COMMERCE DEPARTMENT

December 10, 2025 **PUBLIC DOCUMENT**

Sasha Bergman
Minnesota Public Utilities Commission
121 7th Place East, Suite 350
St. Paul, Minnesota 55101-2147

RE: **PUBLIC** Comments of the Minnesota Department of Commerce
Docket No. E002/M-25-378

Dear Ms. Bergman,

Attached are the **PUBLIC** comments of the Minnesota Department of Commerce (Department) in the following matter:

> *In the Matter of Northern States Power Company, dba Xcel Energy, Petition for Approval of Capacity*Connect, a Distributed Capacity Procurement (DCP) program*

The Petition was filed by Xcel Energy on October 3, 2025.

The Department recommends **approval with modification** and is available to answer any questions the Minnesota Public Utilities Commission may have.

Sincerely,

/s/ Dr. SYDNIE LIEB
Assistant Commissioner of Regulatory Analysis

BP/PT/CN/SR/AB/ar
Attachment

Contents

List of Tables

List of Graphics (anything other than a table)

Acronyms and Abbreviations

ADMS	Advanced Distribution Management System
BCR	Benefit-Cost Ratio
BESS	Battery Energy Storage System
BTM	Behind-the-Meter
C*C	Capacity*Connect
CBA	Cost-Benefit Analysis
DCP	Distributed Capacity Procurement
DER	Distributed Energy Resource
DERMS	Distributed Energy Resource Management System
DML	Daytime Minimum Load
DSES	Distributed Solar Energy Standard
EJ	Environmental Justice
FE	Flexible Energization
FERC	Federal Energy Regulatory Commission
FI	Flexible Interconnection
FTM	Front-of-the-Meter
IDP	Integrated Distribution Plan
IRP	Integrated Resource Plan
IRP	Integrated Resource Plan
ITC	Investment Tax Credits
ITC	Investment Tax Credit
LMP	Locational Marginal Price
MISO	Midcontinent Independent System Operator
MNDIP	Minnesota Distributed Energy Resource Interconnection Process
MW	Megawatt
MWBE	Minority and Women-Owned Business Enterprises
MWh	Megawatt-hour
NPV	Net Present Value
NSPC	Northern States Power Company
NWA	Non-Wires Alternative
O&M	Operations and Maintenance
RES	Renewable Energy Standard
T&D	Transmission and Distribution
VPP	Virtual Power Plant

Definitions

Daytime Minimum Load- The smallest amount of load the feeder/transformer carries during daytime hours 10:00-16:00.[1]

Daytime Minimum Load Problem- The daytime minimum load problem occurs when high levels of DER generation during midday hours exceed local electricity demand, effectively overwhelming the distribution feeder with excess power that creates grid instability and fills available hosting capacity.

Distributed Energy Resources Management System (DERMS)- DERMS is a control system that will provide improved awareness of DER impacts to power-flow on the grid. DERMS allows for the integration of DER and demand response with full visibility and control, and at the same time enables the Company to maximize localized and system-wide benefits and value for customers. [2]

Front -of-the-meter (FTM)- A large-scale energy storage system connected to the electricity grid on the utility side of the meter, before it reaches individual customer properties.

Virtual Power Plant (VPP)- A virtual power plant (VPP) is a collection of small-scale energy resources that, aggregated together and coordinated with grid operations, can provide the same kind of reliability and economic value to the grid as traditional power plants.[3]

[1] 2024 Hosting Capacity Program Guidebook, Xcel Energy 2024 (Link)
[2] Integrated Distribution Plan (2020-2029), Xcel Energy 2019 (Link)
[3] Clean Energy 101: Virtual Power Plants, Rocky Mountain Institute (RMI) 2023 (Link)

Before the Minnesota Public Utilities Commission

PUBLIC Comments of the Minnesota Department of Commerce

Docket No. E002/M-25-378

I. INTRODUCTION

On April 21, 2025, the Minnesota Public Utilities Commission (Commission) issued its Order[4] in Xcel Energy's (Xcel or the Company, hereinafter) 2024 Integrated Resource Plan (IRP), Docket No. E002/RP-24-67.[5] Order Point 23[6] in the 2024 IRP Order required Xcel to file a Distributed Capacity Procurement (DCP) proposal by October 3, 2025.

In compliance with the 2024 IRP Order, Xcel filed the Company's *Petition for Approval of Capacity*Connect, a Distributed Capacity Procurement (DCP) program*[7] on October 3, 2025. In the Petition, the Company seeks approval to deploy approximately 50 MW and up to 200 MW of Company owned, front-of-the-meter (FTM), and distribution-interconnected Battery Energy Storage System (BESS) by the end of 2028. The program's proposed budget ranges from approximately $152 million for a 50 MW deployment to an estimated $430 million for the full 200 MW deployment.

The Capacity*Connect program intends to install BESS units, ranging from 1-3 MW each, at various commercial, industrial, or community host sites, where they will function as a coordinated capacity resource within Xcel's portfolio by developing a proprietary Distributed Energy Resources Management System (DERMS). To execute this, Xcel proposes to partner with Sparkfund, a Distributed Energy Resource (DER) deployment services firm. Sparkfund's role would involve identifying strategic locations via integrated planning, procuring and installing the battery units, and operating them as a coordinated network.

The Department recommends **approval with modifications**. The Petition presents a novel approach to grid modernization; however, the request for $430 million relies on untested assumptions regarding benefits and scalability. To protect ratepayers from the financial risk of a full-scale rollout while allowing the Company to validate operational theories, the Department recommends limiting approval to an initial "Learning Phase". The Department does not make a specific capacity recommendation at this time and will address the appropriate cap in its reply or supplemental comments. Furthermore, the Department recommends the Commission direct the Company to test three deployment archetypes—Economic Arbitrage, Reliability and T&D Deferral, and DER Congestion and Hosting Capacity—to

---

[4] *In the Matter of Xcel Energy's 2024-2040 Upper Midwest Integrated Resource Plan, Order Approving Settlement Agreement with Modifications*, April 21, 2025, Docket No. E002/M-24-67, (eDockets) 20254-217941-01, (hereinafter "2024 IRP Order").

[5] In the Matter of Xcel Energy's 2024-2040 Upper Midwest Integrated Resource Plan, Xcel Energy, Petition, February 1, 2024, Docket No. E002/RP-24-67, (eDockets) 20242-203027-01, (hereinafter "2024 IRP Petition").

[6] 2024 IRP Order, Order Point 23.

[7] *In the Matter of Northern States Power Company, dba Xcel Energy, Petition for Approval of Capacity*Connect, a Distributed Capacity Procurement (DCP) program*, Xcel Energy, Petition, October 3, 2025, Docket No. E002/M-25-378, (eDockets) 202510-223594-01, (hereinafter "Petition" or "Capacity*Connect" or "C*C" or "DCP program").

generate empirical data on the true value of the project. The Department's analysis and recommendations are guided by the public interest, focusing on:

- Implementation and Cost Management: Ensuring strong implementation oversight, prudent cost management, and robust ratepayer protections.
- Benefit Verification: Establishing robust measurement and verification protocols to validate all claimed system benefits.
- Grid Access: Promoting fair, transparent, and non-discriminatory access to the distribution grid for all parties.
- Equitable Benefits: Guaranteeing the meaningful and measurable delivery of program benefits to all communities, particularly environmental justice (EJ) and low-income communities.

II. PROCEDURAL BACKGROUND

October 3, 2025	Xcel Energy filed a Petition for approval of Capacity*Connect, a Distributed Capacity Procurement (DCP) program.
October 16, 2025	The Commission posted a *Notice of Comment Period*[8] for the Petition.

The Commission's Notice invited parties to address several key topics to guide the record. The Commission requested comments on the following topics:

- Should the Commission approve, modify, or deny Xcel's proposal for Capacity*Connect Phase 2? In your response, please address the following topics:
  - Program design, implementation, and operations
  - Delivery of system benefits
  - Reporting
  - Budget
  - Procurement process
  - Applicability of MN DIP
  - Impact on other programs, such as distribution upgrade cost-sharing
- Does Xcel's filing fulfill Order Point No. 23 of the Commission's April 21, 2025 Order in Xcel's 2024 Integrated Resource Plan (Docket No. E002/RP-24-67)?
- Should the Commission approve, modify, or deny Xcel's proposed implementation of a Grid DERMS use case to support Capacity*Connect? In your response, please address at least the following topics:
  - Budget
  - Proposed use cases
- Does Xcel's DERMS Roadmap in Attachment D of the proposal fulfill Order Point 23 of the Commission's September 16, 2024 Order in Xcel's 2023 Integrated Resource Plan (Docket No. E002/M-23-452)?

[8] *In the Matter of Northern States Power Company, dba Xcel Energy, Petition for Approval of Capacity*Connect, a Distributed Capacity Procurement (DCP) program*, *Notice of Comment Period*, October 16, 2025, Docket No. E002/M-25-378, (eDockets) 202510-224037-01, (hereinafter "Notice").

- Should the Commission approve, modify, or deny Xcel's request to seek cost recovery of Capacity*Connect and Grid DERMS costs through its Renewable Energy Standard (RES) Rider?
- Are there other issues or concerns related to this matter?

The following comments from the Department address the issues raised in the Notice.

III. DEPARTMENT ANALYSIS

The Department analyzes Xcel's Petition by evaluating its consistency with relevant statutes, Commission Orders, and the broader public interest. The Department's analysis is grounded in achieving a balance among constituent goals, including system reliability and resilience, affordability and cost-effectiveness, distribution system modernization, state clean energy and decarbonization mandates, market development and innovation, and equity. The Department's comments specifically analyze the proposal's compliance with the 2024 IRP Order, which established the requirement for this DCP filing.

*A. XCEL ENERGY'S DISTRIBUTED CAPACITY PROCUREMENT (DCP), CAPACITY*CONNECT PROPOSAL*

In the Petition, the Company seeks approval to deploy approximately 50 MW and up to 200 MW of Company-owned, FTM, and distribution-interconnected BESS across Minnesota by the end of 2028. The proposed capital budget for the proposed phase (Phase 2) ranges from approximately $152 million for a 50 MW build-out to an estimated $430 million for the full 200 MW deployment. Phase 1 of the C*C roadmap was approved through Xcel's Energy Conservation and Optimization (ECO) plan and is underway.[9] In Phase 1, Xcel will install 3-5 MW of FTM batteries at commercial customer sites to "evaluat[e] the feasibility and learning more about scalability and economic viability of utility-owned, customer-sited BESS."[10]

To execute this vision, the Company proposes a phased deployment strategy that begins at roughly 50 MW and scales upward only as capabilities, siting processes, and operational tools mature. Xcel intends to partner with Sparkfund, a specialized DER deployment services company, to serve as the integrator responsible for program design refinement, host site- recruitment, and turnkey delivery of the BESS portfolio, including engineering, procurement, and construction. Under this partnership, Sparkfund will manage much of the project level development and delivery risk while Xcel retains ownership of the assets and ultimate responsibility for system -operations.[11]

The Capacity*Connect program intends to install the BESS units, ranging from 1-3 MW each, at various commercial, industrial, or community host sites, where each project functions as part of a coordinated,

[9] *In the Matter of Xcel Energy's 2024-2026 Energy Conservation and Optimization Triennial Plan, Program Modification Request*, Minnesota Department of Commerce, Assistant Commissioner's Decision Addenda in Response to Xcel Energy's Proposed Modifications to its 2024-2026 Energy Conservation and Optimization Triennial Plan, Docket Nos. E,G002/CIP-23-92 & E002/RP-24-67, (eDockets) 20259-222675-01
[10] Petition at 7.
[11] Petition at 15.

utility-controlled capacity resource. These assets are intended to charge during periods of low prices or surplus energy and discharge during peak or high-value hours, enabling participation in wholesale markets and supporting local grid needs. To operate this geographically dispersed fleet as a cohesive Virtual Power Plant (VPP), the Petition requests approval for a limited Grid DERMS deployment with an implementation budget of roughly $2.9 million, including specific use cases such as Flexible Interconnection and Flexible Energization to manage real-time grid constraints and optimize dispatch.

The Company proposes to recover both the BESS capital costs and the Grid DERMS investment through the RES Rider rather than base rates, which facilitates accelerated cost recovery while ensuring a return on investment. In return for this ratepayer funding, Xcel asserts that Capacity*Connect will create stacked system benefits by combining bulk system capacity and energy market value, potential deferral or reduction of traditional transmission and distribution upgrades, and direct payments to host customers. The Company states that it will maintain ultimate control over the dispatch of the BESS fleet to ensure system reliability and resource adequacy, positioning distribution-level storage as a flexible tool that can respond quickly to changing conditions and complement larger, centralized resources in its 2024 IRP Petition.[12]

*B. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S PROPOSAL FOR CAPACITY*CONNECT PHASE 2?*

B.1. Program design, implementation, and operations

The Department supports the Company's proposal as an innovative and necessary step forward, consistent with the Commission's directive in the 2024 IRP Order. The concept of utilizing distributed batteries as a FTM VPP to provide grid services is a critical strategy for meeting Minnesota's clean energy goals. However, as currently proposed the Department has several concerns regarding the cost effectiveness of this resource. These concerns are discussed throughout these comments. The Department finds that the Company's current request for a budget of up to $430 million to deploy 200 MW cannot be supported without substantial commitment to both distribution system and bulk system benefits.

The Department's overarching recommendation is for the Commission to approve a modified version of the Capacity*Connect proposal. This approval should be limited to an initial "Learning Phase" and be contingent on the adoption of the specific modifications detailed in the following sections. These modifications are essential to strengthen the program, de-risk the investment, and protect ratepayer interests. This approach limits initial ratepayer exposure while maximizing the empirical data gathered from distinct applications. The modified Phase 2 aligns with the learning nature of the program and ensures that any future expansion is fully justified by tangible, verified, and cost-effective benefits, in agreement with the Petition:

> A phased approach is necessary to gain operational experience, validate our assumptions, and ensure we have the people, processes, and tools in

[12] Petition at 42.

> place to deploy and operate a high volume of assets quickly, safely, and affordably – while maximizing the benefits to all customers.[13]

The Department does not make a specific capacity recommendation at this time and will address the appropriate cap in the reply or supplemental phase once the benefits of the resource are better supported. Critically, this initial deployment must be structured to test specific, distinct siting Archetypes to determine which applications provide the greatest value to ratepayers.

*B.1.1. C*C Phase 2 as a Learning Phase*

The Company states that the C*C program aims to identify barriers and test potential solutions prior to a full-scale rollout. The Petition explicitly notes that the Company does not currently know the specific MW volume of BESS that can be safely integrated. Accordingly, the Petition identifies the resolution of operational uncertainties and the acquisition of siting logistics data as central components of the proposed phase.[14]

The Company characterizes the proposal as a pilot phase and admits uncertainty regarding integration limits. The Petition explicitly acknowledges an inability to guarantee the deployment volume associated with the requested capital:

> […] simply put, we do not yet know how many megawatts of BESS can install, and safely and cost-effectively integrate into our operations in this next phase of C*C without continuing to answer several key questions.[15]

Further, the Petition characterizes the program as a developmental step intended to provide testing and validation of costs and scalability:

> The Phase 2 C*C program will provide important testing and validation of costs, benefits, operational coordination, and scalability, to develop the industry-leading full-scale program that we believe is achievable, we must proceed thoughtfully within and beyond Phase 2.[16]

Xcel tempers expectations regarding the benefits mentioned in the Petition—the Company acknowledges that while Phase 2 of C*C will primarily seek to maximize bulk system benefits, the full value proposition is prospective rather than guaranteed:

> The benefits won't all be realized immediately, but we believe this proposal provides critical movement toward an energy future that optimizes the usage of all of our assets.[17]

---

[13] Petition at 6.
[14] Petition at 11.
[15] Petition at 3.
[16] Petition at 6.
[17] Petition at 9.

