGC and supported by the Buyer to pursue renewable
21 natural gas (“RNG”), certified natural gas (“CNG”), and hydrogen investments. Then, I
22 will give more detailed information about my issues. Finally, I will summarize my
23 recommended action.

1 **II. SUMMARY OF ISSUES AND RECOMMENDATIONS**

2 **Q. Please provide a brief summary your concerns with the proposed acquisition.**

3 A. I am concerned that the proposed acquisition will result in negative customer impacts.
4 Specifically, I am concerned that NMGC and the Buyer are intent on making
5 decarbonization investments that are more costly and lead to fewer GHG emissions
6 reductions than alternatives like beneficial electrification and thermal energy networks.
7 These investments combined with growing capital investments into a system with
8 declining throughput will lead to much higher costs for remaining customers.

9 **Q. Please provide a brief summary of your recommendations.**

10 A. I recommend the Commission reject the proposed acquisition. The Commission should
11 not consider approving this acquisition without significant changes to NMGC’s
12 decarbonization strategy.”

13 **III. BACKGROUND OF ACQUISITION**

14 **Q. Please briefly describe the purpose of the application filed by the Joint Applicants.**

15 A. In this application before the Commission, the Buyer is proposing to purchase NMGC
16 from its current owner, Emera Inc. The Buyer is offering to purchase NMGC for \$1.252
17 billion which includes the assumption of about \$550 million of existing NMGC debt.¹ If
18 the purchase is approved, the Buyer and Emera Inc. will enter into a transition period of
19 approximately 12 months with an option to add an additional six months.² After which,
20 the Buyer would assume all responsibility and operation of NMGC.

21 **Q. What approvals are sought by the Joint Applicants in this application?**

¹ Direct Testimony of Jeffrey Baudier at p. 22.

² *Id.* at p. 41.

1 A. The Joint Applicants are seeking:³

- 2 1. Approval of the acquisition of TECO Energy, NMGI, and NMGC (collectively,
3 the “NMGC Group”) by Saturn Holdco;
- 4 2. Approval of the Transition Services Agreement (“TSA”) whereby Emera and its
5 affiliates will provide a variety of support services to the NMGC Group for 18
6 months after closing the Transaction;
- 7 3. Approval of the divestiture of the NMGC Group by Emera, EUSHI and TECO
8 Holdings;
- 9 4. Approval of NMGC’s Amended General Diversification Plan (“Amended GDP”);
10 and
- 11 5. Any other approvals or authorizations necessary to consummate and implement
12 the Transaction.

13 The Joint Applicants are seeking to close the transaction on September 30, 2025, or if
14 feasible, in advance of the target date.⁴

15 **Q. Which areas of approval do you focus on in your testimony?**

16 A. I do not focus on a specific item for approval. Rather, my testimony is concerned with the
17 overall risk this acquisition represents for ratepayers as it pertains to future capital
18 investments, particularly decarbonization strategies.

19 **Q. Why is the Buyer interested in acquiring NMGC?**

20 A. The Buyer views NMGC as an ideal fit for its growing portfolio of natural gas utilities.⁵

21 In addition, the Buyer views natural gas use in homes and businesses as the best option

³ *Id.* at p. 8.

⁴ *Id.* at p. 5.

⁵ *Id.* at p. 15

1 today and in the future, as well as the preferred option for industries in the state. They see
2 good value through investments in NMGC's transmission and distribution system.⁶

3 **Q. Please explain the proposed benefits of the acquisition as detailed by the Buyer and**
4 **NMGC to New Mexico and NMGC customers.**

5 A. The Buyer expects to bring between 51-61 jobs to New Mexico because of bringing in
6 house services that were previously shared with Emera Inc.'s other utilities.⁷ They also
7 propose several economic development actions including:

8 • Evaluate opportunities to develop and invest in Renewable Natural Gas
9 (RNG), Certified Natural Gas (CNG), and hydrogen using shareholder
10 funds.⁸

11 • Contribute \$5 million over a period of five years for economic
12 development projects or programs in NMGC's service territory using
13 shareholder funds.⁹

14 • Make annual charitable contributions valued at a minimum of \$500,000
15 for a total of five years.¹⁰

16 The Buyer further commits to maintaining the quality of service and system reliability
17 currently provided under Emera Inc.¹¹

18 **Q. Do you believe that these are sufficient benefits to NMGC customers as part of this**
19 **transaction?**

⁶ *Id.* at pp. 15-16.

⁷ *Id.* at p. 14.

⁸ *Id.* at p. 30.

⁹ *Id.* at p. 31.

¹⁰ *Id.* at p. 3.1

¹¹ *Id.* at p. 32.

1 A. Not entirely, no. While there is certainly a benefit from a new owner infusing non-
2 ratepayer money into the New Mexico economy, I worry that the jobs impacts are
3 overstated and that the decarbonization investment strategy of the new owner will not
4 deliver benefits to customers. My colleague, Mr. Cebulko, provides more information
5 and analysis of the other proposed benefits of the acquisition.

