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September 15, 2022

Mr. Will Seuffert
Executive Secretary
Minnesota Public Utilities Commission
121 East Seventh Place, Suite 350
St. Paul, MN 55101-2147

VIA ELECTRONIC FILING

Re: In the Matter of a Commission Investigation into the Impact of Severe Weather in February 2021 on Impacted Minnesota Natural Gas Utilities and Customers
Docket No. G999/CI-21-135

In the Matter of the Petition of CenterPoint Energy for Approval of a Recovery Process for Cost Impacts Due to February Extreme Gas Market Conditions
Docket No. G008/M-21-138

CenterPoint Energy Customer Protection Plan

Dear Mr. Seuffert:

Enclosed for filing, please find CenterPoint Energy Resources Corp., d/b/a CenterPoint Energy Minnesota Gas' ("CenterPoint Energy's") Customer Protection Plan filed in response to the Minnesota Public Utilities Commission's August 23, 2022, Notice of Comment Period, which requested each natural gas utility file a plan to improve its practices to protect ratepayers from extraordinary gas price spikes in the future.

Please contact me at kstastny@taftlaw.com or (612) 977-8656 if you have any questions regarding this filing.

Sincerely,

Taft Stettinius & Hollister LLP

/s/ Kristin M. Stastny

Kristin M. Stastny

Enclosures
cc: Service Lists

STATE OF MINNESOTA
BEFORE THE MINNESOTA PUBLIC UTILITIES COMMISSION
121 Seventh Place East, Suite 350
St. Paul, MN 55101-2147

Katie Sieben	Chair
Valerie Means	Commissioner
Matt Schuerger	Commissioner
Joseph Sullivan	Commissioner
John Tuma	Commissioner

In the Matter of a Commission Investigation into the Impact of Severe Weather in February 2021 on Impacted Minnesota Natural Gas Utilities and Customers	Docket No. G999/CI-21-135
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CenterPoint Energy Customer Protection Plan

I. Introduction

The events that occurred in February 2021 had profound impacts on communities across the country. Cold weather across much of the United States led to increased demand for natural gas and supply disruptions in the national market for natural gas, resulting in an unprecedented spike in gas prices (the "February Market Event"). To help mitigate the impacts to customers of possible future natural gas price spikes, the Commission directed each natural gas utility to review its gas procurement and other relevant practices and file a plan for how those practices can be improved or modified.[1] The Company appreciates the Commission's continued focus on

[1] The Commission's August 23, 2022, Notice of Comment Period ("Notice") required CenterPoint Energy, Xcel Energy, Minnesota Energy Resources Corporation, and Great Plains Natural Gas Co. (collectively the "Gas Utilities") to review their gas contracting, purchasing, hedging, storage, peak-shaving, interruptible, customer communications, and other relevant practices and, by September 15, 2022, file a plan on how the utility will improve or modify its practices to protect ratepayers from extraordinary natural gas price spikes in the future. The Notice further directed the Gas Utilities to (1) identify the general timeframe for implementation of each proposed modification; (2) identify any statutory, rule, or tariff changes that could be implemented and whether the proposed changes are consistent with the Natural Gas Innovation Act, Minn. Stat. §§ 216B.2427 and 216B.2428; (3) discuss whether integrated resource planning could facilitate ratepayer protection from price spikes; and (4) discuss whether the utilities have considered filing a Performance-Based Gas Purchasing Plan under Minn. Stat. § 216B.167.

these important issues and establishment of this process for review of utility plans by stakeholders and the Commission.[2]

CenterPoint Energy Resources Corp., d/b/a CenterPoint Energy Minnesota Gas ("CenterPoint Energy" or the "Company") is committed to evaluating and implementing prospective changes that could provide additional protection to customers from extraordinary natural gas price spikes in the future. While the Company has continued to review and refine its planning and approach to gas supply based on available tools and market conditions, the unprecedented February 2021 Market Event requires even greater focus on possible changes.[3]

Of course, the pursuit of options that could mitigate against high or extraordinary prices should not jeopardize the safety or reliability of the gas system. In the electric industry, following an outage or rolling blackout, power is generally restored remotely and relatively quickly, as long as overall grid stability has not been compromised. However, if natural gas system pressures become inadequate to supply customers, every home and business must be physically visited to turn off service and all gas appliances. The system must then be purged, re-pressurized, and then every home and business must be visited to restore service. The process to restore natural gas service can therefore take days, weeks, or longer to complete, posing a potentially significant threat to the safety of our customers and employees during cold, life-threatening conditions.

In evaluating potential changes, it is also important to ensure the costs incurred to implement a modification are justified in light of the potential benefits or avoided exposure to potential risks. Compounding the difficulty of mitigating against volatility, the current market outlook for natural gas indicates prices are expected to remain high this winter season compared to recent winters, which has also increased the cost of many of the tools that can be used to mitigate volatility. Further discussion of current market considerations is provided in Section II of this filing.

With these considerations in mind, CenterPoint Energy has reviewed its gas procurement and other relevant practices and through this filing presents a plan that:

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[2] As explained in more detail below, the Gas Utilities are also submitting a Joint Filing addressing (1) a possible trigger to be used by the utilities in implementing price-based practices; (2) possible statutory sales tax relief for customers; (3) the history and functioning of the Commission's annual automatic adjustment ("AAA") and purchased gas adjustment ("PGA") rules; and (4) the history of utility performance-based gas purchasing plan filings under Minn. Stat. § 216B.167.

[3] CenterPoint Energy submits this filing in response to the Commission's Notice in this matter and supports efforts to continue to analyze potential changes to mitigate against volatility and future price spikes. By submitting these comments, the Company does not waive any argument or concede to any parties' allegation that may be raised in a request for reconsideration or appeal of the Commission's order in Docket No. G008/M-21-138.

1) Describes the steps that have already been taken to provide further protection to customers from pricing events, which do not require further review or approval by the Commission. These modifications are discussed in Section III.

2) Presents three alternatives for price-based actions related to storage, peak shaving, and curtailment, which could be implemented during the upcoming 2022-2023 heating season if ordered by the Commission in this proceeding.[4] These options are discussed in Section IV.A.

3) Describes the longer-term changes the Company is evaluating for possible future implementation. These longer-term changes are discussed in Section IV.B, and Attachment B.

4) Discusses the extent to which integrated resource planning, performance-based gas purchasing, or statutory changes could help to mitigate against future market events. A discussion of these considerations is provided in Sections V, VI, and VII.

In support of this filing, CenterPoint Energy is including the following attachments:

Attachment A	Summary of Completed and Proposed Modifications
Attachment B	Detailed Long-Term Modification Evaluation
Attachment C	Forecasted First-of-Month Pricing for Winter 2022-2023
Attachment D	Samples of Customer Communications
Attachment E	Clean and Redlined Tariff Sheets - Interim Price-Based Economic Curtailment

II. Natural Gas Market Outlook

In considering alternatives that could help to protect customers from volatility in the daily gas spot market, it is important to review the broader natural gas markets today and the forecasts for natural gas prices for the upcoming winter heating season. Commodity prices for gas supplies used in Minnesota are set in a nationwide, competitive marketplace and there are a number of factors that impact the market price of gas supplies, all of which are outside the control of the Company. In recent years, the February Market Event notwithstanding, natural gas has traded at low prices, market volatility has been low, and the spread between summer and winter prices has been narrow. For the upcoming 2022-2023 winter, however, there are a

[4] During the Commission's deliberations on August 11, 2022, the Commission indicated it would hold hearings on the Gas Utilities' September 15, 2022 plans on or before December 9, 2022.

number of factors that are expected to put upward pressure on market prices for natural gas, including:

- increased demand as the economy recovers from the pandemic;
- increased market volatility due to Russia's invasion of Ukraine and associated increases in liquefied natural gas ("LNG") exports;
- low storage inventory levels due to high withdrawals in 2021-2022; and
- increased natural gas demand to support electric power generation.

These and other factors could contribute to elevated prices this season, which is important to keep in mind as we look to mitigate price volatility. The February Market Event occurred against a backdrop of average monthly prices of about $3.50 per Dth. As of September 2022, prices for the upcoming winter are expected to be up to *three times* as high as they were for the winter of 2020-2021, with prices ranging from $7 to $10.70 per Dth for monthly baseload supply contracts (first-of-month ("FOM") contracts).[5] Gas purchased at daily prices could be far higher. Current gas market pricing presents a challenge to any price protection program, and the Company is working to monitor the market, keep customers informed, and implement practices to help keep prices affordable for customers.

III. Modifications Implemented Since February 2021 Market Event

A. Procurement Practices

To meet firm customer needs, the Company uses a diversified gas supply portfolio consisting of a combination of baseload supplies, call options, daily spot market purchases, storage, and peak shaving supplies that are designed to maintain reliability while balancing price protection, stability of gas supply costs, and reasonable prices in light of current market conditions and customer demand. The Company reviews and updates its Gas Procurement Plan annually to account for changes in projected customer demand, forecasted market conditions, and available resources. CenterPoint Energy aims to have price stabilization tools in place for approximately half of its forecasted normal winter load in advance of the start of the winter season.

In response to the February 2021 Market Event, CenterPoint Energy introduced a number of modifications and enhancements to its Gas Procurement Plan to further protect customers from the risk of extraordinary price volatility. Beginning with the most recent heating season 2021-2022, the Company implemented the following changes:

- **Increased baseload FOM index purchases:** By increasing baseload purchases, CenterPoint Energy reduced the percentage of supply to be met through daily gas purchases. Historically, the Company established the volume of monthly baseload

[5] *See* Attachment C.

based on the forecasted warmest daily load each month. After the February Market Event, to ensure more price stability and price protection for our customers, we increased baseload to stabilize a portion of our "normal" weather scenario rather than the warmest weather scenario. The change to baseload volumes based on the average weather amounted to a 33 percent increase in baseload volumes from the 2020-2021 heating season, accounting for an increase of 5.9 percent in the total winter plan met by FOM index purchases.

- **Increased hedged baseload:** In 2021-2022, CenterPoint Energy increased the volume of hedged baseload purchases to the maximum authorized under the Commission's 2020 Hedging Order to align with customer growth and to achieve the targeted stabilization rate.[6] By increasing baseload hedges, more of the portfolio is protected and CenterPoint Energy has less reliance on daily gas purchases in the spot market. We increased our baseload hedges 13 percent over the hedged volumes in the 2020-2021 heating season, accounting for an increase of 2.1 percent in the total winter plan met by hedged baseload.

For the upcoming heating season 2022-2023, the Company is implementing the following modifications and enhancements:

- **Continued increase in FOM index purchases:** CenterPoint Energy is continuing to plan for a greater percentage of FOM baseload based on the "normal" weather scenario instead of the warmest weather scenario.

- **Continued increase in baseload hedges:** CenterPoint Energy is continuing to plan for greater hedged baseload purchases to the maximum authorized under the Commission's 2020 Hedging Order.

- **Increased supply diversity:** By blending the FOM and gas daily index purchases between the Company's primary receipt points on Northern Natural Gas ("NNG") and Viking, we have more optionality to purchase from different price indices, so we can maximize supply deliveries from the lower-priced index.

- **Hedging optimization:** CenterPoint Energy is executing the Company's hedging plan according to expert advice from Aegis Hedging, including heavily weighting the portfolio on fixed price products.

[6] In the Matter of the Petition of CenterPoint Energy for Approval of an Extension of Rule Variances to Minnesota Rules to Recover the Costs of Certain Natural Gas Financial Instruments Through the Purchased Gas Adjustment, Docket No. G008/M-19-699, ORDER (Jan. 13, 2020) (hereinafter, "2020 Hedging Order").

- **Increasing diversity of hedges:** The Company has increased diversity of hedged supplies by adding hedged baseload at Demarc in addition to volumes delivered at Ventura.

- **Executing longer-term hedges:** We have entered some longer-term, two-year hedges effective April 2023, to secure longer-term price protections and lower prices than the upcoming winter prices.

We have implemented these changes to our overall procurement strategy to further stabilize as much of our portfolio as reasonably possible, without incurring unreasonable expense. These modifications are discussed in greater detail in the Company's 2022 Gas Procurement Plan, which provides CenterPoint Energy's overall planning objectives and outlines the gas supply plan for the 2022-2023 winter heating season.[7]

B. Customer Communications

Given the February Market Event and the upward trend in pricing, keeping our customers informed is particularly important to our mission to deliver reliable and affordable service. CenterPoint Energy regularly engages with customers throughout the year to provide information on how to reduce the impacts of cold weather, and higher usage, on their gas bills. The Company has undertaken and is planning to continue a number of customer communication campaigns, including:

- **Heating season cold weather communications campaign:** CenterPoint Energy has engaged in communications efforts to educate customers about the cause of higher natural gas bills and to raise awareness of available tools and programs such as My Energy Analyzer, levelized billing, energy efficiency tips, Conservation Improvement Programs ("CIP"), Gas Affordability Program ("GAP"), and Low Income Home Energy Assistance ("LIHEAP").

- **Conservation Improvement Program ("CIP") campaign:** The Company communicates with customers year round about how to conserve energy and encourages participation in residential and business CIP offerings to help customers save energy and money.

- **Business customer engagement:** In addition to information about energy conservation, the Company provides its commercial and industrial customers with monthly gas price updates to assist with budgeting, along with quarterly newsletters providing information on energy efficiency, natural gas costs, and natural gas technologies.

[7] CenterPoint's 2022-2023 Gas Procurement Plan was filed in Docket G008/M-19-699 on September 14, 2022.

Samples of recent communications are provided in Attachment D.

CenterPoint Energy has generally not issued public requests for customers to voluntarily, immediately, and temporarily reduce their natural gas use as part of its normal gas supply planning, but instead has preserved such conservation requests for emergency situations. Beyond continuation of the communication campaigns discussed above, the Company does not propose to take additional steps with respect to calls for voluntary customer conservation at this time.[8]

IV. Future Potential Modifications

The following sections provide an overview of potential future modifications, both short and longer term, which the Company has evaluated to help protect customers from gas price spike events like the February Market Event.

A. Short-Term Modifications

As referenced above, the Company has developed three possible modifications that could be implemented during the upcoming heating season, upon Commission approval, which is requested in this proceeding. The Company proposes these modifications in response to the Commission's decisions in this matter. But because some of them could jeopardize system reliability, we respectfully request a Commission directive to implement them. The modifications that could be implemented during the upcoming 2022-2023 heating season upon Commission approval are:

- **Price-Based Withdrawals from Waterville Storage:** The Company will plan to withdraw up to 5,000 Dth/day of incremental withdrawals above the current planned operational maximum withdrawal from its Waterville storage (for a total daily planned withdrawal of up to 55,000 Dth/day), beginning the day after the price-based trigger occurs;

- **Price-Based Dispatch of LNG Peak Shaving:** After January 20,[9] the Company will plan to dispatch up to 25 percent (18,000 Dth/day) of the total daily LNG capacity, beginning the day after the price-based trigger occurs; and

- **Price-Based Curtailment of System Sales Interruptible Customers:** The Company will curtail interruptible system sales customers beginning the day after price-based trigger occurs.

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[8] For further discussion, see the Gas Utilities Joint Communication Plan Compliance Filing submitted in this matter on November 1, 2021.

[9] CenterPoint Energy is proposing to apply this price-based trigger after January 20 to ensure that peak shaving supplies are available to meet customer requirements through December and the early part of January, when design day weather is statistically more likely to occur with greater frequency.

The Company proposes to use the same price trigger to implement the three price-based modifications, as set forth in the table below:

Table 1. Proposed Price-Based Trigger

The prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarcation, or Viking-Emerson:	
(1) is greater than or equal to $50.00 per Dth; and	(2) is greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

There are risks in implementing these practices for the upcoming season. Each of these modifications poses the following risks:

- **Elimination of a tool to maintain reliability:** CenterPoint Energy's storage, peaking, and interruptible service all act in our supply portfolio as levers to ensure reliable service, and these tools operate as safety nets to address unforeseen circumstances. Committing to dispatch these resources on a planned basis to reduce the use of spot gas purchases severely limits the Company's flexibility to address short-term needs for increased supply or pressure support. By planning to dispatch these resources in advance of a gas day, the Company will not have these tools available to respond to distribution issues, interstate pipeline constraints, or supply cuts that arise over the course of the gas day. If these resources are committed in advance of the gas day, and colder than forecasted weather, higher than forecasted usage, undelivered supply, or intraday changes in customer usage occur, it may be necessary to procure emergency intraday supplies at extraordinary cost. If supplies are not available, the Company risks incurring significant pipeline imbalance penalties or losing service to firm customers.