Additionally, the Petition frames Phase 2 not as a deployment of proven solutions, but as an exploratory exercise to identify hurdles:

> Phase 2 seeks to test the possibility of realizing these benefit streams concurrently as well as identify barriers and potential solutions to doing so. The learnings from this phase will be crucial to informing any future C*C phases.[18]

The Company's characterization of the program as a pilot intended to validate assumptions supports the Department's recommendation of implementing a modified Phase 2 focused on different value-proposition Archetype implementation and siting strategy testing. A limited Phase 2 protects ratepayers by ensuring the Company resolves operational uncertainties and validates value-stacking strategies prior to further capital commitment.

B.1.2. Limited system benefits

The Department finds that the quantified-benefit methodology rests on optimistic assumptions regarding asset performance, market participation, and deferral realization. The primary objective of Capacity*Connect is to deliver system-wide benefits by deferring or avoiding more expensive traditional infrastructure:

> The goal is to deliver system capacity benefits without the need for potentially time-consuming and costly interconnection, upgrades, and investment in the bulk system while bringing more locally stacked benefits through optimization of the distribution system.[19]

Xcel asserts that distributed batteries, optimally sited, can provide capacity value and energy arbitrage that benefit all customers. These FTM batteries will charge during off-peak times and discharge during peak demand, providing capacity and energy when it is needed most. By discharging during peak hours, the BESS fleet could reduce Xcel's net peak demand and potentially defer the need for new peaking generation or transmission upgrades.

However, Capacity*Connect program's stated benefits from its capacity/resource adequacy revenue strategy may be *overestimated,* as illustrated in **Figure 1**. The overestimation maybe due to a fundamental duration mismatch between the asset and the market's price structure. The BESS is a 4-hour duration system, meaning it must discharge for four hours to dispatch its full energy value. Figure 1 illustrates a market characterized by short-duration price spikes, where maximum values are sustained for only one to two hours. Consequently, to achieve a full discharge cycle, the BESS must operate during the lower-priced 'shoulder' intervals immediately preceding and following the peak. This mismatch significantly lowers the average realized price for its 4 MWh of energy, which suggests that analyses assuming the full discharge can be sold at the peak price will overstate the project's actual profitability.

[18] Petition at 11.
[19] Petition at 2.

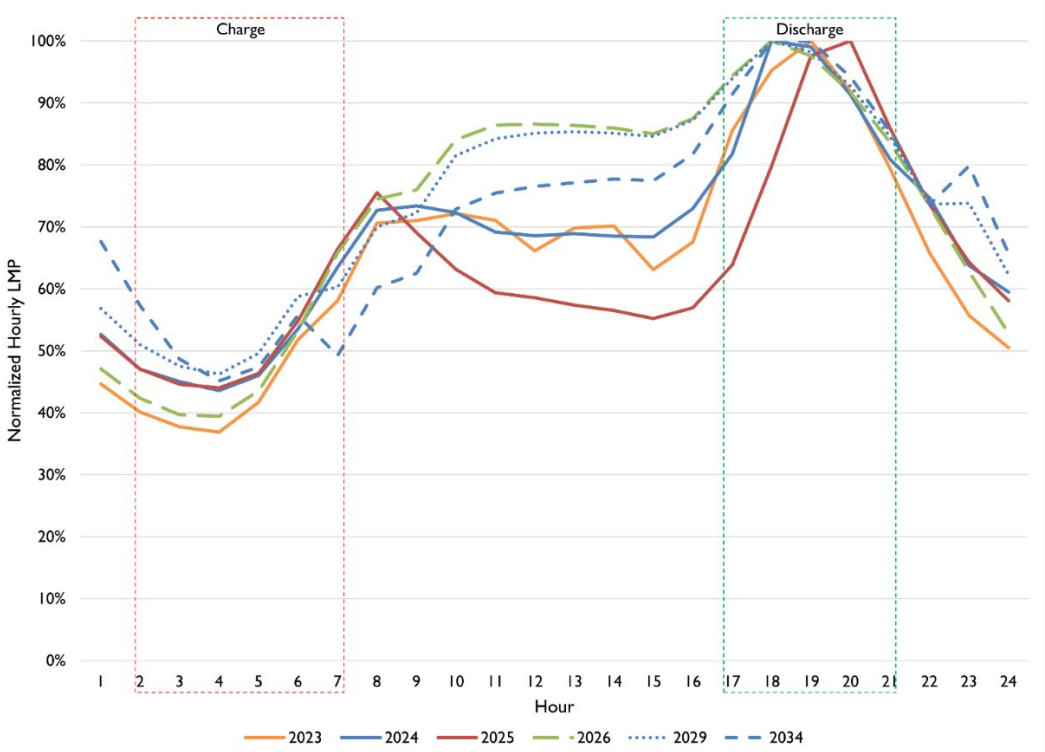

Figure 1. Normalized Hourly Locational Marginal Prices (LMP), 2023-2034.[20]

The Department further questions whether the Company's chosen market participation strategy artificially suppresses the program's value by excluding ancillary services. In the Petition, the Company indicates that the CBA does not model revenue from ancillary services (such as frequency regulation) because it intends to register the BESS fleet as Demand Response Resources (DRR) Type 1. While the Company argues this pathway avoids the "onerous metering and telemetry requirements" associated with the Electric Storage Resource (ESR) model, it also explicitly prohibits these assets from providing regulation services—a function for which fast-responding batteries are uniquely suited and economically valuable. By prioritizing administrative simplicity over full market functionality, the Company may be leaving significant ratepayer value on the table. The Commission should examine whether the avoided costs of the DRR Type 1 model truly outweigh the forgone revenue from ancillary services, and whether the Company should instead be required to pursue the ESR pathway to maximize the return on this ratepayer investment. The Department requests that Xcel, in order to develop the record more fully, provide in reply comments further discussion about the various advantages and disadvantages of registering the C*C BESS fleet as a DRR Type 1 or Type 2, ESR, another resource, or a combination. The Company's discussion should include a discussion of how each of these resource types may or may not interact with future FERC Order 2222 integration in MISO.

[20] The data used to generate the normalized price curves in Figure 1 is retrieved from two sources. Historical and current data (2023-2025) are based on MISO LMP averages. The future price projections (2026, 2029, and 2034) are derived from data provided by Xcel Energy in Attachment D of the Petition.

B.1.3. Cost-Benefit Analysis (CBA)

The Department identifies significant limitations regarding the cost-benefit analysis (CBA) in the Petition. The thin benefit-cost ratio (BCR) (0.96 for the full 200 MW deployment and **[PROTECTED DATA HAS BEEN EXCISED]** for the 50 MW scenario[21]) suggests minimal, if any, net ratepayer benefit under the Company's own assumptions. The narrow BCR suggests that even modest deviations from assumed performance or cost parameters could materially affect the program's overall economic viability. The limited BCR underscores the importance of the Department's recommendation to limit the initial deployment and verify benefits. **Table 1** compares the BCR across four potential deployment scenarios, that range from 50 MW to the Company's full 200 MW request.

Table 1. C*C Phase 2 Benefit-to-Cost Comparison ($ millions NPV)[22]

	C*C Phase 2 Benefit-to-Cost Comparison ($ millions NPV)			
Deployment Capacity	**50 MW**	**100 MW**	**150 MW**	**200 MW**
Benefits				
Production Cost Savings	**[PROTECTED DATA HAS BEEN EXCISED**			$39.28
Capacity / Resource Adequacy				$289.00
Avoided Distribution Benefit				$41.69
Avoided Transmission Line Loss				$7.07
Avoided Transmission Benefit				$62.53
Total Benefits				**$439.56**
Costs				
Capital Expenses				$288.58
O&M Expenses				$252.35
ITC				$(82.88)
Total Costs				**$458.05**
Benefit/Cost Ratio				**0.96**

The Department acknowledges the low BCR for the 50, 100, and 150 MW scenarios but finds it is not—on its own—a sufficient reason to reject a limited learning phase. The low ratio is due to applying a CBA model designed to value a large-scale system capacity resource to what is fundamentally a small-scale learning-phase pilot. The model fails to quantify the primary benefit of a limited learning phase: the significant value of learning, data acquisition, and de-risking a much larger, future investment. The purpose of this limited deployment would be to empirically test the theoretical assumptions in the

[21] The Department conducted the CBA for a 50, 100, 150 MW deployment scenario. See Attachment B.

[22] Assuming the batteries are sited within utility-owned sites (by assuming rent payments to be 0), the BCR ratio slightly increases to 1.02 in the 200 MW deployment scenario and to [**PROTECTED DATA HAS BEEN EXCISED]**in the 50 MW deployment scenario.

Company's 200 MW CBA before committing ratepayers to the full, and potentially imprudent, $430 million deployment. Therefore, the Department views the **[PROTECTED DATA HAS BEEN EXCISED]** ratio not as a failure of the pilot, but as a clear justification for why a prudent, limited cost "Learning Phase" is the only responsible path forward.

Furthermore, the Department is particularly concerned about the sensitivity of the analysis to several key assumptions. The quantified benefits rely heavily on the full realization of avoided generation capacity, distribution upgrade deferrals, and federal ITC. These assumptions presume optimal siting, timely deployment, consistent operational performance, and successful accreditation of battery storage capacity under MISO resource adequacy frameworks. Each of these factors introduces uncertainty. For example, if the actual distribution deferral opportunities are fewer or less costly than estimated, or if ITC benefits are not fully realized, then the overall program benefits would be significantly reduced. Further, the cost assumptions appear optimistic given current supply chain constraints, labor costs, and permitting timelines associated with BESS.

Given these factors, the Department recommends that the Commission approach the CBA results with caution. The narrow benefit margin underscores the importance of ongoing oversight, independent verification of realized benefits, and periodic updates to the CBA as deployment progresses. The Department recommends the Commission require Xcel to submit supplemental analyses, including sensitivity testing and site-specific cost-benefit updates, prior to full-scale implementation. Such measures would provide greater confidence that the Capacity*Connect program delivers genuine and measurable value to ratepayers, while aligning with broader reliability and decarbonization objectives.

B.2. Additional Distribution-side Benefits

The Petition proposes economic arbitrage as the major lever to gain bulk system benefits. In addition to economic arbitrage, the Department identifies a few more significant and valuable value streams that provide significant benefit and use-cases for the DCP project.

B.2.1. Addressing the Daytime Minimum Load problem

There is a 'non-wires' benefit of the DCP program: using the batteries to mitigate distribution constraints. In areas with high DER penetration, the grid can experience a Daytime Minimum Load (DML) problem,[23] where excess daytime generation overwhelms the feeder and fills the available hosting capacity. The Company acknowledges that, absent specific operational constraints, "the addition of Capacity*Connect BESS may ultimately impact the hosting capacity on certain areas of the distribution system."[24] However, the Department argues that this impact can be positive rather than negative. By strategically siting a Capacity*Connect BESS on such a feeder and using the new DERMS platform to charge it during these periods, the battery effectively soaks up this excess solar generation:

[23] See Definitions.
[24] Xcel's response to DOC IR 3, see Attachment A.1

> the storage systems also relieve distribution system congestion or increase grid capacity, that may support future deployment of solar, including DSES projects.[25]

While the Company states the program is "designed to provide value to the bulk system,"[26] prioritizing DML mitigation resolves voltage issues and increases the feeder's hosting capacity. This aspect of C*C would direct benefit other programs, as new third-party solar projects could then potentially interconnect on that feeder without triggering the expensive and time-consuming system impact studies previously required for grid upgrades.

B.2.2. Complying with the Distributed Solar Energy Standards (DSES) Legislative Mandate

The Company "envision[s] that solar could be deployed as part of the C*C program starting in Phase 3, and the Company would intend to maximize efficiency and customer value by ensuring any new solar deployed through C*C also counts toward DSES compliance."[27]

The Department identifies a unique opportunity to align the DCP program with the Company's compliance requirement for the DSES.[28] The Department notes the Company's difficulty in meeting DSES targets via competitive solicitations—the Company's 2024 RFP, which sought 200 MW of distributed solar to meet the DSES goals, received only 24 MW of actionable bids from two developers.[29] Xcel acknowledges that the "projects fall significantly short of our 200 MW target in our initial RFP," and explore "the inclusion of additional resource options – such as distributed storage – could provide important flexibility to optimize the use of distributed solar resources across our system."[30] The shortfall suggests that the current approach cannot deliver the necessary volume that Xcel requires to comply by the DSES statute.

The Department recommends the Commission direct Xcel to evaluate a 'Solar + Storage' Archetype for Phase 3 of the program. Specifically, Xcel should analyze feeders where DML currently prevents new solar installations and determine if co-locating DCP batteries can unlock hosting capacity for to meet DSES goals.

---

[25] Petition at 47.
[26] Xcel's response to DOC IR 3, see Attachment A.1
[27] Petition at 47.
[28] Minn. Stat. § 216B.1691, Subd. 2h. (hereinafter "DSES Statute")
[29] *In the Matter of the Implementation of the New Distributed Solar Energy Standard Pursuant to 2023 Amendments to Minnesota Statutes, Section 216B.1691*, Xcel Energy, RFP Update—Shortlisted Bids, October 17, 2025, Docket No. E002,E015,E017/CI-23-403, (eDockets) 202510-224071-01 (hereinafter "Xcel's DSES RFP (2025).")
[30] Xcel's DSES RFP (2025).

B.3. Modified Phase 2 Implementation Archetypes

A more structured learning phase is required because the Company's current siting strategy, focused broadly on "system capacity," lacks the specificity needed to rigorously test the multiple non-wires alternative (NWA) value streams these assets could provide. A successful phase must be designed to test specific, measurable value streams to inform all future distributed investments. The Company emphasizes the importance of siting, admitting that the hardware alone is insufficient without precise geographic placement:

> Realizing the full value of C*C depends not only on the underlying assets themselves, but also on the ability to strategically site and effectively integrate them into the Company's grid planning and operations.[31]

The Petition outlines a significant capital investment but currently lacks a structured approach to testing specific battery use cases. By not clearly distinguishing between competing operational goals—such as mitigating local voltage constraints versus maximizing market revenue—the plan risks overlooking distinct value streams. The Department, therefore, recommends the Commission modify the program design to require the initial learning phase deployment be allocated across three specific siting archetypes (see **Department Table 2**, below), with distinct measurement and verification for each. These categories will allow for a targeted evaluation of how storage addresses specific distribution grid challenges.

This modified approach allows the Company to gain critical operational experience while protecting ratepayers from the risk of a full-scale 200 MW deployment. Most importantly, it ensures that the data gathered from this Phase will be targeted and specific, enabling the Commission to make a fully informed decision about which benefit streams are most valuable and whether future expansion of the program is in the public interest.