6 **Q. What commitments has the Buyer made to pursue decarbonization investments?**

7 A. As mentioned above, the Buyer is interested in researching RNG, CNG, and hydrogen
8 opportunities to lower the greenhouse gas emissions of NMGC's system. For now,
9 NMGC and the Buyer will not use ratepayer money to research these alternatives.¹²
10 However, there remains a strong interest in making system investments to use these fuels
11 in the future. NMGC expects to eventually make investments in these opportunities as
12 part of their energy transition.¹³

13 **Q. Do you believe pursuing these investments would be in the best interest of NMGC**
14 **customers?**

15 A. In general, no. It is reasonable to expect a utility to research potential opportunities that
16 can improve the service it provides, especially if it results in fewer GHG emissions.
17 However, there is considerable evidence that the alternatives enumerated by NMGC and
18 the Buyer are either more expensive than other investments not under consideration,
19 unlikely to lead to significant GHG reductions, or both. Therefore, it is concerning to see
20 NMGC and the Buyer focused on these specific alternatives while not considering lower
21 cost opportunities that would benefit New Mexicans.

¹² Staff 3-5, attached as WRA Exhibit MK-2

¹³ JA Exhibit NEE 2-43c, P. 24, attached as WRA Exhibit MK-3

1 **IV. COMMISSION REVIEW OF ACQUISITIONS**

2 **Q. How does the Commission review utility sales and acquisitions?**

3 **A.** The Commission’s basis for review comes from NMSA § 62-6-12, which states that any
4 sale of stock of a public utility or public utility holding company must seek approval
5 from the Commission. In addition, NMSA § 62-6-13 states that the Commission shall
6 approve proposed transactions "unless the commission shall find that the proposed
7 transaction is unlawful or is inconsistent with the public interest.”

8 **Q. Does the Commission use certain criterion when it reviews acquisitions?**

9 **A.** Yes. The following six criteria are used by the Commission when reviewing acquisitions
10 for approval:¹⁴

- 11 1. Whether the transaction provides benefits to utility customers;
- 12 2. Whether the NMPRC’s jurisdiction will be preserved;
- 13 3. Whether quality of service will be diminished;
- 14 4. Whether the transaction will result in the improper subsidization of non-utility
15 activities;
- 16 5. Careful verification of the qualifications and financial health of the new owner;
17 and
- 18 6. Whether there are adequate protections against harm to customers.

19 In its approval of the Emera acquisition, the Commission also stated that it will consider
20 conditions the PRC has attached to its past acquisition approvals.¹⁵

21 **Q. Are you concerned that this proposed acquisition fails to meet all the criteria?**

¹⁴ Case No. 15-00327-UT, Certificate of Stipulation, pp. 30-31.

¹⁵ *Id.* at pp. 32-33.

1 A. Yes. I do not believe the Buyer and NMGC have provided sufficient evidence that this
2 acquisition will provide benefits to utility customers.

3 **Q. Do you have other concerns about the proposed acquisition that would lead to**
4 **negative customer impacts?**

5 A. Yes. I am similarly concerned with the length of time the Buyer has committed to holding
6 NMGC, the acquisition premium paid by the Buyer, and how that premium and limited
7 holding time will influence NMGC capital investments. My colleague, Mr. Cebulko,
8 tackles these concerns in his prepared testimony.

9 **V. CUSTOMER RISKS FROM PROPOSED BUYER**

10 **Q. Please provide a summary of the negative customer impacts you anticipate if the**
11 **acquisition is approved by the Commission.**

12 A. I am generally concerned that the acquisition would increase the likelihood customers
13 pay higher costs for natural gas service due to capital investments in hydrogen, RNG, and
14 CNG. Those investments would come at the expense of more prudent investments in
15 beneficial electrification and new business models like thermal energy networks.

16 **Q. Do you believe that a new owner and NMGC should work towards**
17 **decarbonization?**

18 A. Yes. New Mexico's Legislature and Governor's Office clearly recognize the need to
19 reduce GHG emissions as evidenced by state laws in effect and commitments made by
20 the Governor's Office. As such, NMGC and a new owner should commit themselves to
21 reducing GHG emissions from the use of natural gas at the lowest reasonable cost to
22 customers.

23 **Q. Please describe New Mexico's current clean energy policies.**

1 A. New Mexico has goals to achieve statewide greenhouse gas emissions reductions of at
2 least 45% by 2030 compared to 2005 levels¹⁶, as well as statutory requirements in the
3 Energy Transition Act for investor-owned electric utilities to achieve at least 50%
4 renewable energy as a percentage of each utility’s total retail sales to New Mexico
5 customers by 2030, increasing to 80% by 2040 and 100% by 2050.¹⁷

6 New Mexico also pledged to install its proportional share of 20 million heat pumps by
7 2030 as part of the U.S. Climate Alliance.¹⁸

8 **Q. What actions do you believe a new owner should take on decarbonization?**

9 A. Current state statutes and regulations to mitigate climate change are focused on electric
10 utilities. Natural gas utilities, like NMGC, lack explicit statutory requirements such as
11 those enacted in the Energy Transition Act. Nevertheless, natural gas consumption
12 remains a contributor to GHG emissions and the capital investments made today will last
13 decades, likely locking in continued GHG emissions. As a result, NMGC, and its
14 regulators, should consider how the Company can reduce GHG emissions through new
15 capital investment opportunities like thermal energy networks and partnering with
16 electric utilities to partially or fully electrify space heating and water heating in buildings.
17 These actions can use the existing skillset of a gas utility and limit the expansion of costly
18 infrastructure that will be left to fewer and fewer ratepayers.