- **Timing of when price spike is known and duration of pricing event:** To plan for dispatch of these resources in response to a price spike, the Company must have knowledge that natural gas spot prices have spiked. Daily purchases of index-priced natural gas supplies occur prior to 9 a.m. on the day-ahead, before the index price is known. The index price is not published until later in the evening on the day-ahead, by which point gas purchases have been completed and the Company is unable to adjust its purchased volumes. As a result, CenterPoint Energy must rely on the prior day's index price as the trigger for when additional actions will be taken. Natural gas spot market prices might not remain elevated past the first day or days (in the case of weekends and holidays) after a spike in index prices, in which case planning to deploy resources for economic reasons once the spike is known (on the second day of the

event) would not serve to mitigate price impacts. If this risk materializes, the Company will have dispatched these resources without any material benefit to the system or our customers.

CenterPoint Energy provides additional discussion of these short-term modifications below.

1. Price-Based Withdrawals from Storage

Upon Commission order, the Company would plan for 55,000 Dth/day of Waterville withdrawals based on storage inventory levels and an assessment of withdrawal constraints if the two-prong price trigger occurs. As described in more detail in Attachment B to this filing and as shown below, 50,000 Dth/day is the maximum withdrawal rate from the Waterville storage field when the field is near full. 50,000 Dth/day is also the firm transportation capacity the Company has contracted on NNG to transport the gas to CenterPoint Energy's distribution system to serve customers once it has been withdrawn from storage.

Table 2. Waterville Storage Operational and Contractual Limitations on Withdrawals

Daily Operational Withdrawal Limit	50,000 Dth/Day
Daily NNG Contractual Pipeline Capacity Limit	50,000 Dth/Day
Daily Withdrawals (Planned)	50,000 Dth/Day
Incremental Withdrawals (Real-Time if Conditions Allow)	5,000 Dth/Day
Daily Withdrawals (Planned if Commission Directs Price-Based Storage Withdrawals, Regardless of Conditions)	55,000 Dth/Day

Withdrawing in excess of 50,000 Dth/day is not something the Company has ever relied on in its portfolio and dispatch planning. In the past, the Company has only decided in real time to withdraw additional incremental volumes above 50,000 Dth if conditions allow. But the Company will plan to do so, not knowing whether the conditions will allow for it, upon Commission order. In addition to the risks described above, the Company has identified the following risks specific to planning for an additional 5,000 Dth/day withdrawals from Waterville based on the pricing trigger:

- **Storage field constraints:** The Waterville storage facility is a natural aquifer storage field that is located hundreds of feet underground and the gas is held in place by the pressure of the water within the aquifer. Because Waterville is a natural aquifer storage facility, the Company cannot predict in advance or control the pressures in this storage field that impact the withdrawal rate. The geological reality of this type of storage facility

means pressures are impacted by real-time conditions at the facility beyond simply the amount of gas in storage. For instance, excess water production in the wells impacts the withdrawal rate and needs to be monitored in real-time. These real-time conditions may prevent the Company from being able to actual achieve withdrawals above 50,000 Dth.

- **NNG pipeline limitations and risk of allocation:** CenterPoint Energy does not own or operate the NNG pipeline, and Waterville is not the only facility connected to that segment of the NNG system. CenterPoint Energy holds only 50,000 Dth/day of firm transportation capacity on NNG to deliver the stored gas from Waterville to the Company's distribution system, and any additional volumes exceed the Company's firm contract rights. If CenterPoint Energy attempts to nominate volumes in excess of its 50,000 Dth firm entitlement and pipeline conditions cannot accommodate the additional deliveries, NNG may allocate (i.e., cut) the additional volumes, meaning those volumes in excess of 50,000 Dth will not be delivered to CenterPoint Energy's distribution system to serve customers.

2. Price-Based Dispatch of Peak Shaving

Upon Commission order, CenterPoint Energy will begin planning for economic dispatch of a portion of daily LNG capacity. More specifically, if directed by the Commission, the Company proposes to plan for the dispatch of up to 25 percent (18,000 Dth/day) of the total daily LNG capacity beginning after January 20 each year,[10] if the two-prong price trigger occurs.

The Company has identified the following risks specific to the deployment of LNG in response to prices:

- **Daily withdrawal limits**: CenterPoint Energy's LNG plant is rated at a vaporization output of 72,000 Dth/day, which is the maximum amount of LNG that can be dispatched over the course of a 24-hour gas day. To contextualize the daily capacity of the LNG plant, an average daily temperature drop of five degrees from forecast would result in an increase to customer load requirements of more than the maximum daily capacity of the LNG plant. Committing to dispatch this peaking resource on a planned basis to reduce the use of spot gas purchases reduces the volumes that are available during the gas day to address short-term needs, meaning those supplies are no longer available to respond to distribution issues, interstate pipeline constraints, or supply cuts that arise during the gas day, and could result in the loss of service to our system.

[10] As noted above, CenterPoint Energy is proposing to apply this price-based trigger after January 20 to ensure that peak shaving supplies are available to meet customer requirements through December and the early part of January, when design day weather is statistically more likely to occur with greater frequency.

- **Overall storage inventory limits:** In addition to daily withdrawal limits, CenterPoint Energy's LNG peak shaving plant has overall seasonal storage limits for how much LNG can be stored and used through the heating season. Currently, it is not operationally feasible to refill LNG storage during the winter. In Minnesota, cold weather frequently occurs in the latter part of February, through March, and even into April. The Company has experienced circumstances where it needed to call on its peak shaving facilities late in the heating season. For example, in the winter of 2014, when the TransCanada pipeline ruptured on a cold weekend in January, peak shaving supplies were called on to manage the loss of gas supply into the state. Later that same winter, temperatures below zero in March necessitated the use of peak shaving supplies to meet customer needs. Although such events have historically not been frequent occurrences, CenterPoint Energy must be prepared to serve firm customers under such conditions and economic dispatch of these peaking resources could drain LNG inventory, making LNG unavailable to maintain reliability later in the heating season.

3. Price-Based Curtailments

Upon Commission order, the Company will implement an interim tariff modification that provides for curtailment of system sales customers receiving service under the Company's Large Volume Interruptible ("LVI")[11], Small Volume Interruptible-B[12] ("SVI-B"), and Interruptible Agricultural Grain Dryer Sales Service[13] tariffs beginning at the start of the first gas day on which daily spot market trading occurs when the two-prong price trigger is met.[14] Customers in these classes include crop dryers, schools, hospitals, commercial buildings, and manufacturing customers.

Due to the nature of the gas day and the fact that daily index prices are not published until after purchases have been made and trading has closed, the Company proposes to initiate economic curtailments beginning the second gas day of a pricing event. In the case of a weekend with a Monday holiday, this would mean calling curtailments beginning at 9 a.m. on Wednesday.

Implementation of this proposal would be expected to provide up to 45,000 Dth/day of potential reductions to daily gas purchases under near-design day conditions (less under warmer weather and depending on specific forecasted load and the amount of available baseload and

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[11] Including customers receiving service under the Company's Large Volume Dual Fuel Sales Service and Large Volume Firm/Interruptible Sales Service.

[12] Customers whose annual usage is greater than 120,000 therms receiving service under CenterPoint Energy's Small Volume Dual Fuel Sales Service or Small Volume Firm/Interruptible Sales Service.

[13] The Agricultural Grain Dryer Sales Service tariff is being implemented as a new tariff offering in Docket No. G008/GR-21-435.

[14] For instance, if the trigger is met based on the settle price of gas purchases over a weekend for gas purchased Friday and delivered Saturday-Monday, CenterPoint Energy would call curtailments beginning Tuesday at 9 a.m. In the case of a weekend with a Monday holiday, this would mean calling curtailments beginning at 9 a.m. on Wednesday

storage supplies) assuming perfect customer compliance. Table 3 summarizes the number of system sales customers and forecasted usage under peak day conditions.

Table 3. LVI and SVI-B System Sales Customer Counts and Estimated Peak Day Volumes[15]

Class	Approximate Number of Customers (System Sales)	Approximate Volumes of Curtailable Load Under Cold Weather Conditions (System Sales)
LVI	100 customers	30,000 Dth/Day
SVI-B	150 customers	15,000 Dth/Day

Because the Company does not have experience with calling price-based curtailments, it is difficult to accurately predict the expected level of customer compliance. While interruptible customers are subject to significant penalties for noncompliance with called curtailments, noncompliance could nevertheless risk the reliability of service to firm service customers and could require the Company to procure emergency spot supplies or dispatch peak shaving resources to ensure continued reliable service.

To implement this interim modification, CenterPoint Energy proposes tariff revisions as reflected in Attachment E to add the following provisions:

> Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is
>
> 1) greater than or equal to $50.00 per Dth; and
>
> 2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.
>
> If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also

[15] The number of customers in these classes and their associated peak day natural gas usage can fluctuate over time as customers move classes, switch to transportation service, or leave CenterPoint Energy's system. The approximate volumes for each class can also fluctuate with these changes and as loads vary with weather and other factors.

be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

CenterPoint Energy plans to inform interruptible customers that it has proposed these tariff modifications in this proceeding and that they will be effective upon Commission approval. The Company will communicate with customers again upon Commission approval.

The Company has identified the following risks associated with implementing price-based curtailments for the upcoming heating season:

- **Dependency on curtailable volumes:** To gain the benefits that economic curtailments could provide, it is necessary to reduce gas purchased in the spot market on day two of a pricing event. The estimation of the reduction in supply requirements is difficult, as it requires the Company to speculate how much gas curtailed customers would have used. If the Company estimates these volumes too low, we will not gain the full value of the economic curtailment. If the Company estimates these volumes too high, resulting in insufficient gas supply, the Company risks the ability to maintain reliable service and also risks incurring pipeline imbalance penalties.

- **Dependency on compliance with price curtailment:** CenterPoint generally has a high compliance rate under its normal pattern of curtailments, but a price curtailment has never been implemented and it is possible that all customers in the classes subject to economic curtailments will not be able to curtail for an entire gas day, perhaps multiple times in a heating season. This change to the curtailment practice requires customers to adapt their behavior and systems. Depending on the frequency and duration of price spikes, it is possible that customers will not have the quantity of backup fuel necessary to maintain such curtailments. It is also possible that some customers could be limited from using backup fuels like heating oil or propane for extended periods based on restrictions in their air quality permits. If for any reason customers continue to use gas during the pricing event, even though the Company has not purchased adequate supplies, CenterPoint Energy risks the ability to maintain reliable service and also risks incurring pipeline imbalance penalties.

- **Ensuring customers are not charged for price event:** CenterPoint Energy is aware that some of its customers have stated that they would have been willing to interrupt their sales service during the February Market Event to facilitate reduced purchases of

very expensive gas supplies. However, such action would have resulted in no measurable reduction in those customers' bills since the extraordinary gas costs incurred during the February Market Event are being recovered from all customers (other than low-income customers) based on future volumes consumed. As described above, under the Company's proposed tariff modifications, customers who are called to, and do, curtail for economic reasons will not be subject to surcharges imposed to recover cost of daily spot gas or swing gas purchased during the period the economic curtailment is in effect. While the cost impact of the price spike may be mitigated as a result of implementing economic curtailment of interruptible system sales customers, the costs that are incurred will be recovered from fewer customers.

In summary, the Company asks for a Commission order whether to move forward with these price-based modifications during this upcoming season.

B. Longer-Term Modifications

In addition to the price-based modifications set forth above, the Company has evaluated the following longer-term modifications that could be implemented for further pricing protection. CenterPoint Energy provides additional details regarding these longer-term alternatives in Attachment B. The Company proposes to continue to evaluate these modifications, which would not be implemented until 2023-2024 or later.

1. Storage

CenterPoint Energy has contracted pipeline storage, contracted virtual (marketer) storage, and Company-owned and operated underground aquifer storage known as the Waterville underground storage facility.

a. Additional NNG Entitlement For Delivery from Waterville

Beyond the upcoming heating season, CenterPoint Energy is evaluating increasing its firm pipeline entitlements on NNG from 50,000 Dth/day to 55,000 Dth/day to allow for additional pipeline deliverability of Waterville withdrawals.[16] We anticipate such additional capacity could likely be available beginning in 2025 if the Company participates in NNG's 2023 open season. Increasing contracted pipeline capacity would address one of the limitations on the Company's ability to exceed 50,000 Dth/day withdrawal from Waterville on a planned basis. However, even with this change, the Company will continue to face limitations with respect to the operational capacity of the storage field, pressures in the storage field, and the risk of excess water

[16] CenterPoint Energy projects this modification may allow for withdrawals of up to 55,000 Dth approximately ten to fourteen days through the heating season, depending on storage levels and dispatch throughout the heating season.

production that could also limit the Company's ability to exceed the 50,000 Dth/day withdrawal amount.

b. Capacity Expansion at Waterville

A longer-term option to potentially increase storage capability and provide further price protection for customers may be to expand the working gas capacity[17] and withdrawal capability at Waterville. CenterPoint Energy is studying the feasibility and cost of expanding Waterville's working storage capacity and daily withdrawal capability.[18] Based on initial assessment, there may be capability to expand the Waterville storage facility from the current working gas storage capacity of 2,000,000 Dth to up to approximately 2,600,000 Dth and increase the peak withdrawal rate when the storage field is near full from 50,000 Dth/day to up to approximately 65,000 Dth/day. Such upgrades would require extensive planning and engineering and a number of modifications to the Company's Department of Natural Resources ("DNR") storage permit, county permits, and Minnesota Pollution Control Agency ("MPCA") permits. These potential upgrades would also require investment in additional wells, field piping, compressor station and equipment upgrades, and the addition of more base gas in the field. Assuming this project was determined to be feasible and cost effective, and necessary permits and approvals could be obtained, we anticipate such expansion could be in-service in approximately 2027, with initial scoping taking approximately one year to complete, and project planning, permitting, and construction estimated to take an additional four years.

c. Additional Pipeline and Virtual Storage

Because storage provides flexibility to maintain reliability and also a hedge against daily spot market prices, the Company routinely evaluates options to secure more storage as part of its annual Gas Procurement Plan. Currently, however, there are limited options for adding more storage from existing storage facilities. NNG's storage is fully subscribed, with no incremental storage available for purchase at this time.

In the short term, the Company will continue to evaluate options to secure more virtual or marketer storage and has engaged in initial conversations with marketers to add virtual storage volumes beginning in 2023-2024. Depending on available pricing and other contract terms, adding more virtual storage may be an attractive short-term option to provide additional protection against market volatility.

Looking longer term, the Company is continuing to evaluate options to contract for additional pipeline storage along with pipeline capacity that would be required to allow for the delivery of

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[17] Working gas refers to the total gas storage capacity minus base gas, where base gas is the volume of natural gas required to be retained in permanent inventory to maintain adequate pressure and deliverability rates throughout the withdrawal season.

[18] If this modification were pursued, CenterPoint Energy would also plan to increase its contracted firm capacity on NNG to allow for delivery of additional withdrawn volumes, assuming such increase in NNG capacity is not undertaken separately in the interim.

such stored gas to CenterPoint Energy's system. Adding additional contract pipeline storage requires an evaluation of the availability of storage, identification of the pathway for interstate pipeline delivery of the storage gas to CenterPoint Energy's distribution system, and an assessment of whether capacity upgrades will be required to accommodate the incremental capacity requirements. The Company will continue to evaluate options to increase pipeline contract storage, recognizing that any such increase will likely require a longer-term expansion of storage and pipeline facilities at significant cost.

2. Peak Shaving

CenterPoint Energy's LNG plant and propane air peak shaving plants are an integral part of the Company's distribution system design and plan to meet customer needs as we approach design day conditions. The Company's peak shaving plants have been designed and located on the system to ensure reliability and provide flexibility that allows the Company to address daily or hourly load variations for local areas of the distribution system and to meet customer needs above contracted pipeline transportation capacity. Because CenterPoint Energy plans for reliance on its peak shaving resources in the event of design day weather conditions and does not have contracted pipeline capacity sufficient to meet customer needs under such conditions, it is critical that the peak shaving facilities be available in the event of design day weather.

CenterPoint Energy has evaluated options to modify its peak shaving facilities and use of those facilities to respond to extraordinary price spikes. We are studying the feasibility of upgrading the LNG system to increase output to help meet expected additional customer peak demand beginning in 2025. Currently, the LNG facility is rated at a vaporization output of 72,000 Dth/day and preliminary engineering analysis shows that could be increased to 90,000 Dth/day with the replacement of the LNG vaporizers and supporting equipment. CenterPoint Energy is also evaluating whether to modify the LNG liquefaction system to allow for refilling of LNG storage during the winter. Evaluation of these potential upgrades is ongoing, as discussed in more detail in Attachment B. Depending on the magnitude and timing of demand growth, these upgrades may provide an enhanced ability to utilize LNG peak shaving supplies to respond to daily gas prices.