Additionally, the Company states that siting will "balance system needs and benefits with EJ considerations."[32] The Department is concerned that without specific siting Archetypes, system needs will overshadow equity considerations. The Company explicitly notes that "it would be premature to set specific targets prior to feeder selection."[33] This uncertainty underscores the need for the Department's proposed Archetypes. By dedicating a specific portion of the pilot (e.g., within Archetype 3) to feeders in underserved areas that require congestion relief, the Commission ensures that EJ benefits are structurally built into the program design rather than left to a balancing test during implementation.

[31] Petition at 42.
[32] Xcel's Response to DOC IR 4, see Attachment A.2
[33] *Id.*

Table 2. Summary table of different Archetypes proposed by the Department

Archetype	Focus	Modification
Archetype 1	Economic Arbitrage	The Department recommends directing the Company to site a portion of C*C BESS in locations selected to maximize energy market arbitrage value, based on nodal LMP.
Archetype 2	Reliability and T&D Deferral	The Department recommends directing the Company to site the remaining portion of C*C BESS to address specific, identified distribution reliability issues or to defer planned T&D investments.
Archetype 3	DER Congestion and Hosting Capacity	The Department recommends directing the Company to site a portion of C*C BESS in locations with documented high penetrations of DERs, that are experiencing grid congestion, such as Daytime Minimum Load (DML) issues.

Archetype 1 (Economic Arbitrage): The Company's CBA identifies energy arbitrage as a key benefit. This archetype would test that value stream by placing batteries where the spread between off-peak (charging) and on-peak (discharging) energy prices is greatest. This siting prioritization should provide a direct, monetizable revenue stream than can be used to offset (and hopefully exceed) program costs for the benefit of all ratepayers.

Archetype 2 (Reliability and T&D Deferral): Archetype 2 aligns with the Company's primary stated NWA goal. It would test the BESS's value as a traditional NWA, where discharging the battery during local peak demand can alleviate stress on a specific substation or feeder, improving local reliability and deferring a specific, budgeted infrastructure upgrade. This archetype is particularly relevant to equity goals, as it offers a mechanism to improve service quality in historically under-invested areas that suffer from lower reliability, which ensures that grid modernization benefits reach the most vulnerable ratepayers.

Archetype 3 (DER Congestion and Hosting Capacity): On circuits with high solar generation, excess daytime power can create power flow and voltage issues, filling the available 'hosting capacity' and blocking new third-party DER interconnections. By siting batteries in these specific locations and using the new DERMS platform to charge them during peak solar hours, the Company can soak up the excess generation. This siting prioritization would solve the DML problem and demonstrably increase the feeder's hosting capacity, potentially deferring costly upgrades and enabling more third-party solar. This archetype would directly test the 'Flexible Interconnection' use case proposed for the DERMS.

B.4. Reporting

The Department recommends the Commission direct Xcel to file a DCP Phase 2 Evaluation Plan within 180 days of Order issuance. The plan must detail the specific methodology the Company will use to measure and verify the performance of the three siting archetypes listed below:

To ensure continuous oversight, the Department recommends the Commission direct the Company to file quarterly program status reports. These reports must include, at a minimum:

- Deployment & Budget: Current deployment status (MW and sites operational) and a detailed breakdown of budget expenditures (Capital and O&M).
- Archetype Performance: Specific performance data and benefit calculations for each of the three siting archetypes, including Measurement and Verification (M&V) data validating claimed benefits (for example, realized energy arbitrage revenue, confirmed T&D deferrals, and reduction in reverse power flow).
- Grid DERMS Efficacy: Operational performance data for the Grid DERMS platform, specifically demonstrating the successful execution.
- Interconnection & Hosting Capacity: Documentation of the interconnection studies and distribution upgrades required for each site, along with a specific tracking of how each FTM battery installation impacts the available hosting capacity on its respective feeder.
- Labor Standards Compliance: Auditable reporting on compliance with the labor standards outlined in the Petition, specifically quantifying prevailing wage and apprenticeship utilization rates.
- Equity Progress: Tracking of the specific, quantifiable equity metrics (detailed in Section C.1. below), including the percentage of subcontracting dollars awarded to MWBE and status of host community consultations.

The Department recommends the Commission direct Xcel to conduct a Comprehensive Third-Party Evaluation[34] after 20 MW of capacity is operational or after 2 years of Commission approval, whichever comes first. The Department proposed third-party evaluation replaces the Company's proposed Interim Program Assessment and must be filed for Commission and stakeholder review. This evaluation must include:

- Benefit Verification: Independent verification of the costs and realized benefits of the initial 20 MW deployment.
- Future Market Models: A specific analysis of potential models for a future "Phase 3" that incorporates third-party owned resources and competitive solicitations.
- DSES Pathway: An analysis of how future phases could be structured to incorporate solar generation to aid compliance with the DSES.
- DERMS Interoperability: A technical detailed confirmation that the DERMS platform has been designed with an open architecture capable of integrating with third-party aggregators and managing third-party-owned FTM DERs.

[34] Hereinafter, "Department proposed third-party evaluation"

B.5. Budget

The Department offers no recommendation regarding the budget at this time.

B.6. Procurement process

The Department has concerns with the selection of a single implementation partner through a non-competitive, sole-source process. For a ratepayer-funded program with a proposed budget of up to $430 million, the failure to use a competitive procurement process to select the primary implementation partner introduces substantial and unnecessary financial risks. Xcel, through an Information Request, provided clarification on the details of the implementation partnership with Sparkfund. Sparkfund's role is expected to include: aspects of program design; site evaluation, selection, and engagement; procurement and contracting; project delivery; and operations and maintenance.[35]

The Department acknowledges the Company's rationale that this approach leverages a partner with pioneering experience in the DCP model to accelerate this first-of-its-kind pilot program. However, the market for DER program implementation and management is robust and includes numerous qualified firms that provide services comparable to those offered by Sparkfund. By forgoing a competitive process, the Company has failed to demonstrate that its partnership with Sparkfund represents the most cost-effective option for ratepayers. The proposed structure, in its current form, necessitates a high degree of transparency and utility oversight to ensure these downstream procurements are managed fairly, achieve market-based pricing, and protect the financial interest of all ratepayers.

The Department requests that Xcel provide in its reply comments information on mechanisms to ensure transparency and accountability, as well as market-rate justification for the costs associated with Sparkfund's role, including but not limited to engineering, procurement, and construction services.

B.7. Applicability of MN DIP

The Minnesota Distributed Energy Resource Interconnection Process (MN DIP) is the standard procedure that third-party DER developers must follow to interconnect generation (up to 10 MW) to the distribution grid. A key question is whether Xcel's utility-owned BESS installation under Capacity*Connect must adhere to MN DIP requirements. In the Petition, Xcel argues:

> [MN DIP] do[es] not necessarily contemplate the C*C concept: FTM, utility-owned and -controlled, dispatchable DER, strategically deployed to serve as bulk system assets that are not functionally different from the Company's distribution system. So, while we will perform necessary

[35] Xcel's response to DOC IR 7.

> studies to assess impact of the C*C BESS on the system, C*C assets akin to bulk system resources are not subject to MN DIP.[36]

Footnote [8] notes in the Petition:

> As part of the Company's distribution system, the assets differ from a BESS that is part of a DER subject to MN DIP, which applies to DER "… interconnecting to, and operating in parallel with, an Area [Electric Power System] distribution system…" (MN DIP 1.1.1) [37]

Xcel commits to perform equivalent system impact studies and adhere to safety/technical standards for each interconnection:

> In order to maintain a safe, reliable system, we will need to conduct system impact studies for each site, similar to studies conducted under MN DIP.[38]

Xcel states it will avoid any deployments that trigger significant distribution upgrades. The Department does not see the necessity for Xcel to go through the administrative steps of MN DIP for each site, which would undercut the value proposition of the DCP—quick deployment. However, the Department wants to underscore that technical due diligence and grid protection principles embodied in MN DIP must be upheld.

Xcel should coordinate DCP additions with its hosting capacity analysis, even if not in MN DIP, as the addition of 3 MW of injection on a feeder will consume hosting capacity. Depending on the specific deployment, the C*C BESS could consume hosting capacity available to other DERs or, as with Archetype 3, potentially increase it. Consequently, Xcel should not be permitted to 'skip the line' in a manner that creates an anticompetitive environment. Even if utility-owned assets are not technically subject to the full interconnection application process, they must functionally respect the queue to ensure that the presence of a utility BESS does not inadvertently block or complicate pending third-party interconnections.

The Department recommends the Commission direct Xcel to document, in its quarterly reports or IDP updates, the interconnection studies and any distribution upgrades required for each site. This will ensure no compromise to safety or reliability. Furthermore, to address potential inequities in capacity allocation, the Department supports alignment with the MN DIP where applicable.

B.8. Impact on other programs, such as distribution upgrade cost-sharing

The primary impact of the C*C program on other programs relates directly to distribution upgrade cost-sharing and hosting capacity. Xcel states its vision:

[36] Petition at 18.
[37] Petition at 18.
[38] *Id.*

> The vision of this program is one that provides capacity and energy benefits for customers without the need for potentially time-consuming and costly interconnection, upgrades, and investment in the bulk system, while bringing more locally stacked benefits through optimization of the distribution system.[39]

By design, the Capacity*Connect program, intends to function as an NWA to defer or avoid traditional T&D upgrades:

> By siting BESS as a part of the distribution system, C*C assets avoid transmission upgrade/interconnection costs associated with utility-scale generation resources.[40]

However, this benefit must be balanced against the program's consumption of finite hosting capacity, as discussed in B.3. The Department recommends the Commission order Xcel to clarify in its annual Integrated Distribution Plan (IDP) filings how these NWA investments are being coordinated with traditional distribution planning and how hosting capacity impacts are being managed to ensure third-party DER programs are not negatively affected.

C. DOES XCEL'S FILING FULFILL ORDER POINT NO. 23 OF THE COMMISSION'S APRIL 21, 2025 ORDER IN XCEL'S 2024 INTEGRATED RESOURCE PLAN (DOCKET NO. E002/RP-24-67)?

The Department has reviewed the Company's filing and finds that Xcel has procedurally filed the requirements of Order Point No. 23 in the 2024 IRP Order by providing the required evaluations and discussions. The Department's analysis of each sub-point, along with recommendations, is provided below.

The Company submitted the Petition in compliance with the 2024 IRP Order, which states:

> Xcel must file a Distributed Capacity Procurement (DCP) proposal by October 3, 2025. The filing must include:
>
> > a. An evaluation of how the Distributed Capacity Procurement program could be used to improve equity.
> >
> > b. A discussion of how the proposal impacts the Five-Year Action Plan approved in this order, how it impacts the IRP forecasted annual distributed generation solar additions, and whether the DCP could be used to advance compliance with the distributed solar energy standard.

[39] Petition at 2.
[40] Petition at 38.

c. An evaluation of a costs and benefits comparison between a utility-owned and managed DCP model and alternative models allowing participation from customer-owned and third-party-owned resources.

d. An evaluation of the labor standards utilized by Xcel and third-party solar installers.

C.1. Equity

The 2024 IRP Order required 'An evaluation of how the Distributed Capacity Procurement program could be used to improve equity.' The Company provided an evaluation in Section X of its Petition, outlines strategies to advance equity. These include targeting some battery deployments in underserved communities, providing direct financial benefits (host payments) to a diverse range of sites including non-profits or public facilities in EJ communities, and prioritizing diverse hiring and contracting in program implementation.

The Department finds the Company has procedurally met the requirement by providing the evaluation. The Department supports these commitments as a positive step. However, these commitments require refinement and transparent, quantifiable tracking to ensure that the program's benefits are measurably and equitably shared with Minnesota's EJ and low-income communities. While the Department finds the Company has procedurally met the completeness requirement, we caution against the presumption that siting infrastructure within an EJ area is inherently a benefit.

Historically, disadvantaged communities have borne a disproportionate share of the state's industrial and energy infrastructure. The Department is concerned that targeting these areas for large-scale BESS deployment, without robust community consent, risks reinforcing the stigma of these neighborhoods serving as industrial hubs rather than residential communities. A large BESS brings could potentially raise concerns regarding noise, visual aesthetics, and fire safety perceptions.

Therefore, the Department recommends the Commission direct the Company to refine its approach. Tracking progress must go beyond counting the megawatts sited in EJ areas—a metric that could perversely incentivize overburdening these communities. Instead, the company should track and report on specific, quantifiable equity metrics in its program reports. Quantifiable equity metrics could include the percentage of subcontracting dollars awarded to MWBE and evidence that host communities in EJ areas have been actively consulted regarding site aesthetics and safety, ensuring the project is viewed as a community asset.

C.2. Impact on the Five-Year Action Plan

The 2024 IRP Order requires "A discussion of how the proposal impacts the Five-Year Action Plan approved in this order […]." The Company's filing discusses how Capacity*Connect is a core component of executing Five-Year Action Plan approved in the IRP. Specifically, the 200 MW of distributed storage

will contribute directly toward the IRP's approved target of adding 600 MW of battery storage by the end of 2030.
The Department finds that the Company has adequately addressed this requirement. The proposal clearly aligns with the 2024 IRP Order's objective to "advance innovative new carbon free generating technology, including a virtual power plant." This program represents a foundational step in meeting the 600 MW storage mandate set forth in the approved plan. The Department recommends the Commission find that Xcel has fulfilled this filing requirement.

C.3. Impact on IRP forecasted annual distributed generation solar additions

The 2024 IRP Order required a discussion of "how the [DCP] impacts the IRP forecasted annual distributed generation solar additions […]." The Company notes that Phase 2 of the Capacity*Connect program is focused exclusively on battery storage, not solar generation. Therefore, the program does not directly impact or change the IRP's forecasted annual additions for distributed solar.

The Department finds this discussion procedurally fulfills the filing requirement by directly addressing the question. The Department also note that, as discussed previously, the indirect impact of the program could be beneficial to future solar additions. By strategically siting these batteries to mitigate grid constraints (e.g., Daytime Minimum Load issues), the program could increase hosting capacity on certain feeders, thereby enabling more distributed solar to interconnect in the future a lower cost.

The Department finds the Company has fulfilled this filing requirement.

C.4. Using DCP as compliance with DSES

The 2024 IRP Order required a discussion of "whether the DCP could be used to advance compliance with the distributed solar energy standard." The Company clarifies that because Phase 2 of the DCP is battery-only, it cannot be used directly for compliance with the DSES, which is specific to solar generation. However, the Company states that the DCP framework is flexible and could be expanded in future phases to include solar or solar-plus-storage procurements, which could then potentially be used to advance DSES compliance.

The Department finds this to be a reasonable and complete response. The Department, in section B.4 (Table 2), proposed a potential implementation pathway to meet DSES goals within the modified Phase 2.

The Department recommends the Commission find that Xcel has fulfilled the filing requirement. The Department further recommend the Commission direct Xcel to include in the Department proposed third-party evaluation a specific analysis of how a future phase of the DCP could be structured to incorporate solar or solar-plus-storage to help meet the state's DSES goals.

C.5. Cost-Benefit Analysis

The 2024 IRP order requires the Petition to have 'An evaluation of a costs and benefits comparison between a utility-owned and managed DCP and alternative models allowing participation from customer-owned and third-party owned resources.'

C.5.1. Baseline CBA

The Petition is the utility-owned and managed model. The CBA, provided in Attachment C, quantifies the primary value streams for the utility-owned and operated model, including system capacity value, energy arbitrage, and the deferral of T&D infrastructure.