19 **Q. Can you describe the resources that the Buyer has proposed to evaluate?**

¹⁶ New Mexico Executive Order 2019-003, “Executive Order on Addressing Climate Change and Energy Waste Prevention”. https://www.governor.state.nm.us/wp-content/uploads/2019/01/EO_2019-003.pdf

¹⁷ NMSA § 62-18

¹⁸ US Climate Alliance. <https://usclimatealliance.org/press-releases/decarbonizing-americas-buildings-sep-2023/>

1 A. Yes. The Buyer proposes to evaluate and invest in hydrogen, RNG, and CNG. I can
2 describe each of these resources, in turn.

3 **Q. How can hydrogen be used by the gas utility?**

4 A. Hydrogen, like natural gas, is a combustible fuel. It could be used similarly for space
5 heating, water heating, cooking, and other commercial and industrial applications, among
6 other things. It can also be blended with natural gas, although blending hydrogen in
7 natural gas distribution systems has certain technical challenges.

8 **Q. Are there different ways to produce hydrogen with differing GHG reduction
9 potential?**

10 A. Yes. The most common way to produce hydrogen, often called “gray” hydrogen, is
11 through steam methane reformation. Natural gas is the main methane source for hydrogen
12 production by industrial facilities and petroleum refineries.¹⁹ “Blue” hydrogen, is
13 produced in a similar manner, through steam methane reformation but with carbon
14 capture and storage.²⁰ This can lead to marginally lower GHG emissions. The lowest
15 emissions way to produce hydrogen, called “green” hydrogen, is through the electrolysis
16 of water using renewable electricity.²¹

17 **Q. What are the challenges of providing natural gas blended with hydrogen?**

18 A. Current natural gas infrastructure is not designed to transport high hydrogen blends, nor
19 are natural gas appliances designed to use hydrogen blends.²² Thus, new or substantially
20 retrofitted infrastructure, from pipelines to gas meters, and customer appliances would be

¹⁹ Energy Information Administration. Production of Hydrogen.
<https://www.eia.gov/energyexplained/hydrogen/production-of-hydrogen.php>

²⁰ <https://h2bulletin.com/knowledge/hydrogen-colours-codes/>

²¹ Energy Information Administration. Production of Hydrogen.
<https://www.eia.gov/energyexplained/hydrogen/production-of-hydrogen.php>

²² Energy Innovation “Assessing the Viability of Hydrogen Proposals” 2019. p. 7.

1 needed to use hydrogen. Hydrogen is the smallest molecule. It can therefore leak much
2 more easily from pipelines and cause pipeline material to breakdown.²³ Even when
3 injected into mains and service lines under lower pressure, the embrittlement and leakage
4 uncertainty remains.²⁴ To overcome these challenges, a gas utility would need to make
5 significant new capital investments in its gas system.

6 **Q. How much hydrogen can be blended into existing pipelines?**

7 A. The amount of hydrogen that can be blended into the existing natural gas system ranges
8 from 5 up to around 20 percent by volume.²⁵ However, because hydrogen has a lower
9 energy density than methane, a 20 percent by volume gas blend would only result in a 7
10 percent reduction in GHG emissions.²⁶

11 **Q. Are existing appliances designed to use natural gas with a high proportion of**
12 **hydrogen?**

13 A. No. Testing for operation and safety is done using natural gas.²⁷ Hydrogen is extremely
14 flammable, and no known odorants can attach to the gas to alert someone if it is leaking.

15 **Q. Is NMGC actively researching hydrogen blending for its distribution system?**

16 A. Yes. As allowed in the 2021 Rate Case Stipulation, NMGC has used containers of pre-
17 mixed hydrogen and natural gas to run controlled blending tests at its Edith Service
18 Center – not connected to the system serving customers.²⁸ NMGC has already tested
19 blends of 10%, 15%, and 20%.²⁹

²³ *Id.*

²⁴ NREL. Hydrogen Blending into Natural Gas Pipeline Infrastructure: Review of the State of Technology. pp. 20-23

²⁵ *Id.* at p. 7.

²⁶ *Id.* at p. 8.