3. Interruptible Curtailments

CenterPoint Energy's interruptible service offerings provide system relief during peak conditions and in response to pipeline and distribution system constraints to allow the Company to provide continuous, reliable service to firm customers. Interruptible customers are subject to curtailment when: (1) the Company experiences distribution system constraints or operational issues or (2) for system sales (non-transportation) customers, when forecasted customer demand exceeds our contracted pipeline capacity or there is an interstate pipeline constraint. When the Company identifies distribution system constraints, it curtails its interruptible customers until enough load has been removed to maintain sufficient system pressure. Similarly, if forecasted load is expected to exceed contracted pipeline entitlements, the Company will curtail system sales interruptible customers to ensure adequate capacity to meet firm customer needs.

Curtailments can also provide limited intra-day load flexibility, which other resources in the Company's Gas Procurement Plan cannot provide.

As described above, the Company has proposed interim tariff modifications that would allow price-based curtailment if the two-prong trigger occurs. Longer term, CenterPoint Energy proposes to evaluate potential modifications to its interruptible tariffs or the creation of a new interruptible service offering that could be implemented on a permanent basis to allow curtailments for economic purposes. Creating understandable and manageable criteria for price-based curtailments and corresponding criteria for returning interrupted customers to service are complex undertakings that could fundamentally change the nature and value of interruptible sales service, as discussed in greater detail in Attachment B.

4. Gas Supply Contracting

The Company has explored a number of modifications to the terms of its gas supply contracts to reduce exposure to daily gas price spike events and provide greater flexibility and price protection for customers. However, when the Company attempted to negotiate more favorable terms to its gas supply contracts that shifted greater risk to its gas suppliers, gas suppliers countered with proposed modifications to shift risk back to the Company, higher pricing, or refusal to contract. In the end, the gas supply contracts in place for the upcoming winter season do not include any major contractual term modifications.

CenterPoint Energy has also investigated whether it could incorporate non-ratable daily call options or call options priced at FOM index prices rather than gas daily index pricing into its gas procurement plan to mitigate the risk of future daily price spikes. A non-ratable daily call option would provide the Company with additional flexibility to sculpt its daily call option purchases over weekend and holiday periods to better align daily swing supplies with fluctuations in forecasted customer load throughout the weekend to reduce the overall amount of gas that needs to be purchased. Pricing call options at the FOM index would provide greater price protection for swing supplies, mitigating exposure to volatility in daily market prices. CenterPoint Energy recently issued a Request for Proposal ("RFP") seeking bids from gas suppliers for non-ratable daily call options and alternative pricing for call options such as FOM-index, summer pricing, or other proposals. In response to this RFP, CenterPoint Energy only received one bid for call options priced at FOM index and one bid for non-ratable call options priced at gas daily. Both of these bids were for limited volumes and at significant premiums. After reviewing the bids and other options, the Company determined that the price mitigation offered would not justify the significant premiums. CenterPoint Energy will continue to request proposals from its suppliers for alternative call options and other products that could provide greater flexibility or price volatility mitigation at reasonable overall costs.

Over the long term, CenterPoint Energy is committed evaluating opportunities for improvement, including advocating for possible market reforms to provide protection against similar market price spike events in the future. CenterPoint Energy and the Minnesota utilities acting alone do not have the power to prevent extraordinary price spikes in the natural gas market or to

effectuate significant market reform, as such markets operate at national and international levels. The development of longer-term industry or market changes will require coordination across the industry and regulatory bodies.

In November 2021, the Federal Energy Regulatory Commission ("FERC") and North American Electric Reliability Council ("NERC") issued a report examining the impact the February Market Event, which included 28 formal recommendations to prevent a recurrence. One of the recommendations (Key Recommendation 7) was for FERC to establish a forum to identify concrete actions to improve the reliability of the natural gas infrastructure system.[19]

In July 2022, FERC and NERC submitted a letter to the North American Energy Standards Board ("NAESB"), requesting that NAESB expeditiously take steps to convene a forum to identify actions to improve the reliability of the natural gas infrastructure system and to address challenges stemming from natural gas-electric infrastructure interdependency.[20]

The NAESB Gas-Electric Harmonization Forum ("NAESB Forum") held a kick-off meeting on August 30, 2022. At the kick-off, FERC and NERC staff members presented the findings of the November Report that led to Key Recommendation 7,[21] and NAESB leadership discussed the steps the NAESB Forum will take to address the identified challenges. As discussed during the kick-off meeting, the NAESB Forum intends to address thirteen topics identified in the November Report that fall into three categories:

1) Measures to improve gas-electric information sharing for improved system performance during extreme cold weather emergencies;

2) Measures to improve reliability of natural gas facilities during cold weather; and

3) Measures to improve the ability of generators to obtain fuel during extreme cold weather events when natural gas heating load and natural gas-fired generators are both in high demand for natural gas, at the same time that natural gas production may have decreased.[22]

The NAESB Forum will review identified challenges with the goal of developing:

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[19] The November 16, 2021 Report can be found at: https://www.naesb.org/pdf4/ferc_nerc_regional_entity_staff_report_Feb2021_cold_weather_outages_111621.pdf

[20] The July 29, 2022 letter can be found at: https://www.naesb.org/pdf4/ferc_nerc_letter_072922_to_NAESB.pdf.

[21] November 16, 2021 Report at page 195.

[22] The NAESB Natural Gas-Electricity Forum August 30, 2022, presentation is available at https://www.naesb.org/pdf4/geh083022a1.pdf.

1) Concrete actions to increase reliability of natural gas infrastructure system necessary to support the Bulk Electric System;

2) Plans for implementing actions;

3) Deadlines for implementing actions; and

4) Identification of the entities responsible for implementing actions.[23]

The Company is participating in the NAESB Forum and looks forward to the important discussion and resulting actions that can be taken nationwide to increase the reliability of natural gas infrastructure and the coordination between the natural gas and electric markets.

5. Gas Supply Diversity and Purchasing

CenterPoint Energy contracts for gas supply sources across the country to procure natural gas from a diverse group of suppliers at multiple pricing hubs. Because CenterPoint Energy purchases gas supplies from different regions of the U.S. and Canada, the Company depends on pipeline transportation to deliver the gas from these suppliers to the Company's distribution system.

During the February Market Event, daily market prices at the NNG-Ventura and NNG-Demarc pricing hubs spiked higher than other pricing points such as Emerson, Manitoba (near U.S./Canadian border). While historically there has not been any significant, prolonged price differential between the pricing at Ventura, Demarc, and Emerson, the February Market Event stands out as an exception to this historical trend. Given this recent experience, CenterPoint Energy is examining whether there are ways to further diversify the pricing hubs of the Company's gas supply to potentially reduce risk of future gas price spikes that are concentrated at a particular pricing hub. Over the long term, the Company is examining whether it could use daily gas price data to forecast price spike risk when circumstances may give rise to another market price spike event.

In the shorter term, as building out additional pipeline capacity to obtain gas supplies from different pricing hubs takes time, CenterPoint Energy is currently working with gas marketers to contract for delivery of gas supplies to NNG that would be priced at another pricing hub other than Ventura. This type of delivered supply contract would introduce additional diversity to the Company's portfolio. This type of contract modification could provide a quicker way to gain pricing hub diversification while CenterPoint Energy evaluates the feasibility of obtaining pipeline capacity that would be needed to access gas supplies from the other pricing hubs. In the long-term, CenterPoint Energy is also exploring adding additional transportation capacity on Viking to be able to make additional daily gas purchases from the Emerson pricing hub.

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[23] *See* NAESB Natural Gas-Electricity Forum August 30, 2022, presentation at 9.

CenterPoint Energy's interstate natural gas transportation is provided primarily by NNG, with upstream transportation provided by Natural Gas Pipeline Company ("NGPL") and Viking. While the Company continues to explore options to increase the diversity of supply, limitations in the pipelines delivering natural gas to CenterPoint Energy's distribution system in Minnesota limits the feasibility and cost-effectiveness of incorporating additional diversity.

6. Hedging

CenterPoint Energy uses certain hedging tools to provide price protection and stability for a portion of its winter gas supply. CenterPoint Energy uses three types of physical hedge products: costless collars, call options with a ceiling price, and fixed price hedges. Between physical hedges and planned storage supplies,[24] CenterPoint Energy targets for a price stabilized gas supply of approximately 50 percent of the Company's normal winter system demand.

The Commission has regulated CenterPoint Energy's hedging programs since 2004, when the Commission found that the Company's use of physical hedging tools served as a price stabilizer and permitted their use in the public interest, with certain limitations. In its January 13, 2020 Order in Docket No. G008/M-19-699, the Commission allowed the Company's continued use of hedging with the following limitations:

- annual limit on hedging volumes of 26 billion cubic feet ("Bcf");
- overall limit on hedging volumes of 65 Bcf;
- allowed multi-year hedging contracts of up to 60 months in duration, with annual limits on volumes for years beyond 2024-2025 of 13 Bcf;
- required an annual limit on net option premiums of $6.5 million, excluding premiums or reservation fees paid for daily call gas; and
- continued to allow CenterPoint Energy to engage in put options in combination with call options to form a collar but disallowed the Company's use of put options for any other reason, without specific Commission approval.[25]

The Company is required to make annual compliance filings with the Commission detailing the costs and benefits of hedging each year. The Commission has approved variances that allow the Company to enter into hedging contracts, with the limitations described above, through June 30, 2024.

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[24] CenterPoint Energy considers storage gas as a fixed price product because the final average summer injection cost is fixed through the winter period.

[25] 2020 Hedging Order.

CenterPoint Energy determines its hedges each year based on an analysis that incorporates Commission limitations (as to volumes and costs), winter price projections, load projections, and available portfolio assets. Historically, CenterPoint Energy has diversified its hedge portfolio purchases by spreading purchases across summer months and splitting hedged gas purchases between costless collars, ceiling price, and fixed price. Consistent with past practices, CenterPoint Energy executes its hedges according to expert advice and analysis from Aegis Hedging.

As discussed above, the Company has made a number of changes to its hedging portfolio since the February Market Event including increasing baseload hedges; more heavily weighting the portfolio on fixed-price hedges; increasing the diversity of hedges to include multiple receipt points; and entering longer-term hedges to secure longer-term price protections and lower premiums. CenterPoint Energy also plans to seek a variance of the Commission's 2020 Hedging Order to increase the 26 Bcf hedging limit. Because the Company has already executed its physical hedges for the upcoming 2022-2023 winter season, the Company plans to request this variance later this year or in early 2023, seeking Commission approval by mid-2023 to allow for implementation of changes in the 2023-2024 winter season.

7. Demand Response Programs

Demand response programs are programs designed to incentivize or require customers to reduce or shift energy usage during peak periods. Demand response programs are well-established in the electricity sector but have not been widely adopted for natural gas utilities, due to significant differences between the operation of natural gas and electric utilities and markets. The need to implement advanced metering infrastructure that would allow for real time usage data and the fact that gas usage would need to be reduced over the course of the entire gas day to meaningfully impact gas supply needs and associated costs limit the feasibility of implementing demand response programs for natural gas service. Implementation of a natural gas demand response offering would require further analysis, stakeholder input, and Commission review and approval. To that end, it would be necessary for CenterPoint Energy to evaluate: (1) how to replace or upgrade its existing metering infrastructure and meter reading protocols to provide more detailed real-time customer energy usage information (i.e., monthly usage data is not sufficient for a demand response program); (2) what level of participation the Company could expect in a demand response program; and (3) how much energy usage reduction the Company could count on. To implement such offerings, it would be necessary to determine the pricing of the offering and the price, frequency, and duration, of when the Company could call upon demand response customers to suspend their natural gas usage.

CenterPoint Energy proposes to further explore the feasibility and benefits of natural gas demand response programs or other programs that would allow natural gas customers to respond to real-time pricing. Providing real time price signals would involve significant investment in smart metering infrastructure with two-way communication and significant changes to rate design, which the Company anticipates could require significant time to implement. Additionally, CenterPoint Energy proposes to evaluate opportunities for load

research, such as through a demand response pilot, to collect additional information on the potential impacts of load control.

C. Investing in Local Supply, Energy Efficiency, and Carbon-Free Resources

CenterPoint Energy is also exploring new technologies that can be implemented to lower overall customer demand and meet customer demand with local, in-state gas supply sources that are not subject to the natural gas price indices that spiked during the February Market Event. Increasing investment in energy efficiency and local supply resources such as renewable natural gas and hydrogen produced with carbon-free resources can help to insulate customers from price spikes in the gas market and also reduce greenhouse gas ("GHG") emissions.

CenterPoint Energy plans to submit its first Innovation Plan under the NGIA in the first half of 2023. We are currently exploring pilots for energy efficiency and low and no carbon resources that will displace the need for geologic natural gas, avoiding GHG emissions and volatility in the gas market. As part of the development of our Innovation Plan, the Company is evaluating whether pilots could be implemented to mitigate daily spot gas purchases. For example, for an RNG project, it might be possible to store produced RNG for use to supplement supplies during a pricing event.

Additionally, the Company is working with its partners to implement programming under the Minnesota Efficient Technology Accelerator ("META") statute. Investments in energy efficiency reduce customer usage, reducing the amount of gas supply needed to serve customers. META will help to advance innovation and accelerate the deployment of emerging efficient technology in Minnesota, reducing GHG emissions. The Company is committed to innovative and comprehensive solutions that reduce GHG emissions as we work to mitigate against market volatility.

V. Natural Gas Integrated Resource Planning

Generally speaking, an Integrated Resource Plan ("IRP") is used to identify a utility's long-term energy resource strategy. Integrated Resource Planning is a planning strategy and process that evaluates and compares resources and infrastructure that can be used to meet natural gas system needs over a defined period into the future. An IRP analyzes and identifies the alternative (or combination of alternatives) that is in the best interest of the utility and its customers, taking into account reliability and safety, cost-effectiveness, public policy, available resources, and risk management.

In many ways, the Company's annual Gas Procurement Plan operates similarly to an IRP in that it shows the Company's estimated load forecast, and the capacity and supply resources that will be used to meet that need for the upcoming heating season. In addition to reviewing the Company's Gas Procurement Plan, the Commission also regulates the Company's:

- procurement of transportation capacity and storage in demand entitlement proceedings;

- procurement of commodity in monthly purchase gas adjustment and annual automatic adjustment proceedings;
- capital investments for integrity, public improvement, and new growth in rate recovery proceedings, new area surcharge and natural gas extension project and certificate of need proceedings; and
- service quality in annual quality of service reports.

Currently, very few jurisdictions use integrated resource planning for natural gas utilities.[26] Rather, most jurisdictions use the types of proceedings used in Minnesota to regulate natural gas utility operations and investments.

Significant differences between the gas and electric utility industries limit the applicability of the well-developed electric utility IRP process to natural gas utility planning. These differences include lack of vertical integration, shorter planning horizons, and a focus on supply procurement and distribution system expansion rather than generation capacity expansion. In organized markets such as the Midcontinent Independent System Operator, Inc. that manages the electric power market in Minnesota, power trading and the management of transmission capacity happen within the same organization. In contrast, capacity in the natural gas market is managed by the pipelines themselves according to standardized rules imposed by FERC, while the trading of the commodity happens on separate exchanges or bilaterally based on published indices or negotiated prices. As a result, there is not the same comprehensive overview and control of the market for both the commodity and the movement or storage of that commodity that exists in organized electric markets. A major part of the regulatory reason for this is that FERC determined in Order No. 636 that, as long as pipelines could not exercise market power, the market for the gas commodity was competitive enough to allow for competitive pricing and market-based prices.

Adoption of an IRP for natural gas utilities in Minnesota might be one way for the Commission to undertake a comprehensive view of the utilities' overall planning, but the timelines necessary to enable such a comprehensive review would need to be established to broaden the planning horizons. Further, significant resources would be needed for the development, review, and implementation of a natural gas IRP process.

While a natural gas IRP process may provide insight for additional review of natural gas infrastructure, capacity, and supply planning, CenterPoint Energy does not believe that integrated resource planning would help to mitigate against extraordinary pricing events,

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[26] Examples include natural gas integrated resource plans filed in Washington State and the Ontario Energy Board's ("OEB") recent decision establishing a first-generation IRP framework to provide direction and guiding principles as natural gas utilities begin to implement an IRP process. *See* https://www.utc.wa.gov/regulated-industries/utilities/energy/infrastructure-and-energy-planning/integrated-resource-plans-irps; https://www.oeb.ca/consultations-and-projects/policy-initiatives-and-consultations/natural-gas-integrated-resource.

especially in the near term. A primary purpose of an IRP is to evaluate customer needs and alternatives over a longer planning horizon under a range of circumstances. Integrated resource planning in and of itself would not offer any new solutions that would lower gas daily prices or allow the utilities to reduce their daily spot market purchases. For this reason, the Company believes the Commission could consider integrated resource planning as part of its evaluation in Docket G-999/CI-21-565.