C.5.2. Different Ownership Models

In compliance with the 2024 IRP Order, the Company provided a comparative evaluation in Section E of the Petition. The Company argues that a utility-owned model is necessary to ensure strategic deployment and full operational control. Xcel asserts that third-party ownership introduces distinct "safety risks for [its] employees and the public" and potential "cybersecurity risks," arguing that anything less than full utility visibility compromises system reliability.[41] The Company further distinguishes the Capacity*Connect program as a VPP designed to meet system-wide needs, contrasting it with customer-owned behind-the-meter resources which are used primarily for individual customer resilience.

While the Company notes that third parties may still participate as vendors for equipment procurement and construction, it concludes that utility ownership is required to strictly align asset operation with market signals and equity objectives.

The Department acknowledges the Company's position that utility ownership facilitates a more streamlined deployment for this initial phase. However, the Department cautions against accepting the Company's assertion that third-party ownership inherently creates unmanageable safety or cybersecurity risks. While the Department accepts the utility-owned model for this specific pilot to accelerate learning, the "safety" and "complexity" arguments should not serve as a permanent justification to exclude third-party ownership in future phases. As noted in the Department's recommendations, this pilot should inform, not preclude, future competitive solicitations.

The Department finds that the Company has procedurally fulfilled the Commission's directive by performing and presenting this comparative evaluation. The Department further recommends the Commission state in its Order that learnings from Phase 2 should be used to inform the development of future competitive programs. The Department recommends directing the Company to include in the Department proposed third-party evaluation a discussion of potential models for a "Phase 3" that could incorporate third-party owned resources and competitive solicitations. This ensures the pilot serves as a foundation for, and not a barrier to, a future competitive DER market, consistent with the trend of FERC Order 2222.

C.6. Evaluation of the labor standards

The 2024 IRP Order requires the DCP Petition to include "an evaluation of the labor standards utilized by Xcel and third-party solar installers." The Company provided this evaluation in the "Labor Standards" in Section VI of the Petition.[42] Xcel confirms that all construction within the Capacity*Connect program will

[41] Petition at 42.
[42] Petition at 48.

comply with labor requirements to maximize federal Investment Tax Credits (ITC) under the Inflation Reduction Act (IRA). Additionally, the Company highlights its use of collective bargaining agreements and contrasts this with the variable labor standards of third-party installers, noting that while some programs like Community Solar Gardens have statutory prevailing wage requirements, others may not absent specific contracts.

The Department finds that the Company has provided a thorough evaluation that directly addresses the 2024 IRP Order. The Company sufficiently detailed its own standards and provided a reasonable comparison to the general market, noting that third-party standards vary significantly where not mandated by statute or contract. The Department recommends the Commission find that Xcel has fulfilled the filing requirement. To ensure these stated standards are realized in practice, the Department recommends that the Commission direct the Company to include auditable reporting on its compliance with these labor standards (specifically regarding prevailing wage and apprenticeship utilization) in its quarterly program updates.

*D. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S PROPOSED IMPLEMENTATION OF A GRID DERMS USE CASE TO SUPPORT CAPACITY*CONNECT?*

The Department recommends that the Commission approve the Company's proposed implementation of a limited Grid DERMS, subject to the modifications detailed below.

The Grid DERMS investment is a foundational and necessary component for the technical success of the Capacity*Connect program. Xcel states that:

> the integration of Grid DERMS (GDERMS) with Aggregator DERMS (ADERMS) represents a critical component of our long-term strategic vision to enable dynamic resource optimization and enhanced grid flexibility. This integration is contingent upon a comprehensive understanding of relevant uses, development of technical requirements, and the evolution of technology, and industry standards. [43]

However, this approval must be conditioned on ensuring the platform is designed with an open architecture that supports future interoperability. This condition ensures the DERMS investment, which is funded by all ratepayers, serves as 'platform' for future innovation rather than a barrier to entry for third-party participation in the FTM distributed services market.

D.1. Budget

The Company requests a budget of approximately $2.9 million for this initial, limited Grid DERMS deployment. The proposed cost is included within the total program budget cap.

The Department finds this $2.9 million budget to be reasonable and believes that the investment is not merely an ancillary component, but rather an essential operating system required to manage, dispatch, and optimize the fleet of distributed batteries for bulk system benefits. Without this platform, the

[43] Xcel's response to DOC IR 6, see Attachment A.3.

Company cannot safely, reliably, or effectively coordinate the assets to provide system-wide capacity, which is the program's primary objective. Therefore, the Department supports this budget as a prudent and necessary investment to enable the core functionality of the Capacity*Connect program. The Department recommends that the Commission approve the Company's proposed $2.9 million implementation of a limited Grid DERMS, subject to a critical modification.

D.2. Proposed use cases

The Company has proposed three initial use cases for this DERMS deployment: 1) Flexible Interconnection (FI), 2) Flexible Energization (FE), and 3) Distributed Capacity Procurement (DCP)--Capacity*Connect. The Department finds these use cases to be appropriate and strategically important for the future of the grid.

The DCP use case is the (current or first) primary justification, enabling the aggregation and dispatch of the Company's FTM battery fleet to meet system needs. The FI and FE use cases are equally critical. They serve as pilots for advanced grid management functions that will be necessary to manage a grid with high penetration of distributed resources. Specifically, the FI use case is designed to test a framework for managing grid constraints, which could ultimately lower interconnection costs and timelines for all DER developers.

While the Department supports these use cases, the implementation of foundational, ratepayer funded control platform raises significant long-term market considerations. The Commission's 2024 IRP Order explicitly required the Company to evaluate alternative ownership models, and the Commission has a clear interest in fostering a competitive DER market, consistent with the direction of federal policy in FERC 2222.

The primary concern is that the current version of DERMS, if designed as a 'closed' or proprietary system, could become a significant technical barrier to entry. The closed DERMS design could effectively prevent third-party FTM resources or aggregators from participating in future distribution-level service markets. Even if the Company does not plan to allow third-party aggregation in this Phase, the technology being deployed must not be allowed to preclude this possibility in the future. The architecture of this system must not create a monopoly for the Company over all future FTM distributed capacity services of this nature.

Therefore, the Department's approval is contingent on ensuring this platform is built for future interoperability. This system must be technically capable of integrating with and managing third-party FTM assets and VPPs, not just the Company's own resources. This contingency ensures the investment in DERMS today serves as true platform for innovation, rather than a technical barrier to a competitive market.

The Department recommends the Commission approve, with modifications, the Company's request to implement the limited Grid DERMS use cases. The Department recommends:

- Approval of the $2.9 million Grid DERMS implementation budget as a reasonable and necessary investment for the operation of the Capacity*Connect program.

- Approve the proposed initial use cases, as critical to the Phase's success and to inform future grid management strategies.
- Modify the approval to require that the Company, as a condition of cost recovery, affirm that the DERMS platform is designed with an open architecture. This architecture must be technically capable of integrating with third-party aggregators and managing third-party-owned FTM DERs. The Company should be required to detail this capability and its plan for enabling such future integration in the Department proposed third-party evaluation.

E. DOES XCEL'S DERMS ROADMAP IN ATTACHMENT D OF THE PROPOSAL FULFILL ORDER POINT 23 OF THE COMMISSION'S SEPTEMBER 16, 2024 ORDER IN XCEL'S 2023 INTEGRATED DISTRIBUTION PLAN (DOCKET NO. E002/M-23-452)?

The Department has reviewed Attachment D, the Company's DERMS Roadmap, and finds that it fulfills the directives of Order Point 23 from 2023 IDP Order.[44] The Department finds that the Company has adequately addressed each of the eight sub-questions from the 2023 IDP Order.

The Department concurs with Commission staff that the broader, system-wide implications of this roadmap are best deferred to the Company's 2025 IDP proceeding.[45] For the purposes of this docket, the roadmap filing is sufficient to support the limited, $2.9 million Grid DERMS deployment requested specifically to enable the Capacity*Connect program. The 2023 IDP Order states:

> Xcel shall file a detailed roadmap for DERMS deployment that addresses the questions provided below. Xcel must adequately address these questions before any DERMS investments will be approved. The roadmap and answered questions shall be filed in Xcel's 2025 IDP, or at the time of request for certification or cost recovery for any DERMS investments, whichever is sooner.
>
> Questions to address:
>
> A) What are the alternatives to DERMS?
>
> B) What are the specific use cases for which DERMS will be utilized and who are the intended beneficiaries?
>
> C) Will participation in DER Management be voluntary or required? Will requirements vary based on resource size, resource type, program participation, market participation, or other factors? Will it be available for load interconnections (e.g., EV charging hubs) or interconnections utilizing limited import/export control systems?

[44] *In the Matter of Xcel Energy's 2023 Integrated Distribution Plan*, Xcel Energy, Order Accepting 2023 Integrated Distribution Plan and Modifying Reporting Requirements, September 16, 2024, Docket No. E002/M-23-452, (eDockets) 20249-210223-01, (hereinafter "2023 IDP Order").
[45] Notice at 2.

D) How will communications be established between Xcel's DERMS and customer DER? Who will bear the ongoing cost for any necessary communications infrastructure?

E) How will capacity be allocated across new and existing managed and unmanaged interconnectors? How will capacity upgrades be justified and from whom will upgrade costs be recovered?

F) How will prospective applicants understand the impact of DER management on the economics of their project? What information will be provided to prospective interconnectors related to expected curtailment and existing and expected grid conditions?

G) What are the expected deployment and integrations costs for DERMS? What is the expected ongoing licensing, operating, and infrastructure costs to execute and maintain DERMS functionality? From whom will these costs be recovered?

H) How are equity and energy justice principles being incorporated within the use cases, process design, and cost allocation?

The Company's roadmap addresses the specific questions from the 2023 IDP Order, as follows:

A) What are the alternatives to DERMS?

The roadmap discusses alternatives, such as relying on the existing Advanced Distribution Management System (ADMS) or using more manual processes. The Company concludes, and the Department finds it reasonable, that these alternatives are insufficient to manage the speed, scale, and complexity of actively dispatching a fleet of distributed resources.

B) What are the specific use cases for which DERMS will be utilized and who are the intended beneficiaries?

The roadmap identifies the three specific, limited use cases proposed in the Petition: 1) Flexible Interconnection (FI), 2) Flexible Energization (FE), and 3) Distributed Capacity Procurement (DCP)—Capacity*Connect. The Company identifies the beneficiaries for each: the C*C optimization (a VPP) benefits all customers by providing system capacity and reliability; the FI benefits DER developers by potentially avoiding upgrade costs; and the FE benefits new large load customers (like EV charging hubs) by allowing for quicker interconnection in constrained areas.

C) Will participation in DER Management be voluntary or required? Will requirements vary based on resource size, resource type, program participation, market participation, or other factors? Will it be available for load interconnections (e.g., EV charging hubs) or interconnections utilizing limited import/export control systems?

The roadmap clarifies that participation in DERMS-managed programs, such as FI, will be voluntary for customer-owned DERs.

D) How will communications be established between Xcel's DERMS and customer DER? Who will bear the ongoing cost for any necessary communications infrastructure?

The Company explains that communications between the DERMS platform and the distributed assets will be established using internet or cellular networks. The roadmap indicates that the participating DER owner would generally be responsible for bearing the cost of maintain their side of the communication link.

e) How will capacity be allocated across new and existing managed and unmanaged interconnectors?

The roadmap addresses this question in the context of the new Flexible Interconnection framework. This framework is the proposed method for managing and allocating capacity on the distribution system. It is designed to allow more interconnectors (both new and existing, managed and unmanaged) to share finite grid capacity, thereby deferring or avoiding costly upgrades.

f) How will prospective applicants understand the impact of DER management on the economies of their project?

The Company's roadmap states that information on expected grid conditions and potential curtailment levels for a given location would be provided to applicants during the interconnection study process. This information is intended to allow prospective developers to understand the potential economic impact of opting for flexible, managed interconnection and to make informed project decisions.

g) What are the expected deployment and integration costs for DERMS? From whom will these costs be recovered?

The roadmap provided the expected deployment cost for this initial, limited functionality, which is the $2.9 million requested in this Petition. It also discusses ongoing licensing and operational costs. For cost recovery, the Company identifies potential pathways, including the RES Rider as proposed in the Petition or other mechanism, such as the Energy Conservation and Optimization (ECO) budget.

h) How are equity and energy justice principles being incorporated?

The roadmap confirms that the Company has incorporated equity principles into its DERMS design. This includes stakeholder engagement and specific considerations within the use cases, such as prioritizing outreach for flexible interconnection to developers serving low-income or EJ communities. The Company also notes its intent to apply workforce development criteria and give higher scoring to WMBE during DERMS implementation.

The Department finds that Attachment D provides a comprehensive response to all eight questions posed in the 2023 IDP Order. The Department recommends the Commission find that Xcel has satisfied the compliance requirement of Order Point 23. The Department agrees with Commission Staff's guidance that the broader, system-wide implications of the full DERMS roadmap are best reviewed in the 2025 IDP Docket.

*F. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S REQUEST TO SEEK COST RECOVERY OF CAPACITY*CONNECT AND GRID DERMS COSTS THROUGH ITS RENEWABLE ENERGY STANDARD (RES) RIDER?*

Xcel requests the Commission allow the C*C program Phase 2, specific costs to be recovered through the RES Rider. The Company asserts that C*C Phase 2 and the associated limited Grid DERMS deployment help satisfy the carbon-free requirements of Minn. Stat. § 216B.1691 by integrating renewables, providing capacity that displaces fossil resources, and advancing research into how storage can improve future renewable projects.[46]

The RES rider statute, Minn. Stat. § 216B.1645, subd. 2a, only allows RES rider recovery of costs to satisfy the renewable-energy standards in Minn. Stat. § 216B.1691. Xcel cites Minn. Stat. § 216B.1645, subd. 2a(a)(3) as authorizing cost recovery for storage expenses that advance research and understanding of how storage devices may improve renewable energy projects.[47] However, the Department finds that Phase 2's benefits are not "directly related to a renewable project" as required by the statutory provision. Therefore, the Department does not believe the C*C – Phase 2 in the Petition satisfies this requirement.

In addition, Minn. Stat. § 216B.16, subd. 7e, paragraphs (b)[48] and (c)[49] contemplate a new rate schedule specifically for energy storage system pilot projects.

However, the Department recognizes that there are downsides to creating additional cost recovery filings for a single, pilot storage project. It would not be efficient from a regulatory perspective and could also potentially make customer bills more confusing. For these reasons, and consistent with our recommendation in Docket E002/M-23-119,[50] the Department proposes the same practical compromise.