²⁷ *Id.* at p. 9

²⁸ CCAE 1-17: NMGC draft hydrogen testing report, attached as WRA Exhibit MK-4

²⁹ *Id.*

1 **Q. Has NMGC completed its hydrogen testing?**

2 A. No. The study will be completed later in 2025 after testing a hydrogen blend of 25%.³⁰

3 **Q. What will NMGC do once its testing is complete?**

4 A. That is not known for certain. NMGC and the Buyer state they are aware of the
5 opportunity hydrogen represents and that New Mexico recognizes the potential for clean
6 hydrogen investments.³¹

7 **Q. Has NMGC made any commitments to the type of hydrogen it would use?**

8 A. No.³²

9 **Q. What are your concerns with continued and expanded hydrogen research and**
10 **development?**

11 A. My primary concern is that hydrogen use in the gas system is a false solution. As
12 regulators, utilities, and stakeholders spend more time evaluating hydrogen for natural
13 gas blends, it delays and detracts from initiatives to deploy alternative clean heating
14 technologies that are available and cost-effective and can reduce GHG emissions now,
15 including energy efficient heat pumps, thermal energy networks, and others. As noted in
16 a recent review of hydrogen use, “Given the urgency of reducing carbon emissions,
17 policies and regulations should focus on increasing deployment of technologies available
18 today rather than anticipating widespread availability of hydrogen later.”³³

19 **Q. What role do you believe is best for hydrogen?**

³⁰ CCAE 2-5, attached as WRA Exhibit MK-5

³¹ NEE 2-37, attached as WRA Exhibit MK-6

³² CCAE 2-5, attached as WRA Exhibit MK-5

³³ Rosenow, Jan. Is heating homes with hydrogen all but a pipe dream? An evidence review. October 2022.
<https://www.cell.com/action/showPdf?pii=S2542-4351%2822%2900416-0>

1 A. There are several applications where hydrogen use should be prioritized. This includes
2 replacing industrial heating, shipping, and possibly long-term energy storage.³⁴ These
3 sectors have limited alternatives for decarbonization so lower GHG fuels like green
4 hydrogen should be reserved for those end uses. Injecting hydrogen into distribution gas
5 pipelines results in marginal GHG emissions reductions and high costs for ratepayers.

6 **Q. What is RNG?**

7 A. Renewable natural gas is created or produced by capturing and upgrading methane-rich
8 gas, typically called biogas, formed from anaerobic digestion of organic wastes, to
9 pipeline-quality natural gas. Biogas forms as microorganisms digest organic wastes, such
10 as animal manure, food scraps, yard waste, and municipal wastewater, in an anaerobic
11 environment. This biogas is typically a mixture of methane and CO₂, which must be
12 upgraded to a purer stream of methane before it can be injected into a distribution
13 pipeline and used interchangeably with natural gas.

14 **Q. Describe what, if any, plans NMGC and the Buyer have stated related to RNG**
15 **investments?**

16 A. NMGC has not spent any money on evaluating opportunities for the development of and
17 investment in RNG in the last five years.³⁵ NMGC has been evaluating the potential to
18 purchase RNG for its sales customers and to build, own, and operate an RNG plant.³⁶
19 According to its long-term outlook used in the lead up to this acquisition, NMGC expects
20 RNG investment to play a bigger role including as a blend sold to all customers.³⁷ Up to

³⁴ *Id.*

³⁵ NM DOJ 1-30, attached as WRA Exhibit MK-7

³⁶ JA Exhibit NEE 2-43b. p. 53, attached as WRA Exhibit MK-8

³⁷ *Id.* at p. 53.

1 6% of the 2024-2043 capital expenditure forecast are assigned to decarbonization
2 investments, specifically RNG.³⁸

3 **Q. Are there other sectors of the economy competing for RNG?**

4 A. Yes. RNG is used by natural gas vehicles, especially as part of a low-carbon fuel
5 standard. California has a low-carbon fuel standard (“LCFS”) with lucrative rebates for
6 RNG production.³⁹ As a result, much of the RNG generated today gets purchased through
7 that LCFS marketplace. New Mexico is also establishing a Clean Fuel Standard (CFS)
8 and marketplace for credits that may create additional opportunities for RNG locally.

9 **Q. How much RNG could potentially be needed to meet a CFS in New Mexico?**

10 A. According to an analysis developed for the state of New Mexico on the impact of a Clean
11 Fuel Standard, New Mexico transportation sector demand could amount to an estimated 7
12 tBTU of RNG in 2030. This is roughly 7% of 2019 natural gas use statewide.⁴⁰

13 **Q. How much RNG can New Mexico reasonable produce?**

14 ICF performed a nationwide assessment of RNG potential by 2040 finding that New
15 Mexico could produce between 12.6 and 24.2 tBTU per year from anaerobic processes
16 (Table 1).⁴¹

³⁸ *Id.*

³⁹ CCAE 1-16, attached as WRA Exhibit MK-9

⁴⁰ New Mexico Clean Fuel Standard Economic Impact Analysis. p. 6. Prepared for the New Mexico Environment Department. January 2022. https://www.env.nm.gov/wp-content/uploads/2022/02/New_Mexico_Clean_Fuel_Standard_Economic_Impact_Analysis-Jan_26_2022.pdf

⁴¹ American Gas Foundation. RENEWABLE SOURCES OF NATURAL GAS: SUPPLY AND EMISSIONS REDUCTION ASSESSMENT. December 2019. <https://gasfoundation.org/wp-content/uploads/2019/12/AGF-2019-RNG-Study-Full-Report-FINAL-12-18-19.pdf>

1

Table 1 – New Mexico RNG Anaerobic RNG Potential by 2040.