Innovation plans filed under the NGIA will require natural gas utilities to file longer-term, five-year projections of planned demand and investments. The Commission therefore will have an opportunity to evaluate such utility planning as part of its evaluation of CenterPoint Energy's innovation plan expected to be filed in 2023.

In the meantime, the Commission could consider a process to review and approve the Company's annual Gas Procurement Plan filing, which includes detailed information related to demand forecasting; the availability and use of storage contracts, including dispatching modeling and considerations; interruptible customer class curtailments; peak shaving facilities; incorporation of conservation impacts; the relationship between storage, curtailments, and peak shaving decisions; a discussion of geographic diversification of CenterPoint Energy's natural gas purchases; details regarding hedging including hedging analysis, alternative scenarios, and approach; as well as other topics. Such a change would require the Commission to establish new filing timelines and review processes that would allow parties to understand and approve the Company's procurement and implementation strategy before heating seasons begin.

VI. Statutory and Rule Changes

The Commission's Notice also required that the utilities identify any statutory or rule changes that could be implemented to protect customers from future price spikes. As detailed in the Gas Utilities' Joint Filing, CenterPoint Energy and the other gas utilities plan to continue to advocate at the Minnesota Legislature for adoption of a sales tax exemption for the February Market Event surcharge for residential heating customers in the next legislative session. Additionally, as described in the Gas Utilities' Joint Filing, the Gas Utilities have carefully reviewed applicable rules and statutes, including the Commission's PGA rules, and continue to believe they are reasonable.

During the 2021 and 2022 legislative sessions, CenterPoint Energy also advocated for a customer relief bill that would provide additional funding for customers. The Company will continue to evaluate and support potential state legislative paths that would help to alleviate the financial impact to customers as a result of the February Market Event, as well as legislation that could help to prevent similar market events.

VII. Performance Based Gas Purchasing Plans Under Minn. Stat. 216B.167

The Commission's August 23, 2022, Notice also requested the Gas Utilities provide an analysis of whether they considered filing a plan pursuant to Minn. Stat. §216B.167, and their analysis of why they are not using the statute if they have chosen not to proceed with such a plan.

The Gas Utilities' Joint Filing provides a discussion of the history and use of Minnesota's performance-based gas purchasing statute, Minn. Stat. § 216B.167. As described in that filing, CenterPoint Energy's predecessor, Minnegasco, had a Commission-approved performance-based gas purchasing plan under Minn. Stat. § 216B.167 in effect from 1996 through 1998. CenterPoint Energy has not pursued a performance-based gas purchasing plan since that time.

As discussed in the Gas Utilities' Joint Filing, commodity prices for gas supplies used in Minnesota are set in a nationwide, competitive marketplace and there are a number of factors that impact the market price of gas supplies, all of which are outside the control of the Gas Utilities. As a result of these circumstances, CenterPoint Energy has continued to utilize the PGA pass-through recovery provided for under the Commission's PGA rules. That mechanism provides greater flexibility for the Company to react to market conditions and opportunities to meet customer needs, while also ensuring CenterPoint Energy procures reasonably priced natural gas supplies in light of market conditions and customer needs.

VIII. Conclusion

CenterPoint Energy appreciates the opportunity to provide these initial comments on the steps that the Company has taken and proposes to take to provide greater customer protections from extraordinary natural gas daily price spikes in the future. CenterPoint Energy looks forward to continued dialogue with the Commission and other stakeholders on the modifications the Company has proposed.

Improvement/Modification	General Timeline to Implement	Tariff Modifications Required?	Benefits/Risks
Gas Contracting and Purchasing			
Increased monthly baseload volumes priced at first-of-month index pricing	Complete.	No.	Provides additional price stability and price protection for customers.
Increased supply diversity	Complete.	No.	More optionality to purchase from different price indices.
Hedging			
Increase hedged volumes	Complete.	No, however, increasing hedged volumes beyond the currently authorized limits would require a modification to the Commission-approved variance.	Provides additional price stability and price protection for customers.
Optimize hedging products	Complete.	No.	Third-party, expert review of hedging portfolio provides robust review of all options, and for 2022-2023, resulted in more fixed price products.
Increase diversity of hedging products to include additional delivery points	Complete.	No.	Diversity of delivery points provides greater protection against price volatility by using multiple price indices.
Enter longer-term hedges	Complete (effective 2023).	No.	Longer-term hedges allows longer-term price protection.
Storage			
Increasing planned daily withdrawals from Waterville Company-owned storage	Upon Commission order (2022-2023).	No.	Risk that additional withdrawal of 5,000 Dth will not be available due to operational limitations

Improvement/Modification	General Timeline to Implement	Tariff Modifications Required?	Benefits/Risks
			of the storage field and contractual limitations for transport on NNG.
Increasing pipeline capacity on NNG to allow for incremental deliverability of Waterville withdrawals	2025, estimated.	No.	Increasing the NNG entitlement at Waterville would remove one limitation on additional storage withdrawals.
Expanding Waterville working gas storage capacity and withdrawal capability	2027, estimated.	No.	Increasing the capacity at Waterville would allow additional storage withdrawals. The project requires extensive engineering and permitting.
Increasing virtual marketer storage	Potentially 2023-2024, depending on availability and contract terms.	No.	Increasing virtual marketer storage could provide more price stability and protection to customers.
Increasing pipeline contracted storage and transportation	Possibly 2025 or later, depending on availability, upgrade requirements, and contract terms.	No.	Increasing storage supplies provides more price stability and protection to customers. Buildout of facilities is long-term and potentially not cost effective.
Peak Shaving			
Planning for limited LNG dispatch in response to daily prices	Upon Commission order (2022-2023).	No.	Risk is that peaking supplies will not be available to support reliability, and that supplies could be dispatched even though prices return to normal.
Upgrade LNG liquefaction to allow for winter refilling	2023-2024, estimated.	No.	May provide an enhanced ability to utilize LNG peak shaving supplies in response to market price spikes.

Improvement/Modification	General Timeline to Implement	Tariff Modifications Required?	Benefits/Risks
Upgrade LNG system to increase daily vaporization capacity	2025, estimated.	No.	May provide an enhanced ability to utilize LNG peak shaving supplies in response to market price spikes.
Balance of Season Inventory Modeling	2025, estimated.	No.	May provide an enhanced ability to utilize LNG peak shaving supplies in response to market price spikes in combination with other upgrades.
Interruptible Curtailments			
Interim interruptible tariff modifications for economic price-based curtailment of system sales interruptible customers.	Upon Commission order (2022-2023).	Yes. Proposed tariff changes included in this filing.	Risks include interruptible load will not be available to support reliability; interruptible supplies could be dispatched even though prices return to normal; firm service customers will not see a pricing benefit; the Company will overestimate the interrupted volumes and need to incur high costs to buy supply in the daily market or pipeline imbalance charges.
Evaluation and development of price-based interruptible service offering, trigger, and pricing	2023-2024, estimated, upon Commission approval.	Yes.	Longer-term evaluation could result in creation of new class of service to allow price-based curtailments at reasonable pricing, with reasonable conditions of service.
Customer Communications			
Communicate with customers regarding natural gas prices, CIP, energy savings measures, and available resources	Ongoing.	No.	Ensures customers have adequate knowledge to understand and budget for the bills and seek assistance.

Improvement/Modification	General Timeline to Implement	Tariff Modifications Required?	Benefits/Risks
Requesting customer conservation in response to price increases	None.	No.	Customers should only receive these requests during emergencies; customers who conserve will not see a corollary reduction in their bill; customers will use unsafe methods for heating in lieu of natural gas.
Other Relevant Practices			
Demand response and load research	Multiple years.	Yes.	Providing real time price signals would involve significant investment in smart metering infrastructure with two-way communication and significant changes to rate design.
Investing in local supply, energy efficiency, and carbon free resources	Ongoing and upon Commission order (NGIA Innovation Plan filing anticipated 2023).	Potentially.	NGIA pilots for energy efficiency and low and no carbon resources will displace the need for geologic natural gas, avoiding greenhouse gas emissions and market volatility.
Market reform	Longer-term; timeline will depend on industry/market initiatives.	No.	CenterPoint Energy acting alone does not have the power to prevent extraordinary price spikes in the natural gas market or to effectuate significant market reform, as such markets operate at national and international levels. The development of longer-term industry or market changes will require coordination across the industry and regulatory bodies.

This attachment provides details regarding the potential future modifications to storage, peak shaving, and interruptible curtailments the Company is evaluating to potentially further protect customers from daily gas price spike events in the future.

STORAGE

CenterPoint Energy has contracted pipeline storage, contracted virtual (marketer) storage, and Company-owned storage. CenterPoint Energy has (1) pipeline storage contracts with Natural Gas Pipeline ("NGPL") and Northern Natural Gas ("NNG"); (2) virtual marketer storage with BP Canada; and (3) Company-owned and operated underground aquifer storage located south of Minneapolis, known as the Waterville underground storage facility.

For the pipeline contract storage and Waterville storage, gas is purchased during the summer months and is then stored for withdrawal during the winter months. When gas is withdrawn from pipeline storage in the winter, the cost of that gas is the weighted average summer injection price, creating a natural fixed price hedge. CenterPoint Energy's virtual storage contract works similarly, with the virtual storage gas prices fixed by contract for gas to be withdrawn in the winter months. When gas is withdrawn from Company-owned storage in the winter, the cost of that gas is based on annual weighted average cost of gas from summer injections. Storage gas also acts as a balancing tool as CenterPoint Energy can withdraw from storage to balance its gas supply to varying levels of daily demand throughout the winter.

Storage supply has more flexibility than baseload supply because CenterPoint Energy's pipeline contract and Company-owned storage provide intraday flexibility that allows for changes in the amount of storage withdrawals within the day. However, contract storage withdrawals must comply with daily, monthly, and seasonal minimum and maximum withdrawal limits and storage inventory levels as specified in the applicable contracts and applicable Federal Energy Regulatory Commission ("FERC") tariffs. Further, there are operational considerations that affect withdrawals from the Waterville storage facility. These considerations include maximum daily withdrawal amounts, which are affected by the amount of gas in storage at a given time, as well as pressures in the storage field and on the pipeline used to transport the gas.

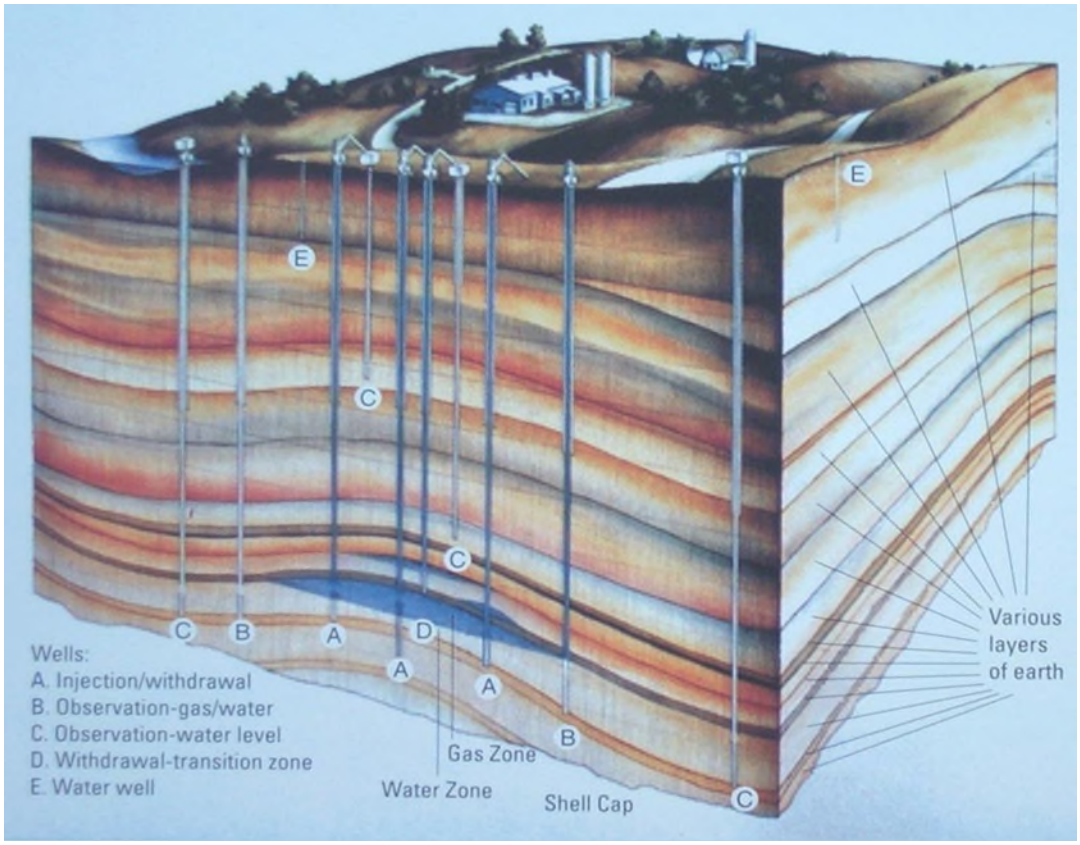
1. Waterville Company-Owned Storage

CenterPoint Energy has established and consistently planned for a maximum daily withdrawal rate for Waterville of up to 50,000 dekatherms ("Dth") when the Waterville storage field is near full, reflecting the operational withdrawal capability based on knowledge of and experience with operating this facility and contractual limitations on the amount of daily firm transportation capacity the Company has contracted on the NNG pipeline. CenterPoint Energy holds 50,000 Dth/day of firm transportation capacity on NNG for delivery of storage gas from Waterville to the Company's distribution system in the winter months. While the Company has been able to exceed the 50,000 Dth/day maximum by increasing storage withdrawal rates in real time over

the course of a gas day, CenterPoint Energy has not previously planned for withdrawals in excess of the 50,000 maximum as the following conditions cannot be planned on a day-ahead or multiple day-ahead basis – (1) conditions in the Waterville aquifer underground storage field including pressures in the storage field and water production at each of the withdrawal wells and (2) conditions on the NNG pipeline including pressures and whether transportation capacity in excess of CenterPoint Energy's contracted firm 50,000 Dth/day capacity is available to delivery additional gas supplies.

Waterville is a natural aquifer storage field, and the pressures at the storage field cannot be known with certainty in advance, as conditions are constantly in flux and circumstances like excess water production can impact the withdrawal rate. Figure 1 below provides an illustration of natural aquifer storage.

Figure 1. Underground Aquifer Natural Gas Storage



Waterville uses compression to withdraw gas from the storage field and into the NNG pipeline. The compression capacity is determined by the difference in pressure between the storage field and the NNG pipeline. If the storage field pressure is low and the pipeline pressure is high, the withdrawal rate is slower. The amount of gas in the storage field and how that affects pressure

also varies because the gas underground is moving through sandstone, and it takes time for the water and gas to move. The withdrawal rate impacts the total amount of gas that can be withdrawn from Waterville each day. CenterPoint Energy also does not control the NNG pipeline or have insight or control over the pressures on that pipeline on a day-ahead or multiple day-ahead basis – the point at time when gas purchasing decisions must be made. Importantly, these operational conditions directly impact Waterville's daily withdrawal amount, cannot be known in advance, and cannot be directly controlled by the Company.

CenterPoint Energy has begun evaluating a number of alternatives to modify the Waterville Company-owned storage and use of that storage to potentially provide additional protection for customers in the event of an extraordinary gas price spike. The Company proposes to evaluate whether it would be feasible to expand the working gas storage capacity at Waterville and to explore the feasibility and cost to increase contracted pipeline capacity for delivery of Waterville withdrawals.

a. Increasing Pipeline Capacity for Delivery of Waterville Storage Withdrawals

Beyond the upcoming heating season, CenterPoint Energy is evaluating the feasibility and cost to increase its firm pipeline entitlements for deliveries of Waterville withdrawals on NNG from 50,000 Dth/day to 55,000 Dth/day to allow for additional pipeline deliverability of Waterville withdrawals. The Company has requested a cost estimate from NNG for the 5,000 Dth/day of incremental capacity, and that request is pending. We anticipate such additional capacity could be available beginning in 2025 if the Company participates in NNG's next open season, which will occur in 2023. Increasing contracted pipeline capacity will address one of the limitations on the Company's ability to exceed 50,000 Dth/day withdrawal from Waterville on a planned basis. However, even with this change, the Company will continue to face limitations with respect to the operational capacity of the storage field, pressures in the storage field, and the risk of excess water production.

b. Increasing Working Gas Storage Capacity

A longer-term option to potentially increase storage capability and provide further price protection for customers may be to expand the working gas capacity and withdrawal capability at Waterville. CenterPoint Energy is studying the feasibility and cost of expanding Waterville's working storage capacity and daily withdrawal capability, while also increasing firm capacity on NNG to allow for delivery of additional withdrawn volumes. We anticipate initial scoping for such an expansion will take 12 months to complete.