---

[46] Xcel's response to DOC IR 10, see Attachment A.5.
[47] *Id.*
[48] Minn. Stat. § 216B.16, subd. 7e, paragraph (b) states that a utility may petition the Commission to approve a rate schedule that provides for the automatic adjustment of charges to recover prudently incurred investments, expenses, or costs associated with energy storage system pilot projects approved by the commission under this subdivision. Paragraph (b) also provides certain filing requirements: "the elements listed in section 216B.1645, subdivision 2a, paragraph (b), clauses (1) to (4), and must describe the benefits of the pilot project." The referenced elements are: (1) a description of the facilities for which costs are to be recovered; (2) an implementation schedule for the facilities; (3) the utility's costs for the facilities; (4) a description of the utility's efforts to ensure that costs of the facilities are reasonable and were prudently incurred; and (5) a description of the benefits of the project in promoting the development of renewable energy in a manner consistent with this chapter.
[49] Paragraph (c) of the same statute states the Commission may approve such a rate schedule. Paragraph (c) also states the rate schedule may include the elements listed in section 216B.1645, subdivision 2a, paragraph (a), clauses (1) to (5).
[50] The Commission approved a rate schedule for recovering prudently incurred storage-pilot costs under Minn. Stat. § 216B.16, subd. 7e. However, Xcel was allowed to incorporate these costs into its RES rider petitions and add them to its RES adjustment factor without extra filings or line items on customer bills, as outlined in the Department's May 5, 2023, comments.

For regulatory-review purposes, Xcel shall include prudent C*C and Grid DERMS costs in its annual RES Rider petitions and add these costs into the RES Adjustment Factor, creating a successor Adjustment Factor that operates identically to the current one except that it also includes approved C*C costs. At the same time, Xcel shall establish a new rate schedule pursuant to Minn. Stat. § 216B.16, subd. 7e. This approach would satisfy the statutory requirement for a separate schedule while imposing no additional regulatory filings and no additional line items on customer bills.

The Department requests that Xcel include the required tariff language and successor Adjustment Factor proposal in its Reply Comments or specifically identify where all elements required by Minn. Stat. § 216B.16, subd. 7e(b) are already provided in the record.

In summary, the Department recommends the Commission authorize future cost recovery of the C*C Program Phase 2 through the RES Rider, subject to Commission review and approval of specific costs to be presented by the Company in a future petition.

G. ARE THERE OTHER ISSUES OR CONCERNS RELATED TO THIS MATTER?

The Department has no other issues or concerns related to this matter at this time.

IV. DEPARTMENT RECOMMENDATIONS

Based on analysis of the Petition and the information in the record, the Department has prepared recommendations, which are provided below. The recommendations correspond to the subheadings of Section III above.

*A. XCEL ENERGY'S DISTRIBUTED CAPACITY PROCUREMENT (DCP), CAPACITY*CONNECT PROPOSAL*

*B. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S PROPOSAL FOR CAPACITY*CONNECT PHASE 2?*

- The Department's overarching recommendation is for the Commission to approve a modified version of the Capacity*Connect proposal.
- B.1. The Department does not make a specific capacity recommendation at this time and will address the appropriate cap in the reply or supplemental phase once the benefits of the resource are better supported.
- B.1.2. The Department recommends the Commission require Xcel to submit supplemental analyses, including sensitivity testing and site-specific cost-benefit updates, prior to full-scale implementation.
- B.2.2. The Department recommends the Commission direct Xcel to evaluate a 'Solar + Storage' Archetype for Phase 3 of the program.
- B.3. The Department recommends the Commission modify the program design to require the initial learning phase deployment to be allocated across three specific siting archetypes, with distinct measures and verification for each.

  - Archetype 1- The Department recommends directing the Company to site a portion of C*C BESS in locations selected to maximize energy market arbitrage value, based on nodal LMP.
  - Archetype 2- The Department recommends directing the Company to site the remaining portion of C*C BESS to address specific, identified distribution reliability issues or to defer planned T&D investments.
  - Archetype 3- The Department recommends directing the Company to site a portion of C*C BESS in locations with documented high penetrations of DERs that are experiencing grid congestion, such as Daytime Minimum Load (DML) issues.
- B.4. The Department recommends the Commission direct Xcel to file a DCP Phase 2 Evaluation Plan within 180 days of Order issuance.
- B.4. The Department recommends the Commission direct the Company to file quarterly program status reports. These reports must include: deployment progress, budget expenditures (including capital and O&M), specific performance data and benefit calculations for each of the three siting archetypes, M&V data validating claimed benefits, performance data for the Grid DERMS platform, and, quantifiable equity metrics.
- B.4. The Department recommends the Commission direct Xcel to conduct a Comprehensive Third-Party Evaluation after 20 MW of capacity is operational or after 2 years of Commission approval, whichever comes first.
- B.6. The Department requests that Xcel provide in its reply comments information on mechanisms to ensure transparency and accountability, as well as market-rate justification for the costs associated with Sparkfund's role, including but not limited to engineering, procurement, and construction services.
- B.7. The Department recommends the Commission direct Xcel to document, in its quarterly reports or IDP updates, the interconnection studies and any distribution upgrades required for each site.
- B.8. The Department recommends the Commission order Xcel to clarify in its annual Integrated Distribution Plan (IDP) filings how these NWA investments are being coordinated with traditional distribution planning and how hosting capacity impacts are being managed to ensure third-party DER programs are not negatively affected.

C. DOES XCEL'S FILING FULFILL ORDER POINT NO. 23 OF THE COMMISSION'S APRIL 21, 2025 ORDER IN XCEL'S 2024 INTEGRATED RESOURCE PLAN?

- C.1. The Department recommends the Commission direct the Company to refine its approach. Tracking progress must go beyond counting the megawatts sited in EJ areas—a metric that could perversely incentivize overburdening these communities. Instead, the company should track and report on specific, quantifiable equity metrics in its program reports.
- C.4. The Department recommends the Commission direct Xcel include in the Department proposed third-party evaluation a specific analysis of how a future phase of the DCP could be structured to incorporate solar or solar-plus-storage to help meet the state's DSES goals.
- C.5.2. The Department finds that the Company has procedurally fulfilled the Commission's directive by performing and presenting this comparative evaluation. The Department further

recommends the Commission state in its Order that learnings from Phase 2 should be used to inform the development of future competitive programs. The Department recommends directing the Company to include in the Department proposed third-party evaluation a discussion of potential models for a "Phase 3" that could incorporate third-party owned resources and competitive solicitations.

- C.6. The Department recommends that the Commission direct the Company to include auditable reporting on its compliance with these labor standards (specifically regarding prevailing wage and apprenticeship utilization) in its quarterly program updates.

*D. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S PROPOSED IMPLEMENTATION OF A GRID DERMS USE CASE TO SUPPORT CAPACITY*CONNECT?*

- The Department recommends that the Commission approve the Company's proposed implementation of a limited Grid DERMS.
- D.1. The Department recommends that the Commission approve the Company's proposed $2.9 million implementation of a limited Grid DERMS, subject to a critical modification.
- D.2. The Department recommends the Commission:
    - Approve the $2.9 million Grid DERMS implementation budget as a reasonable and necessary investment for the operation of the Capacity*Connect program.
    - Approve the proposed initial use cases as critical to the pilot's success and to inform future grid management strategies.
    - Modify the approval to require that the Company, as a condition of cost recovery, affirm that the DERMS platform is designed with an open architecture. This architecture must be technically capable of integrating with third-party aggregators and managing third-party-owned FTM DERs.

E. DOES XCEL'S DERMS ROADMAP IN ATTACHMENT D OF THE PROPOSAL FULFILL ORDER POINT 23 OF THE COMMISSION'S SEPTEMBER 16, 2025 ORDER IN XCEL'S 2023 INTEGRATED DISTRIBUTION PLAN?

- The Department finds that Attachment D provides a comprehensive response to all eight questions posed in the 2023 IDP Order.
- The Department recommends the Commission find that Xcel has satisfied the compliance requirement of that Order.

*F. SHOULD THE COMMISSION APPROVE, MODIFY, OR DENY XCEL'S REQUEST TO SEEK COST RECOVERY OF CAPACITY*CONNECT AND GRID DERMS COSTS THROUGH ITS RENEWABLE ENERGY STANDARD (RES) RIDER?*

- The Department recommends the Commission authorize future cost recovery of the C*C Program—Phase 2 through the RES Rider, subject to Commission review and approval of specific costs to be presented to the Company in a future petition.

- Xcel shall include C*C and Grid DERMS costs in its annual RES Rider petitions and add these costs into the RES Adjustment Factor, creating a successor Adjustment Factor that operates identically to the current one except that it also includes approved C*C costs.
- Xcel shall establish a new rate schedule pursuant to Minn. Stat. § 216B.16, subd. 7e.
- The Department requests that Xcel include the required tariff language and successor Adjustment Factor proposal in its Reply Comments or specifically identify where all elements required by Minn. Stat. § 216B.16, subd. 7e(b) are already provided in the record.

G. ARE THERE OTHER ISSUES OR CONCERNS RELATED TO THIS MATTER?

Appendix

Appendix

Attachments

☐ **Not-Public Document – Not For Public Disclosure**
☐ **Public Document – Not-Public Data Has Been Excised**
☒ **Public Document**

Xcel Energy		Information Request No.	3
Docket No.:	E002/M-25-378		
Response To:	Minnesota Department of Commerce		
Requestor:	Bhavin Pradhan, Andrew Bahn, Steve Rakow, Cuong Ngo		
Date Received:	October 29, 2025		

Question:
Topic:
Reference(s):

Please explain how Xcel Energy will ensure that Capacity*Connect asset deployment does not negatively impact hosting capacity available for other customer-sited or third-party-owned Distributed Energy Resources (DER) projects on the same distribution circuits.

Response:
By siting and operating the Capacity*Connect assets strategically, we aim to minimize negative impact on hosting capacity, which is largely determined by solar photovoltaic (PV) generation today. That said, as always, we must plan and operate the system safely and reliably, and there is a maximum amount of generation and load that can be added to existing feeders and substations. In the future, the addition of Capacity*Connect BESS may ultimately impact the hosting capacity on certain areas of the distribution system.[1] The extent of this potential impact will depend on how we account for these sites in our system planning and DER interconnection studies, and how we are able to operate the assets for various use cases.

Capacity*Connect is designed to provide value to the bulk system, and by siting the assets strategically, we will seek to realize distribution benefits as well. Unlike third-party-owned DER, which have not to-date been planned or located for the benefit of our customers as a whole, the resources in the Capacity*Connect program will be planned by the Company and procured by the Company for the benefit of the overall system and our customers. Through this program, the Company is seeking to more fully utilize DER to increase the value to the distribution and bulk systems and Xcel Energy customers. Capacity*Connect is an important step as the Company seeks to better optimize the locational value of DER.

[1] Existing DER customers who already have an interconnection agreement should remain unaffected by Capacity*Connect.

Likewise, we aim to operate the batteries in ways that help reduce negative impacts. For example, charging during off-peak hours and discharging in ways that avoids overloading feeders/substations in reverse direction. DERMS has capabilities to support this kind of operation. As the Company gains experience deploying and operating these assets, we will learn more about the impact to and benefits on the system.

In summary, there are planning and operational strategies we can leverage to mitigate these impacts.

Preparer:	Brenda McDermott
Title:	Sr. Director
Department:	Distribution System Planning
Telephone:	(763) 493-1513
Date:	November 12, 2025

☐ **Not-Public Document – Not For Public Disclosure**
☐ **Public Document – Not-Public Data Has Been Excised**
☒ **Public Document**

Xcel Energy		Information Request No.	4
Docket No.:	E002/M-25-378		
Response To:	Minnesota Department of Commerce		
Requestor:	Bhavin Pradhan, Andrew Bahn, Steve Rakow, Cuong Ngo		
Date Received:	October 29, 2025		

Question:
Topic:
Reference(s):
Please state whether Xcel Energy has adopted any quantifiable targets for siting or contracting Capacity*Connect projects in designated Environmental Justice (EJ) communities, specifically the number of sites, MW capacity, and total host payment percent. If yes, list them and the underlying criteria; if no, explain the rationale.

Response:
While benefits to EJ communities are a priority, as discussed in the Petition, the Company has not established specific quantitative targets for siting or contracting Capacity*Connect projects in EJ communities. The siting of Capacity*Connect assets will balance system needs and benefits with EJ considerations, and it would be premature to set specific targets prior to feeder selection. After feeders are identified through the process discussed in Section III.A of the Petition, we will prioritize outreach and marketing to potential site hosts in EJ areas, minority- and women-owned business enterprises, and/or nonprofits, community centers, or similar organizations, where such information is publicly available.

The Company also intends to be responsive to customer, community, and stakeholder feedback throughout the process. As the feeder identification and site host outreach begins and progresses, we will learn more about how customers – including those in EJ communities – view Capacity*Connect and how it could benefit them. We may find we need to make adjustments to our approach to outreach, host payments, or other elements of the Capacity*Connect program design.

Preparer:	Karin Haas	Jessica Kelleher
Title:	Regulatory Policy Specialist	Manager
Department:	NSPM Regulatory	Commercialization
Telephone/E-mail:	(612) 216-5690	jessica.a.kelleher@xcelenergy.com
Date:	November 10, 2025	November 10, 2025

PUBLIC DOCUMENT
NOT-PUBLIC DATA HAS BEEN EXCISED

☐ **Not-Public Document – Not For Public Disclosure**
☒ **Public Document – Not-Public Data Has Been Excised**
☐ **Public Document**

Xcel Energy		Information Request No.	6
Docket No.:	E002/M-25-378		
Response To:	Minnesota Department of Commerce		
Requestor:	Bhavin Pradhan, Andrew Bahn, Steve Rakow, Cuong Ngo		
Date Received:	October 29, 2025		

Question:
Topic:
Reference(s):

Please:

A. describe all **[BEGIN TRADE SECRET** **END TRADE SECRET]** associated with linking the limited Grid DERMS with the Aggregated DERMS and transitioning to the full Enterprise DERMS as described in Attachment D; and
B. provide **[BEGIN TRADE SECRET** **END TRADE SECRET]** for the anticipated costs and integration tasks associated with linking the limited Grid DERMS with the Aggregated DERMS and transitioning to the full Enterprise DERMS as described in Attachment D.

Response:

A. As outlined in Attachment D of our Petition, the integration of Grid DERMS (GDERMS) with Aggregator DERMS (ADERMS) represents a critical component of our long-term strategic vision to enable dynamic resource optimization and enhanced grid flexibility. This integration is contingent upon a comprehensive understanding of relevant use cases, development of technical requirements, and the evolution of technology, and industry standards. The Company will adopt a phased approach to ensure grid safety and reliability while systematically managing risks associated with emerging technologies and evolving business models.

   Due to the ongoing development of these foundational elements, the cost components associated with the DERMS software model, including the full-scale

integration between GDERMS and ADERMS, have not yet been fully defined or quantified.

To support successful integration of GDERMS and ADERMS, we have identified the following key tasks:

- **Use Case Development** – Define and validate specific operational scenarios that require and can benefit from coordination between GDERMS and ADERMS.
- **Standards Alignment** – Monitor and incorporate emerging industry standards to ensure interoperability and compliance.
- **Interface Specification** – Design and document the communication protocols and data exchange formats between systems.
- **System Architecture Design** – Develop a scalable and secure architecture that supports integration across diverse DER platforms.
- **Testing and Validation Framework** – Establish procedures for functional testing, performance benchmarking, and reliability assessment.
- **Cost Modeling and Impact Analysis** – Create a detailed cost model to evaluate software licensing, integration expenses, and long-term operational impacts.