New Mexico	Landfill Gas (LFG)	Animal Manure	Water Resource Recovery Facilities (WRRF)	Food Waste	Total
Low potential in 2040 (tBTU/year)	3.441	8.988	0.106	0.041	12.576
High potential in 2040 (tBTU/year)	5.651	17.976	0.157	0.444	24.228

2

3 **Q. Is there sufficient RNG to serve the needs of NMGC customers?**

4 A. No. NMGC estimates its customers will consume over 90 tBTU per year moving
5 forward.⁴² So even under the best-case scenario for RNG development, only a little over
6 20% of gas demand could be met with RNG by 2040. This does not account for RNG
7 used to meet a New Mexico CFS or out of state LCFS.

8 **Q. How does the cost of RNG compare with conventional natural gas?**

9 A. ICF reports a range of costs for RNG from animal manure at \$18.4/MMBtu to
10 \$32.6/MMBtu⁴³ and from food waste of \$19.4/MMBtu to \$28.3/MMBtu.⁴⁴ Compare this
11 with the average price of natural gas during the 2024 – 2025 heating season, as measured

⁴² JA Exhibit WRA 2-14, attached as WRA Exhibit MK-10.

⁴³ American Gas Foundation. RENEWABLE SOURCES OF NATURAL GAS: SUPPLY AND EMISSIONS REDUCTION ASSESSMENT. December 2019. <https://gasfoundation.org/wp-content/uploads/2019/12/AGF-2019-RNG-Study-Full-Report-FINAL-12-18-19.pdf>

⁴⁴ *Id.* at pp. 54-56.

1 at Henry Hub, of \$3.51/MMBtu.⁴⁵ In other words, trying to reach the high RNG potential
2 would also come at a cost of gas that is several times higher than natural gas.

3 **Q. What are your concerns with continued and expanded research and development of**
4 **RNG?**

5 A. Again, my primary concern here is that NMGC and the Buyer are interested in a false
6 solution. While New Mexico can generate RNG from landfills and livestock manure, it
7 will not be at a scale or cost appropriate to pass along to NMGC customers.

8 **Q. What is the best role for RNG?**

9 A. New Mexico is establishing a market through the CFS that could deploy RNG for natural
10 gas vehicles. RNG is also being sold into the California LCFS. Other RNG developments
11 are better suited for industrial usage or on-site electricity power generation. Injecting
12 RNG into the distribution system is a very costly way to lower the GHG emissions of
13 residential and commercial energy consumption. RNG is better left for high heat
14 processes that lack an affordable electric alternative and transportation sectors without a
15 near-term electric alternative.

16 **Q. What is CNG?**

17 A. Certified Natural Gas, also known as responsibly source gas, is verified by a third party
18 to meet certain environmental requirements that result in lower methane emissions from
19 production and transportation. There are no standardized criteria for meeting a
20 “responsibly sourced gas” standard. Instead, the criteria, including frequency and method

⁴⁵ U.S. EIA, Henry Hub Natural Gas Spot Price, Monthly (Dollars per Million Btu), averaged over the months of November 2024 – March 2025. Available at <https://www.eia.gov/dnav/ng/hist/rngwhhdm.htm?ref=upmarket.co>

1 of monitoring leaks, along with other considerations such as air quality and water usage,
2 vary from certifier to certifier.⁴⁶

3 **Q. So does CNG reduce NMGC customer emissions?**

4 A. No. It focuses on upstream emissions associated with the production and transportation of
5 natural gas.

6 **Q. How does a gas utility or third-party measure GHG reductions from CNG?**

7 A. It is very difficult to do this reliably. A gas utility or the third party producing the CNG
8 must first establish the counterfactual. Some CNG compares standard natural gas
9 production to natural gas production with additional fugitive emission measures. Other
10 benefits are measured as a credit. For example, the emissions from natural gas production
11 get offset by a project, like a grassland conservation project, that lowers emissions
12 compared to what would have occurred otherwise.

13 **Q. Are you opposed to preventing fugitive emissions from natural gas production and
14 transportation?**

15 A. No. The U.S. lags behind other nations in preventing fugitive emissions, so it is critical
16 that efforts increase to prevent the release of methane into the atmosphere where it is a
17 potent greenhouse gas.⁴⁷ I am opposed to natural gas utilities obfuscating the damages
18 from natural gas use by claiming they can procure “cleaner” natural gas.