Based on an initial assessment, there may be capability to expand the Waterville storage facility from the current working gas[27] storage capacity of 2,000,000 Dth to up to approximately 2,600,000 Dth and increase the peak withdrawal rate when the storage field is near full from 50,000 Dth/day to up to approximately 65,000 Dth/day. Such upgrades would require extensive planning and engineering and a number of permits or permit changes including modifications to the Company's Department of Natural Resources ("DNR") storage permit, county permits, and Minnesota Pollution Control Agency ("MPCA") permits. These potential upgrades would also require significant capital investment in new additional wells, field piping, compressor station and equipment upgrades, and the addition of significantly more base gas in the field. Evaluating the feasibility and costs to increase the working gas storage capacity will require geological studies and engineering upgrade studies. CenterPoint Energy would also need to contract for additional firm pipeline capacity on NNG to transport the additional volumes from the storage field to the Company's distribution system for delivery to customers. CenterPoint Energy estimates it will take two years to complete evaluations and required engineering, obtain necessary approvals, complete the design and construct wells and other necessary upgrades to expand Waterville's working gas capacity. If the project were determined to be feasible and cost effective and necessary permits and approvals were obtained, the construction would take approximately two years to complete.

2. Pipeline Contract and Virtual Storage

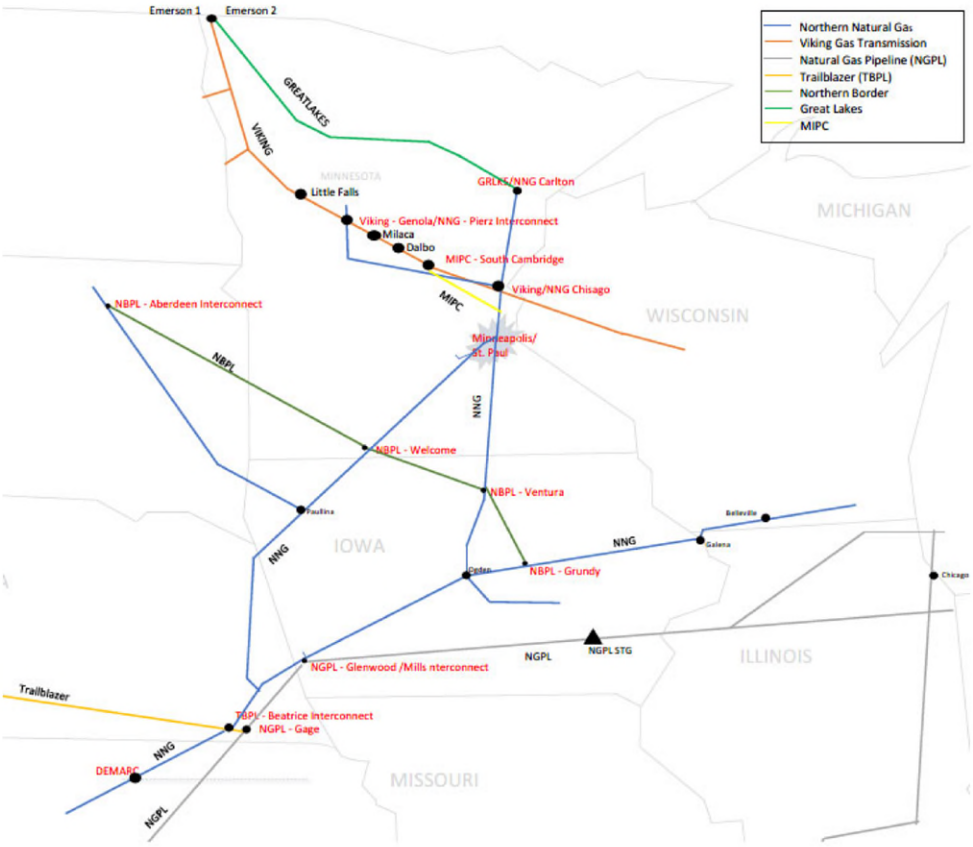
Since storage provides flexibility to maintain reliability and also a hedge against daily market prices, the Company routinely evaluates options to secure more storage as part of the annual development of its Gas Procurement Plan. Currently, there are limited options for adding more storage from existing storage fields. NNG's storage is fully subscribed, with no incremental storage available for purchase at this time. In recent years, natural gas has been trading at low prices, market volatility has been low, and the spread between summer and winter prices has been narrow. As a result, there has not been a significant demand for pipelines to build additional storage.

Because of the limited availability of existing storage, the Company is evaluating whether there are options to expand existing facilities or buy storage at a new location and procure additional pipeline capacity to be able to transport the gas from storage. Adding additional contract pipeline storage requires an evaluation of the availability of storage, identification of the pathway for interstate pipeline delivery of the storage gas to CenterPoint Energy's distribution system, and an assessment of whether capacity upgrades will be required to accommodate the

[27] Working gas refers to the total gas storage capacity minus base gas, where base gas is the volume of natural gas required to be retained in permanent inventory to maintain adequate pressure and deliverability rates throughout the withdrawal season.

incremental capacity requirements. For example, the Company's current storage on NGPL (shown in Figure 2 below) is limited due to the interconnection with NNG.

Figure 2. Map of Transportation Pipelines Serving CenterPoint Energy



The Company currently has 200,000 Dth/day of contracted storage with NGPL; however, there is currently only capacity to allow for delivery of 100,000 Dth/day to NNG at the Glenwood interconnect. The other 100,000 Dth/day must be transported south to the Trailblazer pipeline, then to NNG at the Beatrice interconnect, and ultimately north to the Company's distribution system serving the Twin Cities area. For this reason, we cannot increase the storage capacity on NGPL without significant investment to upgrade the NNG Glenwood interconnect.

To secure additional storage capacity through another source, the Company would have to seek storage upstream of NNG, which would require additional transportation costs. For example, it might be possible to secure storage in Michigan, but the associated transportation necessary to be able to deliver that gas to CenterPoint Energy's customers in Minnesota could require the

Company to obtain entitlement on additional pipelines which may not be cost-effective. The Company will continue to evaluate options to increase physical storage in its supply resources, recognizing that any such increase will likely require a longer-term buildout of storage and pipeline capacity at potentially significant cost.

PEAK SHAVING

CenterPoint Energy's liquefied natural gas ("LNG") plant and eight propane air peak shaving plants are an integral part of the Company's distribution system design and the gas supply plan to meet customer needs as CenterPoint Energy approaches design day conditions. The Company's peak shaving plants have been designed and located on the system to ensure reliability and provide flexibility to address daily or hourly load variations for local areas of the distribution system and to meet customer needs above contracted pipeline transportation capacity.

Operationally, dispatch of the Company's peak shaving facilities is based on a number of factors including the location of the specific plant, customer demand in that area, available fuel, and whether demand will allow the Company to achieve the necessary propane-to-natural gas mix.[28] Peak shaving facilities are traditionally designed and planned to be used as capacity tools to shave peak loads and reduce pipeline transportation capacity requirements. Operating based on economics in response to the price of gas commodity is outside of this typical framework and outside of how CenterPoint Energy has planned to or used its peak shaving plants in the past. Because CenterPoint Energy plans to use its peak shaving resources in the event of design day weather conditions and does not have contracted pipeline capacity sufficient to meet customer needs under such conditions, it is critical that the peak shaving resources be available in the event of design day weather.

Based on the Company's historic planning and use of its peak shaving resources, these facilities help mitigate costs to customers by allowing the Company to avoid procuring incremental pipeline capacity and the associated demand charges that must be paid for year-round when that capacity may be used for just a few hours a year on average.

CenterPoint Energy has evaluated a number of options to modify its peak shaving facilities and use of those facilities to respond to extraordinary natural gas price spikes in the future including expansion of LNG storage, increasing the output capacity of LNG, upgrading the LNG facility to allow for winter season liquefaction to refill storage, and developing a balance of season LNG inventory model. CenterPoint Energy also evaluated whether its propane air facilities could be expanded or planned for dispatch in response to daily natural gas prices.

With respect to the propane air plants, CenterPoint Energy's evaluation concluded that (1) those plants are not designed or situated to respond to pricing events as a result of the operational limitations for when the plants can be run and the limited storage available and (2) it is not

[28] In order to dispatch one of the propane air plants, the expected flow of energy must be at least 2.2 or 2.3 times the planned output of the propane air facility to ensure acceptable safety and gas quality parameters are met for customer end-uses.

reasonably feasible to modify the propane air plants to allow them to be used as a price mitigation tool due to siting, permitting, and operational considerations.

Beyond the upcoming heating season, CenterPoint Energy is evaluating potential upgrades to the LNG plant's liquefaction system to allow for reliable liquefaction and refilling of storage through the winter months. These upgrades could be undertaken in 2023 to potentially be available for the 2023-2024 heating season and would provide the ability to replace some stored LNG as it is used over the course of the winter. Allowing for refill of the LNG storage throughout the winter would help to mitigate the risk of utilizing some LNG supplies to respond to pricing events because the Company would be able to add to storage to improve availability later in the season. It is important to keep in mind, however, that the rate of liquefaction is limited to 5,000 Dth/day, meaning it takes over two weeks to replace a single day of LNG dispatch at full capacity. Running liquefaction in the winter months would also reduce the daily output capacity. Additionally, refilling LNG during the winter months may be more expensive, as we are not receiving the benefit of any summer pricing differential.

CenterPoint Energy is also studying the feasibility of upgrading its LNG system to increase output to help meet expected additional customer peak demand beginning in 2025. Currently, the LNG facility is rated at a vaporization output of 72,000 Dth/day. Preliminary engineering analysis shows that the vaporization output of the LNG plant could be increased to 90,000 Dth/day with the addition of pump capability and replacement of the LNG vaporizers and supporting equipment. Unless already undertaken in advance of these upgrades, this long-term project would also include modification to allow reliable LNG liquefaction in the winter months, allowing CenterPoint Energy the ability to refill LNG storage during the winter. Evaluation of these potential upgrades is ongoing.

First and foremost, peak shaving supplies need to be available to maintain distribution system pressure and capacity during periods of peak demand. However, subject to operational limitations on the use of LNG, upgrading the LNG plant to increase the vaporization output and allow for winter liquefaction may provide some availability to respond to market price spikes. While increasing the daily vaporization output allows greater flexibility to utilize the LNG plant to respond to prices, higher daily usage without any change to the overall storage capacity also means fewer overall days of available storage.

CenterPoint Energy is also evaluating the development of a probabilistic balance of season inventory model to analyze LNG dispatch and inventory requirements and customer needs under design winter weather conditions. A principle guideline for the use of LNG to respond to price spikes must be based on the need to preserve inventory levels for design day needs through the balance of the heating season. To address this, the Company is evaluating using statistical methods to develop minimum inventory levels with the objective of ensuring design day coverage during periods where design day conditions may arise, and relaxing the minimum

inventory levels as the likelihood of a design day or multiple design day event decreases late into the heating season.

Planning to dispatch LNG peak shaving supplies in response to market prices must conform to market and contract requirements that call options and daily purchases for the next day must be made by the morning of the current day, and daily index prices for the next day are not known until the close of business for the current day. As a result, the use of peak shaving to respond to market prices will only be possible for the subsequent days of a multi-day event. In the same vein, just as CenterPoint Energy cannot predict if prices are going to increase on a day ahead basis, so it cannot predict if prices will return to normal levels on a given day. This could result in CenterPoint Energy planning to use its peak shaving facilities a day ahead, only to find out that prices normalize the next day.

INTERRUPTIBLE CURTAILMENTS

CenterPoint Energy's interruptible services provide system relief during peak conditions and in response to pipeline and distribution system constraints to allow the Company to provide continuous, reliable service to firm customers. Interruptible customers are subject to curtailment when: (1) the Company experiences distribution system constraints or operational issues or (2) for system sales (non-transportation) customers, when forecasted customer demand exceeds our contracted pipeline capacity or there is an interstate pipeline constraint. When the Company identifies distribution system constraints, it curtails its interruptible customers until enough load has been removed from the distribution system to maintain sufficient system pressure. Similarly, if forecasted load is expected to exceed CenterPoint Energy's contracted pipeline entitlements, the Company will curtail system sales interruptible customers prior to dispatching peak shaving resources. Curtailments can also provide a limited amount of intra-day load flexibility, which other resources in the Company's Gas Procurement Plan cannot provide.

Calling curtailments based on economics due to a spot gas price spike is outside of how utilities in Minnesota, including CenterPoint Energy, have historically used curtailments. Past reviews of interruptible tariffs and curtailment of interruptible customers in Minnesota during pricing events or weather events have focused on reliability issues. CenterPoint Energy's tariffs currently do not provide for price-based curtailments or contain criteria for economic curtailments, such as the price or trigger for issuing such curtailments.

CenterPoint Energy has evaluated a number of options to modify its interruptible tariffs to respond to extraordinary natural gas price spikes in the future.

Longer term, CenterPoint Energy proposes to evaluate potential modifications to its interruptible tariffs that could be implemented on a permanent basis to allow curtailments for economic purposes or the creation of a new interruptible service offering. Creating understandable and manageable criteria for price-based curtailments and corresponding criteria for returning interrupted customers to service, are complex undertakings that could fundamentally change the nature and value of interruptible sales service.

The Company proposes to continue to evaluate how best to implement economic curtailments on a permanent basis and to work with its interruptible system sales customers to develop such criteria. As part of this assessment, CenterPoint Energy proposes to:

- Analyze average cost and marginal cost conditions under which price-based curtailment could be operationally performed and provide a benefit to firm sales customers;
- Analyze the frequency and duration of pricing conditions to understand the frequency and duration of likely curtailments under proposed curtailment triggers;

- Discuss with interruptible sales customers whether this level of curtailment would be feasible based on alternate fuel availability and environmental restrictions;

- Evaluate what changes in pricing and terms of service would be appropriate for interruptible service that is subject to price-based interruption, and whether a new service would be the best means of accomplishing this change; and

- Evaluate the range of potential gas cost savings that could be achieved through the future use of price-based interruptible service.

To be effective as a price mitigation tool, such an interruptible service offering would need to be structured and priced in a way that does not cause current interruptible system sales customers to move to firm service or cause system sales customers to move to transportation service. Additionally, the Company may not be able to accommodate customer requests to move from interruptible to firm service without potentially significant system upgrades and additional contract pipeline capacity.

Additionally, an effective price-based curtailment offering must include workable and reliable measures that are likely to actually reduce the costs borne by firm sales customers. This means that price movements that cross a threshold of representing an extraordinary price level must be reasonably foreseeable before gas purchases need to be locked in, and that CenterPoint Energy can rely on participating customers to interrupt their service.

Lastly, customers who are interrupted due to a pricing event would expect that they would not have to bear the costs of supplies that are purchased while they are interrupted. While interrupting some customers during a pricing event would reduce the overall amount spent on gas supplies, it may not significantly reduce the per customer impact of purchasing supplies to meet firm customer needs.

Attachment C – NYMEX Future Prices and Basis for Winter 2022-2023

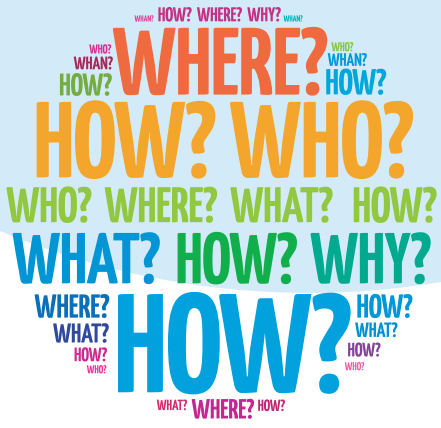
The table below shows the forecasted NYMEX future prices, on a First-of-Month ("FOM") basis, using September 2022 FOM pricing.

FOM Delivered Prices as of September 14, 2022 at Close*			
$/MMBtu	**NNG-Demarc**	**NNG-Ventura**	**NYMEX Henry Hub**
October 2022	$8.456	$8.519	$9.114
November 2022	$8.835	$8.868	$9.167
December 2022	$9.511	$9.711	$9.310
January 2023	$11.000	$11.710	$9.407
February 2023	$10.841	$11.541	$9.073
March 2023	$7.988	$8.028	$7.850
*Source: Amerex and CME Group/NYMEX as provided by S&P Capital IQ Pro.			

Samples of CenterPoint Energy Customer Communications

DO YOU KNOW...

The cost of natural gas is higher this winter.



Why?

Market prices for natural gas are expected to be higher than last winter– meaning higher winter heating costs for our customers, since the cost of gas makes up the largest portion of a monthly bill.

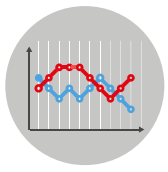
The main cause is the current imbalance in natural gas supply and demand.

Higher natural gas prices are occurring across the country and globally.

Although higher than in the past few years, natural gas prices are still at historically low levels.

What can we do?