B. Enterprise DERMS is not an off-the-shelf system; rather, we use "Enterprise DERMS" as a broad term used to describe a future system and portfolio that would also include the people and new processes needed to enable a system. The Enterprise DERMS effort would include items such as linking ADERMS and GDERMS, and also the integration of other business systems. Just as utilization of DER changes over time with higher penetration levels and more sophisticated use cases, so would the development and evolution of an enterprise DERMS. The technical requirements, new processes and people resources are still capabilities that need to be examined and prioritized. We expect the cost components for linking GDERMS with ADERMS and transitioning to Enterprise DERMS will fall into the following categories:

- Requirements & Use Case Development
- Software Development & Integration
- Hardware & Infrastructure
- Organizational Change Management
- Testing & Commissioning
- Cost Modeling and Impact Analysis
- New Resources
- Training and Change Management

At this time, the Company does not have cost estimates or specific timing for the integration of GDERMS and ADERMS, nor the ultimate Enterprise DERMS, as these depend on several foundational activities that are in progress.

Taking into consideration the key tasks outlined in Part A above, the Company's Enterprise DERMS should provide for managing all flexible DER resources in a unified view. The integration is not just technical – it involves organizational transformation, market coordination, and risk management. This will involve the evaluation of whether existing software solutions can support DER portfolio management or if custom development is required for enterprise-level DERMS integration. Further, the Company must develop change management plans to align people, processes, and technology. Including training distribution operations staff for new workflows and integrating workflows with market operations.

We do not have specific timing for transitioning to Enterprise DERMS, but anticipate the tasks above to take at least five years for full implementation. Cost recovery mechanism(s) would depend on the final scope, use cases, and timing.

Preparer:	Zach Pollock	Yashar Kenarangui
Title:	Director	Engineering Consultant
Department:	Grid Strategy & Emerging Technologies	Distribution Electric Engineering
Telephone:	(914) 584 -6470	(817) 456-3938
Date:	November 12, 2025	November 12, 2025

PUBLIC DOCUMENT
NOT-PUBLIC DATA HAS BEEN EXCISED

☐ **Not-Public Document – Not For Public Disclosure**
☒ **Public Document – Not-Public Data Has Been Excised**
☐ **Public Document**

Xcel Energy		Information Request No.	7
Docket No.:	E002/M-25-378		
Response To:	Minnesota Department of Commerce		
Requestor:	Bhavin Pradhan, Andrew Bahn, Steve Rakow, Cuong Ngo		
Date Received:	October 29, 2025		

Question:
Topic:
Reference(s):
Provide a detailed cost structure summary of Sparkfund's services, identifying each fee component for:
[BEGIN TRADE SECRET

END TRADE SECRET]

Response:
As noted in our Petition, the Company and Sparkfund are in the process of finalizing commercial agreements. As such, the cost structure, fee components, and fee calculations remain subject to negotiation and refinement. As described on page 15 of the Petition, Sparkfund's role is expected to include aspects of program design; site evaluation, selection, and engagement; procurement and contracting; project delivery; and operations and maintenance.

The Company notes that the budget estimate for Phase 2 set forth in the Petition includes separate estimated costs for program management (including implementation partner fees) and BESS operations and maintenance.

Lastly, we note that the proposed reporting set forth in the Petition provides quarterly program implementation reporting and an Interim Program Assessment filing within

two years. We anticipate that some of the program reporting will include details related to actual spending and cost categories, as the information is available.

Preparer:	Jessica Kelleher
Title:	Manager
Department:	Commercialization
E-mail:	jessica.a.kelleher@xcelenergy.com
Date:	November 10, 2025

☐ **Not-Public Document – Not For Public Disclosure**
☐ **Public Document – Not-Public Data Has Been Excised**
☒ **Public Document**

Xcel Energy		Information Request No.	10
Docket No.:	E002/M-25-378		
Response To:	Minnesota Department of Commerce		
Requestor:	Bhavin Pradhan, Andrew Bahn, Steve Rakow, Cuong Ngo		
Date Received:	November 10, 2025		

Question:
Topic: Cost recovery mechanism.
Reference(s): Petition, pages 50-51.

The RES rider statute, Minn. Stat. § 216B.1645, subd. 2a only allows RES rider recovery of costs to satisfy the RES (Minn. State. § 216B.1691). Please provide a detailed legal analysis justifying why Capacity*Connect-related costs qualify for recovery through the RES Rider, including:

a. Specific statutory language and subsections supporting BESS as a "renewable energy" cost.
b. How Grid DERMS costs tie directly to RES compliance rather than general grid operations.
c. Comparison to alternative recovery mechanisms, including their advantages and disadvantages.

Response:

a-b. Minn. Stat. § 216B.1645 Subd. 2a allows the Commission to approve rider recovery of prudently incurred costs and investments for facilities procured by the utility to satisfy the requirements of Minn. Stat. § 216B.1691. Under Minn. Stat. § 216B.1691, the Company must generate at least 55 percent of its total retail electric sales from renewable energy by 2035, and must generate 80, 90, and 100 percent of its total retail electric sales from carbon-free sources by 2030, 2035, and 2040 respectively.

Section (3) of Minn. Stat. § 216B.1645 Subd. 2a "allows recovery of other expenses incurred that are directly related to a renewable energy project, including expenses for energy storage provided that the utility demonstrates to the commission's satisfaction that the expenses improve project economics, ensure project implementation, advance research and understanding of how storage devices may improve renewable energy projects, or facilitate coordination with the development of transmission necessary to transport energy produced by the project to market."

As explained in the Company's Petition, C*C is designed to support a carbon-free system as required by Minn. Stat. § 216B.1691 by supporting integration, reliability, and optimization of renewable energy resources on the Company's system. Specifically, the Company explained that the C*C BESS projects will be deployed and operated as system assets that can meet energy and capacity needs that may otherwise need to be met with non-renewable, carbon-emitting resources. Moreover, deploying and operating these BESS projects to further the goals of the RES will require limited deployment of a grid DERMS. The DERMS itself will not support general grid operations; rather, the limited grid DERMS deployment will enable dispatch of the C*C BESS assets, which, as explained above, furthers RES goals.

Further, as explained in the Company's Initial Petition, the Company aims to grow the operational capabilities of C*C over time to support future integration of distributed solar. The ability to grow these operational capabilities requires an initial deployment of storage facilities and a DERMS, as contemplated by C*C, so that the Company can learn and better understand how these storage devices may improve renewable energy projects. This will offset the need for carbon-emitting resources and advance research and understanding of how storage devices—in this case, distributed storage devices—may improve renewable energy projects. As a result, the storage and DERMS expenses contemplated in C*C are intended to satisfy the requirements of Minn. Stat. § 216B.1691 and are therefore appropriate for rider recovery under Minn. Stat. § 216B.1645.

c. Recovery of C*C costs and investments through the RES Rider is preferable to other potential recovery mechanisms because it is aligned with Minn. Stat. § 216B.1645, provides transparency for stakeholders and the Company, and is aligned with the State's clean energy and carbon-free objectives. As explained in the Company's Initial Petition, all C*C related costs that are proposed for RES Recovery will be:

- Submitted with supporting documentation, including cost breakdowns and specific activities;
- Reviewed and approved by the Commission, ensuring that only reasonable and prudent costs are passed on to customers; and
- Tracked and reported in each Petition, with updates to the rider rate based on actual expenditures and forecasted needs.

This provides ongoing oversight of these projects to ensure that they are prudent and achieving reasonable benefits for customers, while providing

timely recovery to the Company of expenses incurred to meet Minnesota's RES goals.

Alternatively, the Company could seek recovery of the C*C costs and investments through a general rate case, which may require adjustments in spend to match up with rate case timing.

Preparer:	Ian Dobson
Title:	Lead Assistant General Counsel
Department:	Legal Services
E-mail:	ian.m.dobson@xcelenergy.com
Date:	November 20, 2025

[TRADE SECRET INFORMATION HAS BEEN EXCISED]

	Optimistic Scenario
MISO Energy Value	
MISO Capacity Value	
Capacity Revenue Availability	
Cycle Count	
Capacity Value Escalation	
Social Carbon Value	
Regulatory Cost of Carbon	
Regulatory Cost of CO Beginning Year	
Line Loss Benefits	
Avoided Transmission Benefits	
Transmission Benefit Applicability	
Distribution Benefit Value	
Inflation Applied to Sparkfund Fees	
Distribution Benefit Applicability	
BESS CapEx (1 MW / 4 MWh)	
BESS O&M	
Lease Payments	

[TRADE SECRET INFORMATION HAS BEEN EXCISED]

	2026	**2027**	**2028**	**2029**	**2030**	**2031**	
# of Battery Site Deployments							**Total**
PHASE II							
PHASE II							
Total							

Cost Sensitivity		
Cost/MWh		
Capacity		
Discharge Length		
Total Cost/Battery		

Cycles/Year		
	Benefits	
d.	Production Cost Savings (NPV)	
g.	Capacity / Resource Adequacy	
f.	Avoided Distribution Benefit (NPV)	
h.	Avoided Transmission Line Loss (NPV)	
i.	Avoided Transmission Benefit (NPV)	
	Costs	
a.	Capital Expenses (NPV)	
b.	O&M Expenses (NPV)	
c.	ITC's (NPV)	
	Benefit/Cost Ratio	

Costs	**CapEx**		
	Total Capital Costs:		
	PVRR:		
	Capital		
	O&M		
	ITC's		
	Total		

	Production Cost Savings:	**($MM)**	
	Avoided Distribution Benefit:		**($MM)**

[TRADE SECRET INFORMATION HAS BEEN EXCISED]

Benefits	**Capacity Market Revenue:**		**($MM)**
	Avoided Transmission Line Loss:		**($MM)**
	Avoided Transmission Benefit:		**($MM)**

[TRADE SECRET INFORMATION HAS BEEN EXCISED]

	2026	2027	2028	2029	2030	2031	Total
# of Battery Site Deployments							
PHASE II							
PHASE II							
Total							

Cost Sensitivity		
Cost/MWh		
Capacity		
Discharge Length		
Total Cost/Battery		

Costs	**CapEx**	**($MM)**
	Total Capital Costs:	
	PVRR:	**PVRR ($MM)**
	Capital	
	O&M	
	ITC's	
	Total	

	Production Cost Savings:	**($MM)**	
	Avoided Distribution Benefit:		**($MM)**

	Cycles/Year	
	Benefits	
d.	Production Cost Savings (NPV)	
g.	Capacity / Resource Adequacy	
f.	Avoided Distribution Benefit (NPV)	
h.	Avoided Transmission Line Loss (NPV)	
i.	Avoided Transmission Benefit (NPV)	
	Costs	
a.	Capital Expenses (NPV)	
b.	O&M Expenses (NPV)	
c.	ITC's (NPV)	
	Benefit/Cost Ratio	

[TRADE SECRET INFORMATION HAS BEEN EXCISED]

Benefits

Capacity Market Revenue:		**($MM)**
Avoided Transmission Line Loss:		**($MM)**
Avoided Transmission Benefit:		**($MM)**

CERTIFICATE OF SERVICE

I, Sharon Ferguson, hereby certify that I have this day, served copies of the following document on the attached list of persons by electronic filing, certified mail, e-mail, or by depositing a true and correct copy thereof properly enveloped with postage paid in the United States Mail at St. Paul, Minnesota.