19 **Q. What CNG, if any, has NMGC used to date?**

⁴⁶ Project Canary, “Responsible Sourced Gas”, <https://www.projectcanary.com/services/responsiblysourced-gas/>.

⁴⁷ IEA (2024), Global Methane Tracker 2024, IEA, Paris <https://www.iea.org/reports/global-methane-tracker-2024>, License: CC BY 4.0

1 A. NMGC has and continues to monitor the availability of CNG, however it has not
2 purchased any to date.⁴⁸ The Buyer supports this approach and decisions by NMGC.

3 **Q. What are your concerns with more investment and research into CNG?**

4 A. My concern with CNG is that it does not lower the GHG emissions of gas consumption at
5 the end user while it provides unreliable upstream GHG reductions. Altogether, CNG
6 appears to be another false solution for natural gas companies to reduce GHG emissions.

7 **Q. Does CNG have a role to play for a gas utility such as NMGC?**

8 A. That depends. If NMGC can demonstrate that CNG is produced using robust, industry-
9 accepted GHG emissions accounting protocols, and that the emission reductions are
10 incremental and additional to any existing regulatory requirements in New Mexico or the
11 state where the gas was produced, then NMGC could propose investing in a CNG project
12 and the Commission and stakeholders could evaluate it. In my opinion, until those robust
13 GHG protocols exist, CNG projects are not a good use of ratepayer funds.

14 **Q. Is NMGC committed to other decarbonization actions?**

15 A. Yes. NMGC operates an Advanced Mobile Leakage Detection program to identify and
16 repair leaks, which the Buyer intends to continue.⁴⁹ This helps NMGC to maintain a very
17 safe system, which WRA witness Mr. Cebulko discusses in more detail. NMGC has also
18 expanded investments in energy efficiency programs in the last few years.⁵⁰

19 **Q. Are there other actions or investments NMGC could pursue to reduce greenhouse**
20 **gas emissions that were not mentioned in the application?**

⁴⁸ NM DOJ 1-30, attached as WRA Exhibit MK-7

⁴⁹ CCAE 1-8, attached as WRA Exhibit MK-11

⁵⁰ Case No. 22-00232-UT. Final Order Adopting Recommended Decision. March 22, 2023

1 A. Yes. Two prominent examples include beneficial electrification through the adoption of
2 heat pumps for space heating and water heating, and installation and operation of thermal
3 energy networks.

4 **Q. How would beneficial electrification help NMGC customers?**

5 A. Beneficial electrification, if done with intention and coordination, can avoid new
6 investments in gas infrastructure that may not be useful for their entire planned life.
7 NMGC states that distribution pipelines can last for 50 years and transmission pipelines
8 nearly double that.⁵¹ Even if a customer uses natural gas today, the cost competitiveness
9 of heat pumps means it is reasonable that customers may choose to install a heat pump
10 when their existing furnace or water heater dies. Customers may also install a heat pump
11 to replace their current cooling equipment, which could displace some if not all those
12 customers' current gas heating.

13 **Q. Are there other programs that incentivize heat pumps in New Mexico?**

14 A. Yes. NMGC customers can currently receive a state tax credit of \$1000, or up to \$2000 if
15 they qualify as low-income, for installing a heat pump via the Sustainable Buildings Tax
16 Credit.⁵² At present, federal tax credits of up to \$2,000 are also available for heat
17 pumps.⁵³ Depending on the electric utility, customers can also receive a rebate for
18 installing a heat pump. For example, Public Service Company of New Mexico (“PNM”)

⁵¹ WRA 4-16, attached as WRA Exhibit MK-12

⁵² Sustainable Buildings Tax Credit, <https://www.emnrd.nm.gov/ecmd/tax-incentives/sustainable-building-tax-credit-sbtc/>.

⁵³ IRS. Energy Efficient Home Improvement Credit, <https://www.irs.gov/credits-deductions/energy-efficient-home-improvement-credit>

1 offers a rebate between \$800 and \$1200 per heat pump, depending on the efficiency of
2 the unit.⁵⁴ PNM also offers incentives to developers to build all-electric homes.⁵⁵

3 **Q. Does NMGC recognize the impacts of beneficial electrification?**

4 A. Yes. A report prepared on behalf of Emera Inc. and NMGC by PA Consulting as part of
5 the transaction assessed electrification of customer heating.⁵⁶

6 **Q. How does NMGC expect beneficial electrification to affect its future demands?**

7 A. The report developed by PA Consulting found that heat pump adoption will increase and
8 result in less gas consumption and new customers in the coming years.⁵⁷

9 **Q. What might happen if NMGC and the Buyer continue or increase capital
10 investments?**

11 A. As I stated earlier, if NMGC and the Buyer invest in infrastructure to serve gas demand
12 as if it remains unchanged, but customer demand declines, then customers will face
13 higher costs, because the costs of capital investments will be spread over fewer therms
14 delivered, fewer customers overall, or both. WRA witness Mr. Cebulko presents more
15 information on this risk.