To ensure reliable supply and avoid price volatility, we buy or contract for a significant portion of our winter natural gas supply in advance at lower off-season prices.



We have ways to help ease the bill impact for our customers:

- Payment plan options, including *Average Monthly Billing*
- Programs that help pay utility bills, such as the federal Low Income Home Energy Assistance Program (LIHEAP)
- Energy saving tips and energy efficiency programs

Remember: The price we pay for natural gas is the same price we charge our customers, with no markup.

For more information:
CenterPointEnergy.com/ColdWeather

CenterPoint® Energy

Q3 MN 2022 Energy Link

Energy Link CenterPoint Energy

Fall is Just Around the Corner!

With cooler temperatures on the way, it's time to plan ahead and get your facility running as energy efficiently as possible while taking advantage of energy and money savings this fall with CenterPoint Energy's rebates and programs for energy-efficient natural gas equipment.

READ MORE

YOU MAY ALSO ENJOY

Simple Steps to Lower Natural Gas Bills

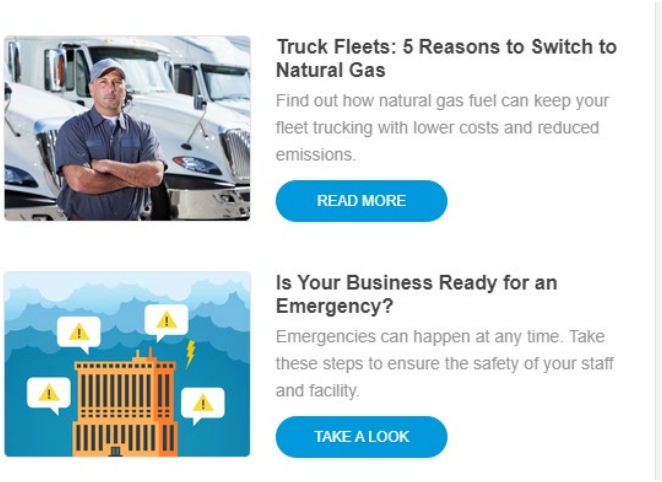
You can significantly reduce your natural gas energy consumption with these low-cost measures.

READ MORE

Measure Boiler Efficiency the Right Way

Follow these guidelines to accurately determine boiler performance and find energy-saving opportunities.

READ MORE



Article 1:

Article 1: 210101-07 mocked up for 211116-13

Image:

[Headline]

Fall is Just Around the Corner!

[Teaser]

With cooler temperatures on the way, it's time to plan ahead and get your facility running as energy efficiently as possible while taking advantage of energy and

money savings this fall with CenterPoint Energy's rebates and programs for energy-efficient natural gas equipment.

Read more>>>>>

[Body Copy]

We know it's hard to say goodbye to another summer, but it means saying hello to saving energy and money throughout your facility with a wide variety of natural gas equipment rebates. You can save money on operating costs for years to come by operating more efficiently and see immediate purchase cost savings too!

Rebate savings include:

- Boiler tune-ups
- Steam trap repairs/replacements
- Boilers (hot water and steam)
- Boiler system components (including turbulators, reset and cut-out controls, burners, stack dampers and linkageless controls)
- Forced-air furnaces
- Condensing unit heaters
- Smart thermostats
- Infrared heaters
- Single package vertical unit
- Carbon monoxide garage sensors
- Garage door hinges (spring-loaded)
- Garage air curtains
- Demand control ventilation
- Water heaters (condensing, atmospheric, power vent)
- Electronic hearth ignitions
- Industrial process equipment
- Commercial laundry
- Pipe insulation (retrofit only)
- Foodservice equipment
- Custom projects
- And more!

Find new opportunities with CenterPoint Energy's audit programs
The Commercial & Industrial Audit Services Program helps customers choose the type of audit services that fit their needs, starting with our comprehensive audit service, Natural Gas Energy Analysis, which will help identify energy saving opportunities for businesses of any size. A certified energy auditor will visit the facility to:

- Inspect the building envelope and installed natural gas equipment
- Examine how the equipment is operating
- Identify opportunities to improve efficiency and potentially qualify for rebates.

Participants receive a detailed report with specific recommendations to help develop an energy-savings plan and are also eligible for free direct-install natural gas-saving measures, including programmable thermostats, energy-efficient faucet aerators and showerheads, and weather stripping for exterior doors.

Looking for a comprehensive natural gas and electric audit? CenterPoint Energy is partnering with Xcel Energy to offer our joint customers a comprehensive electric/natural gas energy audit. If you receive your electric service from Xcel Energy, you can request a joint electric/natural gas site visit for a total co-pay of $500*.

Alternatively, customers can choose to start with specific audit services such as a steam trap audit, which can help increase the efficiency of steam distribution systems by identifying steam traps in need of replacement or repair, or a scoping audit, which identifies energy-efficiency improvement opportunities for customers with more complex systems.

***** Audit co-pay is split $200 to CenterPoint Energy and $300 to Xcel Energy and is automatically added onto the customer's monthly bill.

Get more details on all of CenterPoint Energy's available rebate programs and services**.**

For additional questions about energy efficiency strategies for your business or about the rebate application process, contact your account manager/trade ally representative, or our Business Customer Hotline at 612-321-4939 or 877-809-3803.

Article 2:

Simple Steps to Lower Natural Gas Bills

Think managing your energy use requires a major investment or system upgrade? Think again. Reducing your natural gas usage can be as simple as adjusting a dial. Get started on your journey to energy efficiency with these simple, low-cost steps.

Equipment maintenance

A good maintenance program should include the following:

- Inspect and recalibrate thermocouples in furnaces to obtain more accurate zone temperature measurements and help increase furnace efficiency.
- Install removable insulation on uninsulated valves, pipes and fittings to reduce losses in the process heat distribution system.
- Inspect steam distribution systems for leaks and repair where necessary. Possible sources of unnoticed leaks include piping, valves, process equipment, steam traps, flanges and seals.
- Regularly clean strainers upstream of steam traps to prevent particle accumulation. Excessive deposition can hasten the need for repair or replacement.

When it comes to maintenance, think predictive, not deferred.

Operations

Here are some ways to make your operations more energy efficient:

- Minimize surplus combustion air by tuning damper settings on boiler draft fans, installing over-fire draft control systems, sealing doors and so on. Excess air in the combustion chamber contributes to heat loss via flue gas escape.
- Lower the water temperature in boilers to reduce short-cycle loss, as well as convective and radiant heat loss. For every 40°F reduction in stack temperature, a gain in boiler efficiency of 1% is possible.
- Prevent scale accumulation by ensuring water treatment systems are operating effectively. Scale build-up in boiler tubes inhibits both throughput and heat transfer.
- Rework schedule of processing operations; for example, minimize the frequency of mixed and/or partial loads to reduce delays and reheat requirements.

Remember that your operational requirements change over time, so a periodic review of your operations can identify more opportunities.

Around your facility

Other steps you should consider include:

- Have your space heating system cleaned and inspected annually by a qualified professional to ensure optimal performance.
- Check windows and exterior doors for air leaks. Seal any you find with caulk or weatherstripping.
- Measure and manage ventilation in your facility. In moderate and colder climates, use an economizer to optimize outside air use. Replace warped or worn outside air dampers.
- Understand your gas rate schedule. Make sure it's appropriate for the volume of gas your facility uses.

Looking to save more? Hire a qualified energy professional to perform an energy audit of your facility. Your auditor will examine your facility, evaluate your energy usage and provide you with a targeted set of cost-saving recommendations.

Article 3:

Measure Boiler Efficiency the Right Way

Maintaining optimum boiler efficiency is critical to minimizing carbon dioxide emissions, conserving fuel resources and lowering operating costs. Boiler efficiency should be monitored on a regular basis, especially if any changes are made to operating conditions or equipment.

Calculating boiler energy losses

ASME Performance Test Code (PTC) 4 is the go-to standard for determining boiler efficiency. The standard includes two calculation methods — input-output and heat loss.

With the input-output method, you calculate efficiency by dividing the boiler's Btu output by its Btu input and then multiplying this figure by 100. You determine the output and input through instrumentation, and the resulting data is used to calculate the efficiency value.

The heat loss method is designed to account for all of the boiler's heat losses. You subtract the total percentage of stack, radiation and convection losses from 100 percent as follows:

Efficiency = 100% — [(total heat losses / fuel heating value) X 100]

For natural gas systems, only four primary types of losses apply: dry flue gas losses (sensible heat), moisture losses (latent heat) from water formation by hydrogen combustion and water in fuel, as well as radiation and convection losses. Because the latter two are minimal, 0.1% is assumed for natural gas.

The Boiler Efficiency Calculator available from Natural Resources Canada provides detailed information on calculating boiler efficiency based on the PTC 4 methodology.

Boiler maintenance strategies

Once you've nailed down the efficiency of your boiler system, it's time to take steps to improve its performance. Start with these maintenance and operational strategies:

- **Control excess air levels**. High, excess oxygen levels in your boiler will result in wasted heat and lower efficiency. Excess oxygen levels shouldn't exceed 6% (30% excess air). Monitor flue gas levels and adjust boilers to maintain excess air at optimum levels.
- **Monitor flue gas temperature**. If the flue gas temperature rises, it may indicate scale or deposit formation on boiler tubes.
- **Clean scale buildup off boiler tubes**. Scale buildup will inhibit heat transfer and force the boiler to burn additional fuel to meet the hot water and steam requirements of the system.
- **Inspect boiler insulation** on a regular basis, and repair or replace any damaged or missing insulation.

Targeted retrofits

Next, move on to these cost-effective, energy-saving boiler system upgrades:

- New burners are more efficient, improving fuel combustion and reducing emissions of nitrogen oxide.
- Reset controls minimize fuel waste by matching the supply of steam with the demand for heat instead of supplying steam at a higher pressure than is needed.
- Boiler economizers capture waste heat in the exhaust flue gases and use it to preheat the boiler feed water.

If your boiler is at least 15 years old, or in need of repair, consider replacing it with a newer, higher-efficiency system. You'll not only save energy and money, but you can significantly reduce your greenhouse gas emissions.

Article 4:

Truck Fleets: 5 Reasons to Switch to Natural Gas

Many of the medium and heavy-duty trucks on the road today aren't certified to meet the latest federal emissions standards. These trucks are typically fueled by diesel, which produces a wide range of pollutants that can cause health problems like asthma.

Clean-burning natural gas is an alternative fuel that may provide the solution. NGVAmerica outlines five reasons truck fleet owners should switch to natural gas:

1. Lower emissions
Natural gas engines produce little nitrogen oxides and are cleaner than the latest diesel engines. Both compressed natural gas (CNG) and liquefied natural gas (LNG) produce fewer greenhouse gas emissions than diesel. Renewable natural gas, which is based on plant sources, can provide even more significant emissions reductions.

2. Maximum impact of fleet investment funding
Natural gas vehicles have lower fuel and maintenance costs, which can lead to a quick return on investment. There are also a wide variety of financial incentives and programs available for alternative-fueled vehicles, including natural gas.

3. Road-tested and commercially available
Manufacturers offer all classes of vehicles with natural gas engines. These include transit buses, refuse trucks and airport shuttles. There's an established sales and service network. Conversion kits are also available.

4. Natural gas is low in price and domestically available
Natural gas typically costs less than diesel on a fuel-equivalent basis. The cost advantage of natural gas can be improved with long-term fuel contracts. Also, the United States has proven reserves equivalent to many times its annual consumption and

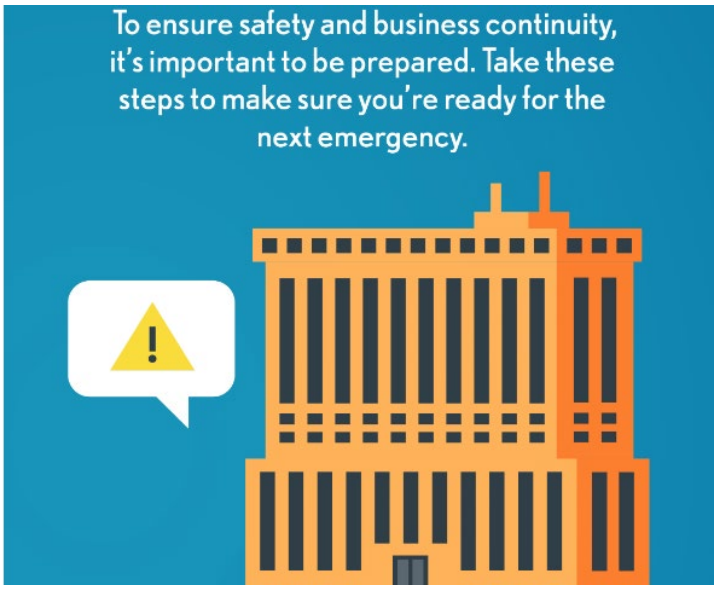
plenty of renewable sources, such as farms and landfills. This will help ensure that natural gas will be plentiful and cheaper well into the future.

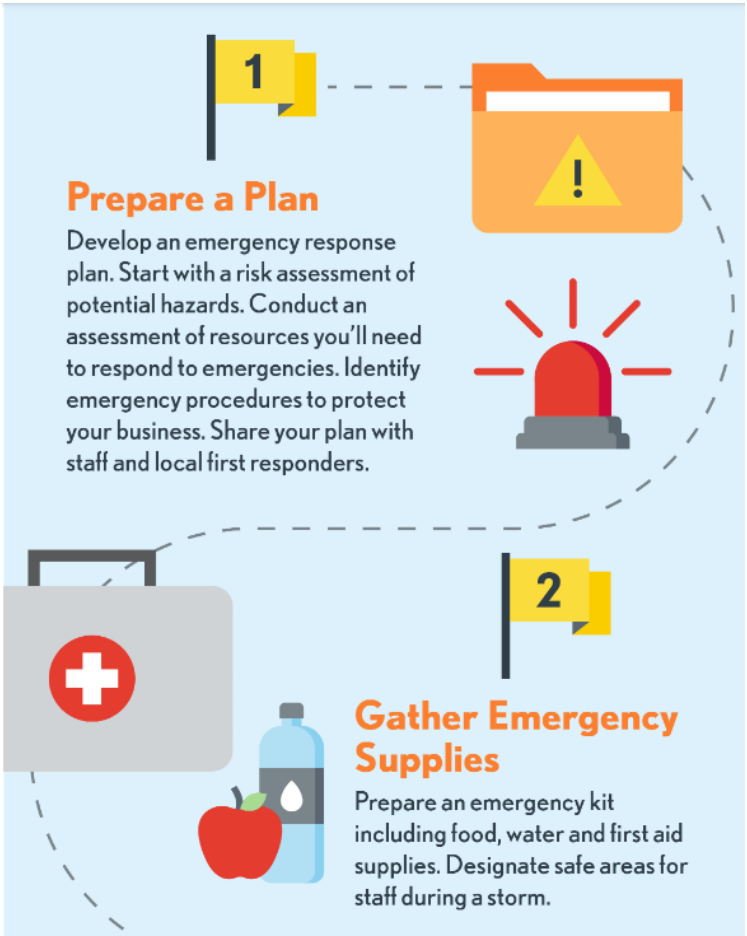
5. Reliable fueling infrastructure

According to the U.S. Department of Energy, there are roughly 1,200 public CNG fueling stations available in the United States and approximately 110 LNG stations. These fueling stations are available mostly in areas that service the long-haul trucking industry. Also, natural gas supplies are usually more reliable during bad weather. Pipelines are underground, and there's no waiting for fuel to be delivered.

Any way you look at it, natural gas is the way to go when considering an alternative fuel for your fleet.

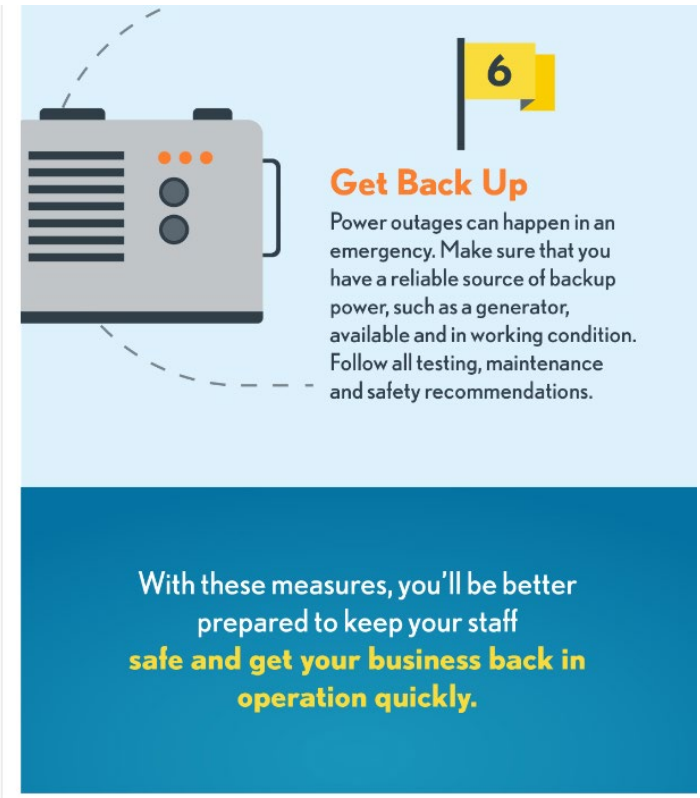
Article 5:


To ensure safety and business continuity, it's important to be prepared. Take these steps to make sure you're ready for the next emergency.