Minnesota Department of Commerce
Public Comments

Docket No. E002/M-25-378

Dated this **10th** day of **December 2025**

/s/Sharon Ferguson

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
1	Steve	Albrecht	steve.albrecht@shakopeedakota.org	Shakopee Mdewakanton Sioux Community		Shakopee Mdewakanton Sioux Community 2330 Sioux Trail NW Prior Lake MN, 55372 United States	Electronic Service		No	M-25-378
2	Jared	Alholinna	jalholinna@grenergy.com	Great River Energy		12300 Elm Creek Boulevard Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
3	Michael	Alpogianis	malpogianis@invenergy.com	Invenergy		1 South Wacker Drive Chicago IL, 60606 United States	Electronic Service		No	M-25-378
4	Gary	Ambach	gambach@slipstreaminc.org	Slipstream, Inc.		8973 SW Village Loop Chanhassen MN, 55317 United States	Electronic Service		No	M-25-378
5	Dennis	Anderson	whatelse@q.com			5295 Anderlie Lane White Bear Lake MN, 55110 United States	Electronic Service		No	M-25-378
6	Keith	Anderson	keith.anderson@shakopeedakota.org	Shakopee Mdewakanton Sioux Community		Shakopee Mdewakanton Sioux Community 2330 Sioux Trail NW Prior Lake MN, 55372 United States	Electronic Service		No	M-25-378
7	Shannon	Anderson	sanderson@solarunitedneighbors.org	Solar United Neighbors			Electronic Service		No	M-25-378
8	Beren	Argetsinger	bargetsinger@keyesfox.com			PO BOX 166 Burdett NY, 14818 United States	Electronic Service		No	M-25-378
9	Katherine	Arnold	katherine.arnold@ag.state.mn.us		Office of the Attorney General - Department of Commerce	445 Minnesota Street Suite 1400 St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
10	Susan	Arntz	sarntz@mankatomn.gov	City Of Mankato		P.O. Box 3368 Mankato MN, 56002-3368 United States	Electronic Service		No	M-25-378
11	Mara	Ascheman	mara.k.ascheman@xcelenergy.com	Xcel Energy		414 Nicollet Mall Fl 5 Minneapolis MN, 55401 United States	Electronic Service		No	M-25-378
12	Ray	Auginaush, Sr.	ray.auginaush@whiteearth-nsn.gov	White Earth Nation		White Earth Tribal Headquarters 35500 Eagle View Road Ogema MN, 56569 United States	Electronic Service		No	M-25-378
13	Mark	Bakk	mbakk@lcp.coop	Lake Country Power		26039 Bear Ridge Drive Cohasset MN, 55721 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
14	Ryan	Barlow	ryan.barlow@lawmoss.com	Moss & Barnett, a Professional Association		150 South Fifth St #1200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
15	Jessica L	Bayles	jessica.bayles@stoel.com	Stoel Rives LLP		1150 18th St NW Ste 325 Washington DC, 20036 United States	Electronic Service		No	M-25-378
16	Daniel	Becchetti	dbecchetti@grenergy.com	Great River Energy		12300 Elm Creek Boulevard Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
17	Todd	Beck	tbeck@grenergy.com			null null, null United States	Electronic Service		No	M-25-378
18	David	Bell	david.bell@state.mn.us		Department of Health	POB 64975 St. Paul MN, 55164 United States	Electronic Service		No	M-25-378
19	Amadeo	Bellino	amadeo.bellino@whiteearth-nsn.gov	White Earth Nation		White Earth Tribal Headquarters 35500 Eagle View Road Ogema MN, 56569 United States	Electronic Service		No	M-25-378
20	David	Bender	dbender@earthjustice.org	Earthjustice		1001 G Street NW Suite 1000 Washington DC, 20001 United States	Electronic Service		No	M-25-378
21	Melanie	Benjamin	melanie.benjamin@millelacsband.com			43408 Oodena Drive Onamia MN, 56359 United States	Electronic Service		No	M-25-378
22	Sasha	Bergman	sasha.bergman@state.mn.us		Public Utilities Commission	121 7th Pl E Ste 350 St. Paul MN, 55101 United States	Electronic Service		Yes	M-25-378
23	Laura	Bishop	laura.bishop@state.mn.us		Minnesota Pollution Control Agency	520 Lafayette Rd Saint Paul MN, 55155 United States	Electronic Service		No	M-25-378
24	Ingrid	Bjorklund	ibjorklund@avisenlegal.com	Avisen Legal		901 S. Marquette Ave. #1675 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
25	Ingrid	Bjorklund	ingrid@bjorklundlaw.com	Bjorklund Law, PLLC		855 Village Center Drive #256 North Oaks MN, 55127 United States	Electronic Service		No	M-25-378
26	Hunter	Boldt	hunterboldt@redlakenation.org	Red Lake Nation		15484 Migizi Drive Red Lake MN, 56671 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
27	Peter	Boney	pboney@boisforte-nsn.gov	Bois Forte Band of Chippewa		Bois Forte Tribal Government 5344 Lakeshore Drive Nett Lake MN, 55772 United States	Electronic Service		No	M-25-378
28	Sheldon	Boyd	sheldon.boyd@millelacsband.com	Mille Lacs Band of Ojibwe		43408 Oodena Drive Onamia MN, 56359 United States	Electronic Service		No	M-25-378
29	Jon	Brekke	jbrekke@grenergy.com	Great River Energy		12300 Elm Creek Boulevard Maple Grove MN, 55369-4718 United States	Electronic Service		No	M-25-378
30	Matthew	Brodin	mbrodin@allete.com	Minnesota Power		30 West Superior Street Duluth MN, 55802 United States	Electronic Service		No	M-25-378
31	B. Andrew	Brown	brown.andrew@dorsey.com	Dorsey & Whitney LLP		Suite 1500 50 South Sixth Street Minneapolis MN, 55402-1498 United States	Electronic Service		No	M-25-378
32	Marvin Ray	Bruneau	marvin.bruneau@millelacsband.com	Mille Lacs Band of Ojibwe		43408 Oodena Drive Onamia MN, 56359 United States	Electronic Service		No	M-25-378
33	Christina	Brusven	cbrusven@fredlaw.com	Fredrikson Byron		60 S 6th St Ste 1500 Minneapolis MN, 55402-4400 United States	Electronic Service		No	M-25-378
34	Scott	Buchanan	scottbuchanan@fdlrez.com	Fond du Lac Band of Lake Superior Chippewa		1720 Big Lake Road Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
35	Shelley	Buck	shelley.buck@piic.org	Prairie Island Indian Community		Prairie Island Indian Community 5636 Sturgeon Lake Road Welch MN, 55089 United States	Electronic Service		No	M-25-378
36	Robert	Budreau	robert.budreau@llojibwe.net	Leech Lake Band of Ojibwe		190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
37	Mike	Bull	mike.bull@state.mn.us		Public Utilities Commission	121 7th Place East, Suite 350 St. Paul MN, 55101 United States	Electronic Service		Yes	M-25-378
38	James	Canaday	james.canaday@ag.state.mn.us		Office of the Attorney General - Residential Utilities Division	Suite 1400 445 Minnesota St. St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
39	Thomas	Carlson	thomas.carlson@edf-re.com	EDF Renewable Energy		10 2nd St NE Ste. 400 Minneapolis	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						MN, 55413 United States				
40	Cathy	Chavers	cchavers@boisforte-nsn.gov	Bois Forte Band of Chippewa		Bois Forte Tribal Government 5344 Lakeshore Drive Nett Lake MN, 55772 United States	Electronic Service		No	M-25-378
41	Joey	Cherney	joey.cherney@ag.state.mn.us		Office of the Attorney General - Residential Utilities Division	445 Minnesota Street STE 1800 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378
42	Marc	Child	mchild@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
43	John	Coffman	john@johncoffman.net	AARP		871 Tuxedo Blvd. St, Louis MO, 63119-2044 United States	Electronic Service		No	M-25-378
44	Generic	Commerce Attorneys	commerce.attorneys@ag.state.mn.us		Office of the Attorney General - Department of Commerce	445 Minnesota Street Suite 1400 St. Paul MN, 55101 United States	Electronic Service		Yes	M-25-378
45	Jean	Comstock	jean.comstock.dbcc@gmail.com	St. Paul 350		729 6th St E St. Paul MN, 55106 United States	Electronic Service		No	M-25-378
46	Water Programs	Coordinator	waterprograms.bwsr@state.mn.us		Minnesota Board of Water and Soil Resources	520 Lafayette Road N St. Paul MN, 55155 United States	Electronic Service		No	M-25-378
47	George	Crocker	gwillc@nawo.org	North American Water Office		5093 Keats Avenue Lake Elmo MN, 55042 United States	Electronic Service		No	M-25-378
48	Rebecca	Crooks Stratton	rebecca.crooks-stratton@shakopeedakota.org	Shakopee Mdewakanton Sioux Community		Shakopee Mdewakanton Sioux Community 2330 Sioux Trail NW Prior Lake MN, 55372 United States	Electronic Service		No	M-25-378
49	Brooke	Cunningham	health.review@state.mn.us	Minnesota Department of Health		PO Box 64975 St. Paul MN, 55164-0975 United States	Electronic Service		No	M-25-378
50	Miyah	Danielson	miyahdanielson@fdlrez.com	Fond du Lac Band of Lake Superior Chippewa		1720 Big Lake Road Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
51	Jason	Decker	jason.decker@llojibwe.net	Leech Lake Band of Ojibwe		190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
52	James	Denniston	james.r.denniston@xcelenergy.com	Xcel Energy Services, Inc.		414 Nicollet Mall, 401-8 Minneapolis MN, 55401 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
53	Bobby	Deschampe	robertdeschampe@grandportage.com	Grand Portage Band of Lake Superior Chippewa		PO Box 428 Grand Portage MN, 55605 United States	Electronic Service		No	M-25-378
54	Kami	Diver	kamidiver@fdlrez.com	Fond du Lac Band of Lake Superior Chippewa		1720 Big Lake Road Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
55	Becky	Dobbs	bdobbs@grenergy.com			null null, null United States	Electronic Service		No	M-25-378
56	Ian M.	Dobson	ian.m.dobson@xcelenergy.com	Xcel Energy		414 Nicollet Mall, 401-8 Minneapolis MN, 55401 United States	Electronic Service		Yes	M-25-378
57	Randall	Doneen	randall.doneen@state.mn.us		Department of Natural Resources	500 Lafayette Rd, PO Box 25 Saint Paul MN, 55155 United States	Electronic Service		No	M-25-378
58	Richard	Dornfeld	richard.dornfeld@ag.state.mn.us		Office of the Attorney General - Department of Commerce	Minnesota Attorney General's Office 445 Minnesota Street, Suite 1800 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378
59	J.	Drake Hamilton	hamilton@fresh-energy.org	Fresh Energy		408 St Peter St Ste 350 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378
60	Shane	Drift	sdrift@boisforte-nsn.gov	Bois Forte Band of Chippewa		Bois Forte Tribal Government 5344 Lakeshore Drive Nett Lake MN, 55772 United States	Electronic Service		No	M-25-378
61	Christopher	Droske	christopher.droske@minneapolismn.gov	Northern States Power Company dba Xcel Energy-Elec		661 5th Ave N Minneapolis MN, 55405 United States	Electronic Service		No	M-25-378
62	Adam	Duininck	aduininck@ncsrcc.org	North Central States Regional Council of Carpenters		700 Olive Street St. Paul MN, 55130 United States	Electronic Service		No	M-25-378
63	Wally	Dupuis	wallydupuis@fdlband.org	Fond du Lac Band of Lake Superior Chippewa		1720 Big Lake Road Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
64	Kevin	Dupuis, Sr.	kevindupuis@fdlrez.com			Reservation Business Committee 1720 Big Lake Rd Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
65	Brian	Edstrom	briane@cubminnesota.org	Citizens Utility Board of Minnesota		332 Minnesota St Ste W1360 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
66	Jamie	Edwards	jamie.edwards@millelacsband.com	Mille Lacs Band of Ojibwe		43408 Oodena Drive Onamia MN, 56358 United States	Electronic Service		No	M-25-378
67	Michael	Fairbanks	michael.fairbanks@whiteearth-nsn.gov	White Earth Reservation Business Committee		PO Box 418 White Earth MN, 56591 United States	Electronic Service		No	M-25-378
68	Kate	Fairman	kate.fairman@state.mn.us		Department of Natural Resources	Box 32 500 Lafayette Rd St. Paul MN, 55155-4032 United States	Electronic Service		No	M-25-378
69	John	Farrell	jfarrell@ilsr.org	Institute for Local Self-Reliance		2720 E. 22nd St Institute for Local Self-Reliance Minneapolis MN, 55406 United States	Electronic Service		No	M-25-378
70	Annie	Felix Gerth	annie.felix-gerth@state.mn.us			Board of Water & Soil Resources 520 Lafayette Rd Saint Paul MN, 55155 United States	Electronic Service		No	M-25-378
71	Sharon	Ferguson	sharon.ferguson@state.mn.us		Department of Commerce	85 7th Place E Ste 280 Saint Paul MN, 55101-2198 United States	Electronic Service		No	M-25-378
72	Terri	Finn	terri.goggleye@llojibwe.net			null null, null United States	Electronic Service		No	M-25-378
73	Mike	Fiterman	mikefiterman@libertydiversified.com	Liberty Diversified International		5600 N Highway 169 Minneapolis MN, 55428-3096 United States	Electronic Service		No	M-25-378
74	Christine	Fox	cfox@itasca-mantrap.com	Itasca-Mantrap Coop. Electric Assn.		PO Box 192 Park Rapids MN, 56470 United States	Electronic Service		No	M-25-378
75	Lucas	Franco	lfranco@liunagroc.com	LIUNA		81 Little Canada Rd E Little Canada MN, 55117 United States	Electronic Service		No	M-25-378
76	Gary	Frazer	gfrazer@mnchippewatribe.org	Minnesota Chippewa Tribe		PO Box 217 Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
77	Stacey	Fujii	sfujii@grenergy.com	Great River Energy		12300 Elm Creek Boulevard Maple Grove MN, 55369-4718 United States	Electronic Service		No	M-25-378
78	Edward	Garvey	garveyed@aol.com	Residence		32 Lawton St Saint Paul MN, 55102 United States	Electronic Service		No	M-25-378
79	Shannon	Geshick	shannon.geshick@state.mn.us	Minnesota Indian Affairs Council (MIAC)		null null, null United States	Electronic Service		No	M-25-378
80	Allen	Gleckner	gleckner@fresh-energy.org	Fresh Energy		408 St. Peter Street Ste 350 Saint Paul	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						MN, 55102 United States				
81	Todd J.	Guerrero	todd.guerrero@kutakrock.com	Kutak Rock LLP		Suite 1750 220 South Sixth Street Minneapolis MN, 55402-1425 United States	Electronic Service		No	M-25-378
82	Jeffrey	Haase	jhaase@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
83	Hal	Halpern	halhalpern@clpower.com	Cooperative Light & Power		1554 Hwy 2 P0 Box 69 Two Harbors MN, 55616 United States	Electronic Service		No	M-25-378
84	Jeremy	Hamilton	jhamilton@uppersiouxcommunity-nsn.gov	Upper Sioux Community		Upper Sioux Community PO Box 147 Granite Falls MN, 56241 United States	Electronic Service		No	M-25-378
85	David A.	Hansen	hansen@federatedrea.coop	Federated Rural Electric Association		77100 U.S. Highway 71 PO Box 69 Jackson MN, 56143 United States	Electronic Service		No	M-25-378
86	Amy	Hastings	amyh@uppersiouxcommunity-nsn.gov	Upper Sioux Community		5722 Travers Lane PO Box 147 Granite Falls MN, 56241 United States	Electronic Service		No	M-25-378
87	Erik	Hatlestad	erik@cureriver.org			117 1st St Montevideo MN, 56265 United States	Electronic Service		No	M-25-378
88	Kim	Havey	kim.havey@minneapolismn.gov	City of Minneapolis		350 South 5th Street, Suite 315M Minneapolis MN, 55415 United States	Electronic Service		No	M-25-378
89	Philip	Hayet	phayet@jkenn.com	J. Kennedy and Associates, Inc.		570 Colonial Park Drive Suite 305 Roswell GA, 30075-3770 United States	Electronic Service		No	M-25-378
90	Adam	Heinen	aheinen@dakotaelectric.com	Dakota Electric Association		4300 220th St W Farmington MN, 55024 United States	Electronic Service		No	M-25-378
91	Annete	Henkel	mui@mnutilityinvestors.org	Minnesota Utility Investors		413 Wacouta Street #230 St.Paul MN, 55101 United States	Electronic Service		No	M-25-378
92	Kristin	Henry	kristin.henry@sierraclub.org	Sierra Club		2101 Webster St Ste 1300 Oakland CA, 94612 United States	Electronic Service		No	M-25-378
93	Katherine	Hinderlie	katherine.hinderlie@ag.state.mn.us		Office of the Attorney General - Residential Utilities Division	445 Minnesota St Suite 1400 St. Paul MN, 55101-2134 United States	Electronic Service		No	M-25-378
94	Michael	Hoppe	lu23@ibew23.org	Local Union 23, I.B.E.W.		445 Etna Street Ste. 61	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						St. Paul MN, 55106 United States				
95	Ronald	Horman	rhorman@redwoodelectric.com	Redwood Electric Cooperative		60 Pine Street Clements MN, 56224 United States	Electronic Service		No	M-25-378
96	Kari	Howe	kari.howe@state.mn.us		DEED	332 Minnesota St, #E200 1ST National Bank Bldg St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