16 **Q. How can NMGC turn this risk into a benefit for existing customers?**

17 A. Ratepayers benefit when gas utilities avoid the costs of new capital investment in gas
18 infrastructure that may no longer be necessary. Ratepayers also benefit when utilities plan
19 for a managed transition and mitigate cost burdens shouldered by remaining gas
20 customers. Beneficial electrification is one such strategy NMGC can adopt to limit
21 growth and avoid new capital investments. Thermal energy networks represent a feasible

⁵⁴ <https://www.pnm.com/midstream>. See also the final order in Case No. 23-00138-UT.

⁵⁵ <https://www.pnm.com/newhomes>.

⁵⁶ NEE Exhibit 2-43c. pp. 46-47, attached as WRA Exhibit MK-3.

⁵⁷ *Id.*

1 alternative for gas utilities to join the clean energy transition while leaning into their
2 existing skills and capital investment strategies.

3 **Q. Please describe thermal energy networks.**

4 A. Thermal energy networks can replace existing gas infrastructure with clean energy
5 infrastructure that uses a non-combustible, thermal energy medium: water. Thermal
6 energy networks circulate water through underground pipes, capturing and exchanging
7 heat between connected buildings and heat sources.⁵⁸ Geothermal networks are a
8 subcategory of thermal energy networks that use the relatively constant temperature of
9 the earth below the frostline to assist with heating in winter and cooling in summer.⁵⁹
10 Thermal energy networks, with or without vertical geothermal boreholes, have similar
11 basic components. A horizontal pipe loop is installed underground below the frostline.
12 This is a closed-loop pipe system: it is filled just once with water that then continuously
13 circulates thermal energy. Ground-source heat pumps, powered by electricity, draw
14 thermal energy from the pipe loop into connected buildings, or move it out of buildings
15 and into the loop.⁶⁰

16 **Q. What are the GHG benefits of thermal energy networks?**

17 A. The system has no on-site emissions. Instead, there are only emissions associated with
18 electricity generation, which will decrease over time as more renewable electricity comes
19 online.⁶¹

⁵⁸ The Future of Heat: Thermal Energy Networks as an Evolutionary Path for Gas Utilities Toward a Safe, Equitable, Just Energy Transition. <https://buildingdecarb.org/wp-content/uploads/The-Future-of-Heat-Thermal-Energy-Networks-as-an-Evolutionary-Path-for-Gas-Utilities-Toward-a-Safe-Equitable-Just-Energy-Transition.pdf>, attached as WRA Exhibit MK-13.

⁵⁹ *Id.* at p. 3

⁶⁰ *Id.*

⁶¹ *Id.* at p. 4.

1 **Q. Why is a gas company like NMGC well-suited to pursue projects like this?**

2 A. Thermal energy networks represent an alternative to gas transportation and consumption
3 that aligns with the utility model. They allow gas utilities to bring their existing
4 workforce and contractor relationships to the clean energy transition.⁶² Installing these
5 networks requires the skills of pipefitters and pipe layers. While not all processes are one-
6 to-one across projects, the gas pipes and thermal energy loops both use high-density
7 polyethylene plastic which gas workers are certified to maintain and operate.⁶³

8 **Q. Are any gas utilities implementing thermal energy networks?**

9 A. There are at least 28 thermal or geothermal energy networks ongoing.⁶⁴ Some noteworthy
10 projects include Eversource and National Grid in Massachusetts, where the utilities are
11 actively implementing neighborhood scale geothermal energy networks. Eversource has a
12 pilot near completion that consists of 36 buildings: a total of 125 customer accounts.⁶⁵
13 National Grid has a pilot in Boston to convert 129 units across 7 public housing buildings
14 to a geothermal network.⁶⁶ In Colorado, Xcel Energy is supporting a recently announced
15 home development project that will see 1,500 new homes connected to a geothermal
16 network.⁶⁷

17 **Q. How could NMGC pursue thermal energy network projects?**

⁶² *Id.* at p. 7.

⁶³ *Id.* at p. 7.

⁶⁴ Building Decarbonization Coalition. Neighborhood-Scale Building Decarbonization Map.
<https://buildingdecarb.org/neighborhood-scale-projects-map>

⁶⁵ Eversource. Geothermal Pilot in Framingham.
<https://www.eversource.com/content/residential/about/transmission-distribution/projects/massachusetts-projects/geothermal-pilot-project>

⁶⁶ City of Boston. Boston Housing Authority, National Grid Agree to Develop Networked Geothermal Heating at Franklin Field Apartments. January 2024. <https://www.boston.gov/news/boston-housing-authority-national-grid-agree-develop-networked-geothermal-heating-franklin>

⁶⁷ St. John, Jeff, Canary Media, Lennar will build 1,500 new Colorado homes with geothermal heat pumps. April 2025. <https://www.canarymedia.com/articles/geothermal/heat-pumps-dandelion-lennar>

1 A. Initially, NMGC could work with PNM or another electric utility to identify a pilot
2 project. This pilot could be a new housing development or a site where NMGC
3 anticipates a major pipeline replacement project. NMGC could install and operate a
4 thermal energy network at the housing site or where pipeline project is avoided.
5 Eventually, NMGC should implement a standard process by which it assesses the
6 feasibility of using thermal energy networks in place of traditional gas infrastructure
7 projects. Thus, NMGC transitions and retires infrastructure to achieve deep
8 decarbonization, while building up a new sustainable business model.