1
Prepare a Plan
Develop an emergency response plan. Start with a risk assessment of potential hazards. Conduct an assessment of resources you'll need to respond to emergencies. Identify emergency procedures to protect your business. Share your plan with staff and local first responders.
2
Gather Emergency Supplies
Prepare an emergency kit including food, water and first aid supplies. Designate safe areas for staff during a storm.


3
Identify the Essentials
Identify all equipment, data and documentation critical to operating your business. Develop procedures for repairing or replacing critical equipment and backing up vital data. Store extra supplies and equipment for use in an emergency.


4
Secure Your Site
Install fire extinguishers and smoke detectors in appropriate places. Make sure emergency exit routes are clearly marked. Install automatic sprinklers, alarm systems and other security systems as needed.
5
Assess Your Alternatives
Create an alternate plan in case an emergency renders your building inaccessible. Determine whether your business can be run from a different location. Plan for appropriate staff members to work remotely as needed.


6
Get Back Up
Power outages can happen in an emergency. Make sure that you have a reliable source of backup power, such as a generator, available and in working condition. Follow all testing, maintenance and safety recommendations.
With these measures, you'll be better prepared to keep your staff
safe and get your business back in operation quickly.

Live in a more efficient home (without moving)

One convenient visit— years of energy savings

HOME ENERGY SQUAD®

Xcel Energy®

CenterPoint Energy

Ready to save money on your energy bills?

One convenient Home Energy Squad® visit is your answer to years of energy savings. We offer two home visit options:

For homes built after 2000, mobile homes, condos, and renters – Only $70

Energy Saver Visit

We'll come to your home and help:

- Install energy-saving materials such as: LED lightbulbs, door and attic hatch weather stripping, programmable thermostat, and high-efficiency water fixtures
- Assess and adjust the water heater temperature
- Plan next steps

For older homes - Only $100

Energy Planner Visit

In addition to what we offer above, during this visit option we will come to your home and also help:

- Perform a blower door test to measure your home for air leaks
- Complete an insulation inspection of your attic and walls using an infrared camera

Our help doesn't end at the visit!

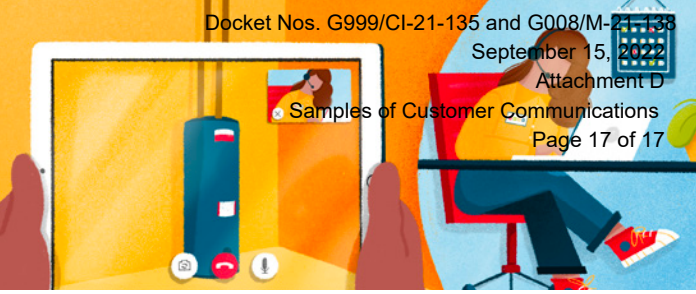
If your home could use larger home improvements, our energy advisors will help you connect with qualified contractors and rebates.

Some cities offer special resources and discounts for their residents Home Energy Squad visit. Check your eligibility online.

Learn how Home Energy Squad can help save you money on your energy bills, visit CenterPointEnergy.com/HomeEnergySquad.

Or call us at 651-328-6220, Mon. - Fri. 8 a.m. - 4:30 p.m.

Virtual visit and phone consultations are available if preferred.



To start saving today visit CenterPointEnergy.com/HomeEnergySquad or call 651-328-6220.

Inscríbase en línea o llame al 651-328-6220,
Lunes a Viernes de 8 a 4:30.
CenterPointEnergy.com/HomeEnergySquad.

You may be eligible for a free in-home visit

Free Home Energy Squad visits are available to qualifying households (based on income). Please contact us to learn more and schedule your visit.

Xcel Energy®

HOME ENERGY SQUAD®

CenterPoint Energy®

Home Energy Squad is provided by CenterPoint Energy and Xcel Energy, supported by participating cities, and delivered by Center for Energy and Environment (CEE). You pay only for the trip charge, and we pay for the materials and installation labor. You must be a CenterPoint Energy residential natural gas customer. Service area is limited to where crews are available. Other restrictions may apply.

Clean Tariff Sheets

SMALL VOLUME DUAL FUEL SALES SERVICE

Availability:

Small Volume Dual Fuel Sales Service is available to commercial and industrial customers on an interruptible basis with requirements of 25 Therms an hour or more and peak day requirements are less than 2,000 Therms.

Customers that use, for reasons of price, an alternative energy supply (other than biomass energy) shall be limited to gas service under the Market Rate Service Rider for a period of one (1) year.

Rate:

Annual Usage	Monthly Basic Charge	Delivery Charger Per Therm	Cost of Gas Per Therm
Less than 120,000 Therms	$60.00	$0.13764	$0.33507
Greater than or equal to 120,000 Therms	$95.00	$0.12708	$0.33507

Interim Surcharge

Effective January 1, 2022, customers' bills will be increased on an interim basis by 12.0% on the monthly basic charge and the delivery charge per therm. Any sales tax and franchise fees will be calculated on the increased bill. If the total amount of the rate increase approved at the end of the rate case (Docket G-008/GR-21-435) is lower than the total amount of the interim rates collected, the Company will refund the difference with interest, and if the total amount of the final rates are higher than the total amount of interim rates, the Company will not charge the customer for the difference.

Therm Factor Adjustment:

Customer metered usage will be adjusted to reflect the following: 1,000 Btu per cubic foot, base pressure of 14.73 PSIA, and a gas temperature of 60 degrees Fahrenheit.

Special Conditions:

1) Customer must have and maintain adequate standby facilities and have available sufficient fuel supplies to maintain operations during periods of curtailment. Customer further agrees to curtail the use of gas on one (1) hour's notice when requested by CenterPoint Energy. On an annual basis, the customer shall provide an annual attestation to CenterPoint Energy that it has fully functioning back-up equipment and/or the ability to curtail natural gas use when requested. The operation and functionality of the back-up equipment is the sole responsibility of the interruptible customer. Failure to maintain this equipment or failure to curtail represents a breach of the terms of interruptible service and may result in termination of the service contract.

2) Customer with greater than or equal to 120,000 therms annual usage must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

3) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:
   a) For the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per Therm.
   b) For subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per Therm.

SMALL VOLUME DUAL FUEL SALES SERVICE (CONTINUED)

Special Conditions (continued):
For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

4) Customers who purchase gas for use in their own compressor facilities for compressed natural gas motor fuel must have a dual fuel burning capability for fleet vehicles using compressed natural gas, and must have the ability to curtail the use of gas for this purpose on one (1) hour's notice when required to do so by CenterPoint Energy.

5) Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

6) Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plant investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.

All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling (RD) Rider:
All customers under this rate are subject to the Revenue Decoupling Rider, Section V, Pages 28-28.a.

Contract:
Customers must sign a separate contract for Small Volume Dual Fuel Sales Service to each delivery point, with a minimum contract term of one (1) year.

SMALL VOLUME FIRM/INTERRUPTIBLE SALES SERVICE (CONTINUED)

Special Conditions Interruptible Volumes (Continued)

4) Customer with greater than or equal to 120,000 therms annual usage must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

5) Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Special Conditions Firm and Interruptible:

Customer must install telemetry equipment. Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plant investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy.

Due Date:

The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:

Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.

All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:

A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:

The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Gas Affordability Rider:

All customer bills under this rate are subject to the adjustment provided for in the Gas Affordability Program Rider, Section V, Pages 25-25.b.

Conservation Improvement Adjustment Rider:

All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling Rider:

All customer bills under this rate are subject to the Revenue Decoupling Rider, Section V, Page 28.

Contract:

Customers must sign a separate contract for Firm/Interruptible Sales Service to each delivery point, with a minimum contract term of one (1) year.

LARGE VOLUME DUAL FUEL SALES SERVICE

Availability:
Large Volume Dual Fuel Sales Service is available, on an interruptible basis, to commercial and industrial customers whose peak day requirements exceed 1,999 Therms, contingent on an adequate gas supply and distribution system capacity.

Customers that use, for reasons of price, an alternative energy supply (other than biomass energy) shall be limited to gas service under the Market Rate Service Rider for a period of one (1) year.

Rate:

Monthly Basic Charge	Delivery Charge Per Therm	Cost of Gas Per Therm
$1,050.00	$0.07710	$0.33507

Interim Surcharge
Effective January 1, 2022, customers' bills will be increased on an interim basis by 12.0% on the monthly basic charge and the delivery charge per therm. Any sales tax and franchise fees will be calculated on the increased bill. If the total amount of the rate increase approved at the end of the rate case (Docket G-008/GR-21-435) is lower than the total amount of the interim rates collected, the Company will refund the difference with interest, and if the total amount of the final rates are higher than the total amount of interim rates, the Company will not charge the customer for the difference.

Therm Factor Adjustment:
Customer metered usage will be adjusted to reflect the following: 1,000 Btu per cubic foot, base pressure of 14.73 PSIA, and a gas temperature of 60 degrees Fahrenheit.

Special Conditions:

1) Customer must have and maintain adequate standby facilities and have available sufficient fuel supplies to maintain operations during periods of curtailment. Customer further agrees to curtail the use of gas on one (1) hour's notice when requested by CenterPoint Energy. On an annual basis, the customer shall provide an annual attestation to CenterPoint Energy that it has fully functioning back-up equipment and/or the ability to curtail natural gas use when requested. The operation and functionality of the back-up equipment is the sole responsibility of the interruptible customer. Failure to maintain this equipment or failure to curtail represents a breach of the terms of interruptible service and may result in termination of the service contract.

2) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

3) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:
   a. For the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per Therm.
   b. For subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per Therm.

For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

LARGE VOLUME FIRM / INTERRUPTIBLE SALES SERVICE (CONTINUED)

Special Conditions Interruptible Volumes (Continued):

3) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

1) greater than or equal to $50.00 per Dth; and
2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

4) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:

a. for the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per therm.
b. for subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per therm. For purposes of this provision, the gas year is the twelve-month period beginning November 1 each year.
c. further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

5) Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Special Conditions Firm and Interruptible:

Customer must install telemetry equipment. Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plan investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy. Alternatively, the customer may elect service under the Supplied Meter Communication Rider (Section V, Page 29), which is a wireless cell phone based metering service.

Due Date:

The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:

Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.

All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:

A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:

The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Gas Affordability Rider:

All customer bills under this rate are subject to the adjustment provided for in the Gas Affordability Program Rider, Section V, Pages 25-25.b.

Conservation Improvement Adjustment Rider:

All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling Rider:

All customer bills under this rate are subject to the Revenue Decoupling Rider, Section V, Page 28.

Contract:

Customer must sign a separate contract for Firm/Interruptible Sales Service to each delivery point, with a minimum contract term of one (1) year.

INTERRUPTIBLE AGRICULTURAL GRAIN DRYER SALES SERVICE (Con'd)

c. For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off Customer's supply of gas in the event of failure to discontinue use after being requested to do so.

5) Customer with greater than or equal to 120,000 therms annual usage must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is
   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.
6) Customers must maintain three (3) current contacts to receive notice of curtailment. If Customer does not have three qualified contacts, Customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and Customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.
All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
The Franchise Fee applicable to Small Volume Dual Fuel A customers will be applicable to customers taking service on the Agricultural Grain Dryer Small Volume Class, and the Franchise Fee applicable to Large Volume Dual Fuel customers will be applicable to customers taking service on the Agricultural Grain Dryer Large Volume Class.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling (RD) Rider:
All customers under this rate are subject to the Revenue Decoupling Rider, Section V, Pages 28-28.a.

Supplied Meter Communication Rider:
Telemetering is required under this rate schedule. A supplied meter fee will be added to the monthly bill when use exceeds 10 Therms per month for customers requiring telemetry as detailed in the Supplied Meter Communication Rider, Section V, Page 29.

Contract:
Customers must sign a separate contract for Agricultural Grain Dryer Service to each delivery point, with a minimum contract term of one (1) year.

INTERRUPTIBLE AGRICULTURAL GRAIN DRYER SALES SERVICE (Con'd)

c. For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off Customer's supply of gas in the event of failure to discontinue use after being requested to do so.

5) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is
   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.
6) Customers must maintain three (3) current contacts to receive notice of curtailment. If Customer does not have three qualified contacts, Customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and Customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.
All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
The Franchise Fee applicable to Small Volume Dual Fuel A customers will be applicable to customers taking service on the Agricultural Grain Dryer Small Volume Class, and the Franchise Fee applicable to Large Volume Dual Fuel customers will be applicable to customers taking service on the Agricultural Grain Dryer Large Volume Class.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling (RD) Rider:
All customers under this rate are subject to the Revenue Decoupling Rider, Section V, Pages 28-28.a.

Supplied Meter Communication Rider:
Telemetering is required under this rate schedule. A supplied meter fee will be added to the monthly bill when use exceeds 10 Therms per month for customers requiring telemetry as detailed in the Supplied Meter Communication Rider, Section V, Page 29.

Contract:
Customers must sign a separate contract for Agricultural Grain Dryer Service to each delivery point, with a minimum contract term of one (1) year.

DUAL FUEL GAS SALES SERVICE AGREEMENT (CONTINUED)

Section 3. CURTAILMENT.

3.1. **Curtailment.** Customer will provide to CenterPoint Energy (and update as necessary) the names and telephone numbers of persons CenterPoint Energy should notify to curtail in Appendix A. CenterPoint Energy can interrupt Customer if capacity constraints require, or for other appropriate reasons (see Section V, Page 4) Customer will curtail gas usage upon one hour's notice.

Section 4. CUSTOMER CONNECTED LOAD.

Connected load is _____MMBTU/input. Alternative Fuel type is _____. Alternative fuel capacity storage is _____. Customer agrees to notify CenterPoint Energy of any changes in natural gas load connected to the meter(s). Customer agrees to provide CenterPoint Energy with a revised connected load list within thirty (30) days of CenterPoint Energy's written request.

Section 5. SERVICE LINES AND METERING EQUIPMENT.

5.1. **Equipment Furnished by CenterPoint Energy**. CenterPoint Energy will install and maintain necessary gas mains and services, meter, remote reading equipment, and regulator equipment to supply natural gas to the CenterPoint Energy meter on Customer's premises. CenterPoint Energy may charge Customer for costs of installation consistent with CenterPoint Energy's Tariff. All equipment furnished by CenterPoint Energy will remain its property and CenterPoint Energy may remove its equipment upon termination of service to Customer.

5.2. **Customer's Equipment**. All piping and equipment downstream of the meter, including telephone lines and any necessary electrical power for remote meter reading equipment, will be installed and maintained by Customer and remain Customer's responsibility. Any inspection by CenterPoint Energy of Customer's piping and equipment will not impose any obligation or liability on CenterPoint Energy.

5.3. **Location on Customer's Premises.** Customer will, without expense to CenterPoint Energy, provide and maintain on the premises, at a location satisfactory to CenterPoint Energy, proper space for CenterPoint Energy's piping, meters, regulators and other equipment.

5.4. **Access to Equipment.** CenterPoint Energy representatives have the right at all reasonable times to have access to its equipment for any reason related to this Agreement, including the right to read meters, make inspections or repairs or remove CenterPoint Energy's equipment. Customer will obtain consent from its lessor, if any, for CenterPoint Energy to enter the premises for these purposes. Access will be granted, at all times, for emergency purposes.

5.5. **Safekeeping of CenterPoint Energy's Equipment.** Customer will provide for the safekeeping of CenterPoint Energy's meters and other equipment. Customer will reimburse CenterPoint Energy for the cost of any alterations to its property necessitated by Customer, and for any loss or damage to CenterPoint Energy's property due to negligence of Customer, its agents or employees. CenterPoint Energy may suspend or discontinue gas service until any such damage or loss is settled to its satisfaction.

Section 6. ALTERNATIVE OR DUAL FUEL EQUIPMENT.

6.1. **Alternative or Dual Fuel Capability.** Customer must have an operational alternate or dual fuel system installed. The installation and maintenance of the alternate or dual fuel system must comply with applicable codes, ordinances and laws.

6.2. **Alternate Fuel Supply.** Customer will have access to sufficient alternate fuel supplies for all periods of curtailment.

Section 7. TERM.

This Agreement is effective when signed by both parties and remains in effect until terminated by CenterPoint Energy pursuant to Section 1 or until terminated by either party upon providing thirty (30) days written notice. This Agreement supersedes all prior written or oral agreements.

Redlined Tariff Sheets

SMALL VOLUME DUAL FUEL SALES SERVICE

Availability:

Small Volume Dual Fuel Sales Service is available to commercial and industrial customers on an interruptible basis with requirements of 25 Therms an hour or more and peak day requirements are less than 2,000 Therms.

Customers that use, for reasons of price, an alternative energy supply (other than biomass energy) shall be limited to gas service under the Market Rate Service Rider for a period of one (1) year.

Rate:

Annual Usage	Monthly Basic Charge	Delivery Charger Per Therm	Cost of Gas Per Therm
Less than 120,000 Therms	$60.00	$0.13764	$0.33507
Greater than or equal to 120,000 Therms	$95.00	$0.12708	$0.33507

Interim Surcharge

Effective January 1, 2022, customers' bills will be increased on an interim basis by 12.0% on the monthly basic charge and the delivery charge per therm. Any sales tax and franchise fees will be calculated on the increased bill. If the total amount of the rate increase approved at the end of the rate case (Docket G-008/GR-21-435) is lower than the total amount of the interim rates collected, the Company will refund the difference with interest, and if the total amount of the final rates are higher than the total amount of interim rates, the Company will not charge the customer for the difference.

Therm Factor Adjustment:

Customer metered usage will be adjusted to reflect the following: 1,000 Btu per cubic foot, base pressure of 14.73 PSIA, and a gas temperature of 60 degrees Fahrenheit.

Special Conditions:

1) Customer must have and maintain adequate standby facilities and have available sufficient fuel supplies to maintain operations during periods of curtailment. Customer further agrees to curtail the use of gas on one (1) hour's notice when requested by CenterPoint Energy. On an annual basis, the customer shall provide an annual attestation to CenterPoint Energy that it has fully functioning back-up equipment and/or the ability to curtail natural gas use when requested. The operation and functionality of the back-up equipment is the sole responsibility of the interruptible customer. Failure to maintain this equipment or failure to curtail represents a breach of the terms of interruptible service and may result in termination of the service contract.

2) Customer with greater than or equal to 120,000 therms annual usage must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

~~1)~~3) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:

   a) For the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per Therm.

b) For subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per Therm.

SMALL VOLUME DUAL FUEL SALES SERVICE (CONTINUED)

Special Conditions (continued):
For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

4) Customers who purchase gas for use in their own compressor facilities for compressed natural gas motor fuel must have a dual fuel burning capability for fleet vehicles using compressed natural gas, and must have the ability to curtail the use of gas for this purpose on one (1) hour's notice when required to do so by CenterPoint Energy.

5) Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

6) Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plant investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.

All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling (RD) Rider:
All customers under this rate are subject to the Revenue Decoupling Rider, Section V, Pages 28-28.a.

Contract:
Customers must sign a separate contract for Small Volume Dual Fuel Sales Service to each delivery point, with a minimum contract term of one (1) year.

SMALL VOLUME FIRM/INTERRUPTIBLE SALES SERVICE (CONTINUED)

Special Conditions Interruptible Volumes (Continued)

4) Customer with greater than or equal to 120,000 therms annual usage must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

5)

Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Special Conditions Firm and Interruptible:

Customer must install telemetry equipment. Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plant investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy.

Due Date:

The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:

Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.

All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:

A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:

The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Gas Affordability Rider:

All customer bills under this rate are subject to the adjustment provided for in the Gas Affordability Program Rider, Section V, Pages 25-25.b.

Conservation Improvement Adjustment Rider:

All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling Rider:

All customer bills under this rate are subject to the Revenue Decoupling Rider, Section V, Page 28.

Contract:

Customers must sign a separate contract for Firm/Interruptible Sales Service to each delivery point, with a minimum contract term of one (1) year.

LARGE VOLUME DUAL FUEL SALES SERVICE

Availability:
Large Volume Dual Fuel Sales Service is available, on an interruptible basis, to commercial and industrial customers whose peak day requirements exceed 1,999 Therms, contingent on an adequate gas supply and distribution system capacity.

Customers that use, for reasons of price, an alternative energy supply (other than biomass energy) shall be limited to gas service under the Market Rate Service Rider for a period of one (1) year.

Rate:

Monthly Basic Charge	Delivery Charge Per Therm	Cost of Gas Per Therm
$1,050.00	$0.07710	$0.33507

Interim Surcharge
Effective January 1, 2022, customers' bills will be increased on an interim basis by 12.0% on the monthly basic charge and the delivery charge per therm. Any sales tax and franchise fees will be calculated on the increased bill. If the total amount of the rate increase approved at the end of the rate case (Docket G-008/GR-21-435) is lower than the total amount of the interim rates collected, the Company will refund the difference with interest, and if the total amount of the final rates are higher than the total amount of interim rates, the Company will not charge the customer for the difference.

Therm Factor Adjustment:
Customer metered usage will be adjusted to reflect the following: 1,000 Btu per cubic foot, base pressure of 14.73 PSIA, and a gas temperature of 60 degrees Fahrenheit.

Special Conditions:

1) Customer must have and maintain adequate standby facilities and have available sufficient fuel supplies to maintain operations during periods of curtailment. Customer further agrees to curtail the use of gas on one (1) hour's notice when requested by CenterPoint Energy. On an annual basis, the customer shall provide an annual attestation to CenterPoint Energy that it has fully functioning back-up equipment and/or the ability to curtail natural gas use when requested. The operation and functionality of the back-up equipment is the sole responsibility of the interruptible customer. Failure to maintain this equipment or failure to curtail represents a breach of the terms of interruptible service and may result in termination of the service contract.

2) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

   1) greater than or equal to $50.00 per Dth; and
   2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

   If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

   Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

~~1)~~3) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:
   a. For the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per Therm.
   b. For subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per Therm.

For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

LARGE VOLUME FIRM / INTERRUPTIBLE SALES SERVICE (CONTINUED)

Special Conditions Interruptible Volumes (Continued):

3) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

1) greater than or equal to $50.00 per Dth; and
2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

~~3~~4) If a customer fails to discontinue use of gas within one hour of being requested to do so by CenterPoint Energy, the customer will be deemed to have taken Unauthorized Gas. The penalty for unauthorized use of gas will be:

a. for the first occurrence of the gas year: the prevailing delivery charge plus the highest incremental supply cost for the day plus $3.00 per therm.
b. for subsequent occurrences: the prevailing delivery charge plus the highest incremental supply cost for the day plus $6.00 per therm. For purposes of this provision, the gas year is the twelve-month period beginning November 1 each year.
c. further, CenterPoint Energy shall have the right to shut off customer's supply of gas in the event of failure to discontinue use after being requested to do so.

~~4~~5) Customers must maintain three (3) current contacts to receive notice of curtailment. If the customer does not have three qualified contacts, the customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and the customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Special Conditions Firm and Interruptible:
Customer must install telemetry equipment. Customer is responsible for reimbursing CenterPoint Energy for all incremental on-site plan investments, including telemetry equipment, required by CenterPoint Energy for providing service to the customer. This investment shall remain the property of CenterPoint Energy. Alternatively, the customer may elect service under the Supplied Meter Communication Rider (Section V, Page 29), which is a wireless cell phone based metering service.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.
All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
A franchise fee will be added to the monthly bill computed at this rate schedule for those communities that impose a franchise fee.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Gas Affordability Rider:
All customer bills under this rate are subject to the adjustment provided for in the Gas Affordability Program Rider, Section V, Pages 25-25.b.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling Rider:
All customer bills under this rate are subject to the Revenue Decoupling Rider, Section V, Page 28.

Contract:
Customer must sign a separate contract for Firm/Interruptible Sales Service to each delivery point, with a minimum contract term of one (1) year.

INTERRUPTIBLE AGRICULTURAL GRAIN DRYER SALES SERVICE (Con'd)

c. For purposes of this provision, the gas year is the twelve month period beginning November 1 each year.

Further, CenterPoint Energy shall have the right to shut off Customer's supply of gas in the event of failure to discontinue use after being requested to do so.

5) Customer must be willing and able to curtail based on the price of natural gas commodity. Customer will be called to curtail if the prior gas day (or multiple days in the case of weekends and holidays) settled Gas Daily daily index price at NNG-Ventura, NNG-Demarc, or Viking-Emerson is

1) greater than or equal to $50.00 per Dth; and
2) greater than or equal to five times the weighted average cost of gas forecast for the month at issue in the Company's filed PGA for that month.

If both of these conditions are met after the index price is published, the Company will notify customers they are curtailed at the beginning of the next gas day (9 a.m. Central Time). Customers who are curtailed under this condition must remain curtailed for the entire gas day. Customers must be able to maintain curtailments until the index price falls below the cost trigger and the Company notifies customer it may resume use of natural gas. Customers may be curtailed in response to price up to a total of five 24-hour gas days over the course of each heating season (November 1-March 31). Customers must also be prepared to curtail for other reasons throughout the heating season, with no limit on the number of days a customer may be subject to curtailment.

Customers who are called to, and do, curtail when the above pricing conditions occur will not be subject to extraordinary cost-recovery surcharges if any such surcharges are established to recover the cost of daily spot gas or swing gas purchased during the period the economic curtailment was in effect. Customers will continue to be subject to applicable purchased gas adjustments and Annual Gas Cost Reconciliation Adjustments. Customers who do not curtail or fail to fully curtail when requested for economic purposes will be subject all applicable surcharges imposed to recover costs incurred during the economic curtailment in addition to applicable charges for unauthorized use.

6) Customers must maintain three (3) current contacts to receive notice of curtailment. If Customer does not have three qualified contacts, Customer shall provide an annual attestation to CenterPoint Energy that it is unable to have three qualified contacts and Customer understands they are required to curtail service when requested. The Company will make an annual request that customers confirm that contact information.

Due Date:
The due date printed on customer bills will not be more than five days before the next scheduled billing date. However, customers who have selected the AutoPay option may select a due date which is greater than five days before the next scheduled billing date.

Late Payment Charge:
Delinquent amounts are subject to a late payment charge of 1.5% or $1.00, whichever is greater. No late payment charge will be applied if the delinquent amount is $10.00 or less.
All payments received will be credited against the oldest outstanding account balance before application of any late payment charge. The late payment charge will be assessed on unpaid amounts at the next scheduled billing date.

Franchise Fee:
The Franchise Fee applicable to Small Volume Dual Fuel A customers will be applicable to customers taking service on the Agricultural Grain Dryer Small Volume Class, and the Franchise Fee applicable to Large Volume Dual Fuel customers will be applicable to customers taking service on the Agricultural Grain Dryer Large Volume Class.

Purchased Gas Adjustment Rider:
The above rate is subject to the Purchased Gas Adjustment Rider at Section V, Page 22. Bills will be automatically increased or decreased as provided in the rate adjustment clause to reflect changes in the cost of purchased gas.

Conservation Improvement Adjustment Rider:
All customer bills under this rate are subject to the Conservation Improvement Rider, Section V, Page 13.

Revenue Decoupling (RD) Rider:
All customers under this rate are subject to the Revenue Decoupling Rider, Section V, Pages 28-28.a.

Supplied Meter Communication Rider:
Telemetering is required under this rate schedule. A supplied meter fee will be added to the monthly bill when use exceeds 10 Therms per month for customers requiring telemetry as detailed in the Supplied Meter Communication Rider, Section V, Page 29.

Contract:

Customers must sign a separate contract for Agricultural Grain Dryer Service to each delivery point, with a minimum contract term of one (1) year.

DUAL FUEL GAS SALES SERVICE AGREEMENT (CONTINUED)

Section 3. CURTAILMENT.

3.1. **Curtailment.** Customer will provide to CenterPoint Energy (and update as necessary) the names and telephone numbers of persons CenterPoint Energy should notify to curtail in Appendix A. CenterPoint Energy can interrupt Customer if capacity constraints require, or for other appropriate reasons (see Section V, Page 4) Customer will curtail gas usage upon one hour's notice.

Section 4. CUSTOMER CONNECTED LOAD.

Connected load is _____MMBTU/input. Alternative Fuel type is _____. Alternative fuel capacity storage is _____. Customer agrees to notify CenterPoint Energy of any changes in natural gas load connected to the meter(s). Customer agrees to provide CenterPoint Energy with a revised connected load list within thirty (30) days of CenterPoint Energy's written request.

Section 5. SERVICE LINES AND METERING EQUIPMENT.

5.1. **Equipment Furnished by CenterPoint Energy**. CenterPoint Energy will install and maintain necessary gas mains and services, meter, remote reading equipment, and regulator equipment to supply natural gas to the CenterPoint Energy meter on Customer's premises. CenterPoint Energy may charge Customer for costs of installation consistent with CenterPoint Energy's Tariff. All equipment furnished by CenterPoint Energy will remain its property and CenterPoint Energy may remove its equipment upon termination of service to Customer.

5.2. **Customer's Equipment**. All piping and equipment downstream of the meter, including telephone lines and any necessary electrical power for remote meter reading equipment, will be installed and maintained by Customer and remain Customer's responsibility. Any inspection by CenterPoint Energy of Customer's piping and equipment will not impose any obligation or liability on CenterPoint Energy.

5.3. **Location on Customer's Premises.** Customer will, without expense to CenterPoint Energy, provide and maintain on the premises, at a location satisfactory to CenterPoint Energy, proper space for CenterPoint Energy's piping, meters, regulators and other equipment.

5.4. **Access to Equipment.** CenterPoint Energy representatives have the right at all reasonable times to have access to its equipment for any reason related to this Agreement, including the right to read meters, make inspections or repairs or remove CenterPoint Energy's equipment. Customer will obtain consent from its lessor, if any, for CenterPoint Energy to enter the premises for these purposes. Access will be granted, at all times, for emergency purposes.

5.5. **Safekeeping of CenterPoint Energy's Equipment.** Customer will provide for the safekeeping of CenterPoint Energy's meters and other equipment. Customer will reimburse CenterPoint Energy for the cost of any alterations to its property necessitated by Customer, and for any loss or damage to CenterPoint Energy's property due to negligence of Customer, its agents or employees. CenterPoint Energy may suspend or discontinue gas service until any such damage or loss is settled to its satisfaction.

Section 6. ALTERNATIVE OR DUAL FUEL EQUIPMENT.

6.1. **Alternative or Dual Fuel Capability.** Customer must have an operational alternate or dual fuel system installed. The installation and maintenance of the alternate or dual fuel system must comply with applicable codes, ordinances and laws.

6.2. **Alternate Fuel Supply.** Customer will have access to sufficient alternate fuel supplies for all periods of curtailment.

Section 7. TERM.

This Agreement is effective when signed by both parties and remains in effect until terminated by CenterPoint Energy pursuant to Section 1 or until terminated by either party upon providing thirty (30) days written notice. This Agreement supersedes all prior written or oral agreements.

In the Matter of a Commission Investigation into the Impact of Severe Weather in February 2021 on Impacted Minnesota Natural Gas Utilities and Customers	Docket No. G999/CI-21-135
In the Matter of the Petition of CenterPoint Energy for Approval of a Recovery Process for Cost Impacts Due to February Extreme Gas Market Conditions	Docket No. G008/M-21-138

CERTIFICATE OF SERVICE

I, Kristin M. Stastny, hereby certify that on the 15th day of September, 2022, on behalf of CenterPoint Energy Resources Corporation d/b/a CenterPoint Energy Minnesota Gas, I electronically filed a true and correct copy of the enclosed Initial Comments on www.edockets.state.mn.us. Said documents were also served via U.S. mail and electronic service as designated on the attached service lists.

Dated this 15th day of September, 2022.

/s/ Kristin M. Stastny
Kristin M. Stastny

First Name	Last Name	Email	Company Name	Address	Delivery Method	View Trade Secret	Service List Name
Mara	Ascheman	mara.k.ascheman@xcelenergy.com	Xcel Energy	414 Nicollet Mall Fl 5 Minneapolis, MN 55401	Electronic Service	No	OFF_SL_21-135_Official Service List
James J.	Bertrand	james.bertrand@stinson.com	STINSON LLP	50 S 6th St Ste 2600 Minneapolis, MN 55402	Electronic Service	No	OFF_SL_21-135_Official Service List
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Generic Notice	Commerce Attorneys	commerce.attorneys@ag.state.mn.us	Office of the Attorney General-DOC	445 Minnesota Street Suite 1400 St. Paul, MN 55101	Electronic Service	Yes	OFF_SL_21-135_Official Service List
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Generic Notice	Commerce Attorneys	commerce.attorneys@ag.state.mn.us	Office of the Attorney General-DOC	445 Minnesota Street Suite 1400 St. Paul, MN 55101	Electronic Service	Yes	OFF_SL_21-138_Official Service List
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