9 **Q. Did NMGC or the Buyer address thermal energy networks in its identification of**
10 **potential benefits associated with the proposed acquisition?**

11 A. No, not explicitly. NMGC and the Buyer propose to evaluate and invest in RNG, CNG,
12 and hydrogen. They do not mention evaluating or investing in beneficial electrification or
13 thermal energy networks. As I outlined previously, I have fundamental concerns with the
14 resources NMGC and the Buyer propose to evaluate: RNG and hydrogen are not
15 compatible with achieving deep levels of decarbonization, while there are no robust,
16 industry-accepted standards for greenhouse gas accounting for CNG. As such, in my
17 view, ratepayers would not be well-served by these possible investments.

18 **VI. RECOMMENDATIONS**

19 **Q. Based on the policy risks you discussed above, what is your recommendation**
20 **regarding the proposed acquisition?**

21 A. I recommend the Commission deny the proposed acquisition. The Commission should
22 not consider approving this acquisition without requiring a commitment from Buyer to
23 revise NMGC's approach to Integrated Resource Planning to include alternative

1 decarbonization and capital investment strategies, and without the other requirements as
2 recommended by Mr. Cebulko.”

3 **Q. What decarbonization strategies do you recommend NMGC pursue with the**
4 **support of a new owner?**

5 A. Whether Emera, Inc. remains the owner or the proposed Buyer, NMGC should pursue a
6 coordinated beneficial electrification strategy with overlapping electric utilities. This
7 includes supporting the adoption of heat pumps through its energy efficiency programs
8 and avoiding expanding or replacing gas infrastructure if customers could be partially or
9 fully electrified to avoid the project at a lower cost. The same goes for research,
10 development, and implementation of thermal energy networks. NMGC should move
11 swiftly towards identifying new developments where a thermal energy network could go
12 into operation. NMGC can begin to move into sustainable, clean energy investments
13 through these thermal networks.

14 **Q. Do you recommend against any efforts by NMGC and the Buyer to pursue**
15 **hydrogen, RNG, and CNG?**

16 A. Not necessarily; however, those strategies must be tailored to address decarbonization
17 efforts of certain sectors, and not for injection into the distribution system to generally
18 lower the GHG intensity of residential and commercial customers’ natural gas
19 consumption.

20 **Q. What are your recommendations for hydrogen use?**

21 A. I recommend hydrogen research, development, and investments be directed toward
22 decarbonizing the industrial customers and other customers that require high heat.
23 Moreover, NMGC should be prioritizing investments into green hydrogen. I do not

1 recommend NMGC and the Buyer pursue blending hydrogen into the distribution system
2 for the reasons discussed previously around cost and safety.

3 **Q. What are your recommendations for RNG?**

4 A. Like hydrogen, I recommend RNG research, development, and investments targeted at
5 decarbonizing gas consumption for customers who lack efficient, cost-effective electric
6 alternatives. I do not recommend NMGC and the Buyer pursue RNG for general blending
7 into the distribution system due to the availability and cost of the fuel.

8 **Q. What are your recommendations for CNG?**

9 A. I do not recommend NMGC pursue CNG unless NMGC can demonstrate the use of a
10 robust emissions accounting protocol, and that any CNG provides incremental, additional
11 emission reductions. CNG has tenuous benefits upstream and no benefits downstream. If
12 NMGC and the Buyer wish to use ratepayer funds to invest in CNG, they may propose
13 such investments and demonstrate the emissions benefits in an adjudicated proceeding.

14 **VII. CONCLUSION**

15 **Q. Please summarize your testimony.**

16 A. I do not recommend approval of the acquisition of NMGC by the Buyer as proposed. I
17 am concerned that NMGC customers will fail to benefit from the acquisition. NMGC and
18 the Buyer wish to pursue capital investments and decarbonization strategies that are not
19 beneficial to customers in the long term. Hydrogen, RNG, and CNG are insufficient and
20 too costly to deliver the decarbonization New Mexico needs. NMGC and the Buyer
21 should focus on immediately available and feasible decarbonization actions such as
22 beneficial electrification, while making long term investments in thermal energy
23 networks. The Commission is tasked with evaluating whether the transaction provides

1 benefits to utility customers. Focusing solely on the emission reduction strategies that
2 NMGC and the Buyer propose, I do not believe this transaction provides benefits to
3 utility customers. Indeed, if NMGC and the Buyer invest in these expensive resources,
4 capital costs (and, in all likelihood, customer rates) will increase, with minimal emission
5 reduction benefits to show for it.

6 **Q. Does this conclude your testimony?**

7 A. Yes.