97	Robbie	Howe	robbie.howe@llojibwe.net	Leech Lake Band of Ojibwe		190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
98	Dean	Hunter	dean.hunter@state.mn.us		Minnesota Department of Labor & Industry	443 Lafayette Rd N St. Paul MN, 55155-4341 United States	Electronic Service		No	M-25-378
99	John	Ihle	ljihle@rrt.net	PlainStates Energy LLC		27451 S Hwy 34 Barnesville MN, 56514 United States	Electronic Service		No	M-25-378
100	Annie	Jackson	cheryl.jackson@whiteearth-nsn.gov	White Earth Nation		White Earth Tribal Headquarters 35500 Eagle View Road Ogemo MN, 56569 United States	Electronic Service		No	M-25-378
101	Faron	Jackson, Sr.	faron.jackson@llojibwe.net			190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
102	Justin	Jahnz	justin.jahnz@ecemn.com	East Central Energy		412 Main Ave N Braham MN, 55006 United States	Electronic Service		No	M-25-378
103	Alan	Jenkins	aj@jenkinsatlaw.com	Jenkins at Law		2950 Yellowtail Ave. Marathon FL, 33050 United States	Electronic Service		No	M-25-378
104	Kevin	Jensvold	kevinj@uppersiouxcommunity-nsn.gov	Upper Sioux Community		PO Box 147 Granite Falls MN, 56241-0147 United States	Electronic Service		No	M-25-378
105	Annette	Johnson	annette.johnson@redlakenation.org	Red Lake Nation		15484 Migizi Drive Red Lake MN, 56671 United States	Electronic Service		No	M-25-378
106	Richard	Johnson	rick.johnson@lawmoss.com	Moss & Barnett		150 S. 5th Street Suite 1200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
107	Sarah	Johnson Phillips	sjphillips@stoel.com	Stoel Rives LLP		33 South Sixth Street Suite 4200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
108	Mark	Kaminski	mark.kaminski@gsa.gov	General Services Administration		1800 F Street NW Washington	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						DC, 20405 United States				
109	Veda	Kanitz	vmkanitz@gmail.com			null null, null United States	Electronic Service		No	M-25-378
110	Jenny	Kartes	jkartes@arrowhead.coop	Arrowhead Electric Cooperative, Inc.(P)		PO Box 39 5401 W Hwy 61 Lutsen MN, 55612 United States	Electronic Service		No	M-25-378
111	David	Kempf	dkempf@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
112	William	Kenworthy	will@votesolar.org			1 South Dearborn St Ste 2000 Chicago IL, 60603 United States	Electronic Service		No	M-25-378
113	Samuel B.	Ketchum	sketchum@kennedy-graven.com	Kennedy & Graven, Chartered		150 S 5th St Ste 700 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
114	Bobby	King	bking@solarunitedneighbors.org	Solar United Neighbors		3140 43rd Ave S Minneapolis MN, 55406 United States	Electronic Service		No	M-25-378
115	Raymond	Kirsch	raymond.kirsch@state.mn.us		Department of Commerce	85 7th Place E Ste 500 St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
116	Frank	Kohlasch	frank.kohlasch@state.mn.us		Minnesota Pollution Control Agency	520 Lafayette Rd N. St. Paul MN, 55155 United States	Electronic Service		No	M-25-378
117	Brian	Kolbinger	brian@beckertownship.org	Becker Township Board		PO Box 248 12165 Hancock St Becker MN, 55308 United States	Electronic Service		No	M-25-378
118	Chad	Konickson	chad.konickson@usace.army.mil	U.S.Army Corps of Engineers		332 Minnesota St. Suite E1500 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378
119	Stacy	Kotch Egstad	stacy.kotch@state.mn.us		MINNESOTA DEPARTMENT OF TRANSPORTATION	395 John Ireland Blvd. St. Paul MN, 55155 United States	Electronic Service		No	M-25-378
120	Kay	Kuhlmann	teri.swanson@ci.red-wing.mn.us	City Of Red Wing		315 West Fourth Street Red Wing MN, 55066 United States	Electronic Service		No	M-25-378
121	Brenda	Kyle	bkyle@stpaulchamber.com	St. Paul Area Chamber of Commerce		401 N Robert Street Suite 150 St Paul MN, 55101 United States	Electronic Service		No	M-25-378
122	Therese	LaCanne	tlacanne@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
123	Matthew	Lacey	mlacey@grenergy.com	Great River Energy		12300 Elm Creek Boulevard	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						Maple Grove MN, 55369-4718 United States				
124	Carmel	Laney	carmel.laney@stoel.com	Stoel Rives LLP		33 South Sixth Street Suite 4200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
125	Arthur	LaRose	arthur.larose@llojibwe.net	Leech Lake Band of Ojibwe		190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
126	Robert L	Larsen	robert.larsen@lowersioux.com	Lower Sioux Indian Community		PO Box 308 39527 Reservation Highway 1 Morton MN, 56270 United States	Electronic Service		No	M-25-378
127	Mark	Larson	mlarson@meeker.coop	Meeker Coop Light & Power Assn		1725 Highway 12 E Ste 100 Litchfield MN, 55355 United States	Electronic Service		No	M-25-378
128	Michelle	Larson	michelle@redwingchamber.com	Red Wing Area Chamber of Commerce		439 Main Street Red Wing, MN Bay Point Park MN, 55066 United States	Electronic Service		No	M-25-378
129	Peder	Larson	plarson@larkinhoffman.com	Larkin Hoffman Daly & Lindgren, Ltd.		8300 Norman Center Drive Suite 1000 Bloomington MN, 55437 United States	Electronic Service		No	M-25-378
130	Amber	Lee	amber.lee@stoel.com	Stoel Rives LLP		33 S. 6th Street Suite 4200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
131	Rachel	Leonard	rachel.leonard@ci.monticello.mn.us	City of Monticello		505 Walnut St Ste 1 Monticello MN, 55362 United States	Electronic Service		No	M-25-378
132	Dan	Lesher	dlesher@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
133	Annie	Levenson Falk	annielf@cubminnesota.org	Citizens Utility Board of Minnesota		332 Minnesota Street, Suite W1360 St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
134	Michelle	Lommel	mlommel@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
135	Alice	Madden	alice@communitypowermn.org	Community Power		2720 E 22nd St Minneapolis MN, 55406 United States	Electronic Service		No	M-25-378
136	Kavita	Maini	kmaini@wi.rr.com	KM Energy Consulting, LLC		961 N Lost Woods Rd Oconomowoc WI, 53066 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
137	Christine	Marquis	regulatory.records@xcelenergy.com	Xcel Energy		414 Nicollet Mall MN1180-07-MCA Minneapolis MN, 55401 United States	Electronic Service		Yes	M-25-378
138	Dawn S	Marsh	dawn_marsh@fws.gov	U.S. Fish & Wildlife Service		Minnesota-Wisconsin Field Offices 4101 American Blvd E Bloomington MN, 55425 United States	Electronic Service		No	M-25-378
139	Emily	Marshall	emarshall@lourismarshall.com	Miller O'Brien Jensen, PA		120 S. 6th Street Suite 2400 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
140	Katherine	Marshall	katie.marshall@lawmoss.com	Moss & Barnett		150 S 5th St Ste 1200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
141	Mary	Martinka	mary.a.martinka@xcelenergy.com	Xcel Energy Inc		414 Nicollet Mall 7th Floor Minneapolis MN, 55401 United States	Electronic Service		No	M-25-378
142	Gregg	Mast	gmast@cleanenergyeconomymn.org	Clean Energy Economy Minnesota		4808 10th Avenue S Minneapolis MN, 55417 United States	Electronic Service		No	M-25-378
143	Shena	Matrious	shena.matrious@millelacsband.com	Mille Lacs Band of Ojibwe		43408 Oodena Drive Onamia MN, 56349 United States	Electronic Service		No	M-25-378
144	Daryl	Maxwell	dmaxwell@hydro.mb.ca	Manitoba Hydro		360 Portage Ave FL 16 PO Box 815, Station Main Winnipeg MB, R3C 2P4 Canada	Electronic Service		No	M-25-378
145	Erica	McConnell	emcconnell@elpc.org	Environmental Law & Policy Center		35 E. Wacker Drive, Suite 1600 Chicago IL, 60601 United States	Electronic Service		No	M-25-378
146	April	McCormick	aprilm@grandportage.com	Grand Portage Band of Lake Superior Chippewa		PO Box 428 Grand Portage MN, 55605 United States	Electronic Service		No	M-25-378
147	Taylor	McNair	taylor@gridlab.org			668 Capp Street San Francisco CA, 94110 United States	Electronic Service		No	M-25-378
148	Ronald	Meier	rmeier@mcleodcoop.com	Mcleod Cooperative Power		3515 11th St East Glencoe MN, 55336 United States	Electronic Service		No	M-25-378
149	Melanie	Mesko Lee	melanie.lee@burnsvillemn.gov	City of Burnsville		100 Civic Center Parkway Burnsville MN, 55337-3867 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
150	Peder	Mewis	pmewis@cleangridalliance.org	Clean Grid Alliance		570 Asbury St. St. Paul MN, 55104 United States	Electronic Service		No	M-25-378
151	Valentina	Mgeni	valentina.mgeni@piic.org	Prairie Island Indian Community		Prairie Island Indian Community 5636 Sturgeon Lake Road Welch MN, 55089 United States	Electronic Service		No	M-25-378
152	Cole W.	Miller	cole.miller@shakopeedakota.org	Shakopee Mdewakanton Sioux Community		Shakopee Mdewakanton Sioux Community 2330 Sioux Trail NW Prior Lake MN, 55372 United States	Electronic Service		No	M-25-378
153	Stacy	Miller	stacy.miller@minneapolismn.gov	City of Minneapolis		350 S. 5th Street Room M 301 Minneapolis MN, 55415 United States	Electronic Service		No	M-25-378
154	David	Moeller	dmoeller@allete.com	Minnesota Power			Electronic Service		No	M-25-378
155	Sarah	Mooradian	sarah@curemn.org	CURE		117 South 1st Street Montevideo MN, 56265 United States	Electronic Service		No	M-25-378
156	Andrew	Moratzka	andrew.moratzka@stoel.com	Stoel Rives LLP		33 South Sixth St Ste 4200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
157	Travis	Morrision	travis.morrison@boisforte-nsn.gov	Bois Forte Band of Chippewa		Bois Forte Tribal Government 5344 Lakeshore Drive Nett Lake MN, 55772 United States	Electronic Service		No	M-25-378
158	David	Morrison, Sr.	david.morrison@boisforte-nsn.gov	Bois Forte Band of Chippewa		Bois Forte Tribal Government 5344 Lakeshore Drive Nett Lake MN, 55772 United States	Electronic Service		No	M-25-378
159	Evan	Mulholland	emulholland@mncenter.org	Minnesota Center for Environmental Advocacy		1919 University Ave W Ste 515 Saint Paul MN, 55101 United States	Electronic Service		No	M-25-378
160	Alan	Muller	alan@greendel.org	Energy & Environmental Consulting		1110 West Avenue Red Wing MN, 55066 United States	Electronic Service		No	M-25-378
161	Sonny	Myers	smyers@1854treatyauthority.org	1854 Treaty Authority		4428 Haines Rd Duluth MN, 55811-1524 United States	Electronic Service		No	M-25-378
162	Pouya	Najmaie	najm0001@gmail.com	Cooperative Energy Futures		3416 16th Ave S Minneapolis	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
						MN, 55407 United States				
163	Carl	Nelson	cnelson@mncee.org	Center for Energy and Environment		212 3rd Ave N Ste 560 Minneapolis MN, 55401 United States	Electronic Service		No	M-25-378
164	Deb	Nelson	dnelson@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
165	David	Niles	david.niles@avantenergy.com	Minnesota Municipal Power Agency		220 South Sixth Street Suite 1300 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
166	Duane	Ninneman	duane@cureriver.org	Clean Up the River Environment		117 South 1st St Montevideo MN, 56265 United States	Electronic Service		No	M-25-378
167	M. William	O'Brien	bobrien@mojlaw.com	Miller O'Brien Jensen, P.A.		120 S 6th St Ste 2400 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
168	Ric	O'Connell	ric@gridlab.org	GridLab		2120 University Ave Berkeley CA, 94704 United States	Electronic Service		No	M-25-378
169	Logan	O'Grady	logrady@mnseia.org	Minnesota Solar Energy Industries Association		2288 University Ave W St. Paul MN, 55114 United States	Electronic Service		No	M-25-378
170	Joseph	OBrien	joey.obrien@lowersioux.com			39527 Highway 1 Morton MN, 56270 United States	Electronic Service		No	M-25-378
171	Carol A.	Overland	overland@legalectric.org	Legalectric - Overland Law Office		1110 West Avenue Red Wing MN, 55066 United States	Electronic Service		No	M-25-378
172	Gregory	Padden	gpadden@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
173	Jessica	Palmer Denig	jessica.palmer-denig@state.mn.us		Office of Administrative Hearings	600 Robert St N PO Box 64620 St. Paul MN, 55164 United States	Electronic Service		No	M-25-378
174	Marsha	Parlow	mparlow@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
175	Priti	Patel	ppatel@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369-4718 United States	Electronic Service		No	M-25-378
176	Earl	Pendleton	earl.pendleton@lowersioux.com	Lower Sioux Indian Community		39527 Highway 1 Morton MN, 56270 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
177	Gordon	Pietsch	gpietsch@grenergy.com	Great River Energy		12300 Elm Creek Blvd. Maple Grove MN, 55369-4718 United States	Electronic Service		No	M-25-378
178	Joe	Plumer	joe.plumer@redlakenation.org	Red Lake Nation		15484 Migizi Drive Red Lake MN, 56671 United States	Electronic Service		No	M-25-378
179	J.	Porter	greg.porter@nngco.com	Northern Natural Gas Company		1111 South 103rd St Omaha NE, 68124 United States	Electronic Service		No	M-25-378
180	Brian H.	Potts	brian.potts@huschblackwell.com	Husch Blackwell		33 E Main St Ste 300 Madison WI, 53703 United States	Electronic Service		No	M-25-378
181	Kevin	Pranis	kpranis@liunagroc.com	Laborers' District Council of MN and ND		81 E Little Canada Road St. Paul MN, 55117 United States	Electronic Service		No	M-25-378
182	Robert	Prescott	bob.prescott@lowersioux.com	Lower Sioux Indian Community		39527 Highway 1 Morton MN, 56270 United States	Electronic Service		No	M-25-378
183	Jody	Puddu	jody.puddu@piic.org	Prairie Island Indian Community		5636 Sturgeon Lake Rd Welch MN, 55089 United States	Electronic Service		No	M-25-378
184	Kurt	Rempe	krempe@nationalgridrenewables.com	National Grid Renewables Development, LLC		8400 Normandale Lake Blvd Suite 1200 Bloomington MN, 55437 United States	Electronic Service		No	M-25-378
185	Generic Notice	Residential Utilities Division	residential.utilities@ag.state.mn.us		Office of the Attorney General - Residential Utilities Division	1400 BRM Tower 445 Minnesota St St. Paul MN, 55101-2131 United States	Electronic Service		Yes	M-25-378
186	Kevin	Reuther	kreuther@mncenter.org	MN Center for Environmental Advocacy		26 E Exchange St, Ste 206 St. Paul MN, 55101-1667 United States	Electronic Service		No	M-25-378
187	Stephan	Roos	stephan.roos@state.mn.us		Minnesota Department of Agriculture	625 Robert St N Saint Paul MN, 55155-2538 United States	Electronic Service		No	M-25-378
188	Alan	Roy	alan.roy@whiteearth-nsn.gov	White Earth Nation		White Earth Tribal Headquarters 35500 Eagle View Road Ogema MN, 56569 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
189	Bill	Rudnicki	bill.rudnicki@shakopeedakota.org	Shakopee Mdewakanton Sioux Community		Shakopee Mdewakanton Sioux Community 2330 Sioux Trail NW Prior Lake MN, 55372 United States	Electronic Service		No	M-25-378
190	Nathaniel	Runke	nrunke@local49.org			611 28th St. NW Rochester MN, 55901 United States	Electronic Service		No	M-25-378
191	Zachary	Ruzycki	zruzycki@grenergy.com	Great River Energy		12300 Elm Creek Boulevard Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
192	Miranda	Sam	miranda.sam@lowersioux.com	Lower Sioux Indian Community		39527 Reservation Highway 1 PO Box 308 Morton MN, 56270 United States	Electronic Service		No	M-25-378
193	Joseph L	Sathe	jsathe@kennedy-graven.com	Kennedy & Graven, Chartered		150 S 5th St Ste 700 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
194	Adam	Savariego	adams@uppersiouxcommunity-nsn.gov	Upper Sioux Community		5722 Travers Lane PO Box 147 Granite Falls MN, 56241 United States	Electronic Service		No	M-25-378
195	Richard J.	Savelkoul	rsavelkoul@martinsquires.com	Martin & Squires, PA		332 Minnesota St Ste W2750 St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
196	Jeff	Schneider	jeff.schneider@ci.red-wing.mn.us	City of Red Wing		315 West 4th Street Red Wing MN, 55066 United States	Electronic Service		No	M-25-378
197	Peter	Scholtz	peter.scholtz@ag.state.mn.us		Office of the Attorney General - Residential Utilities Division	Suite 1400 445 Minnesota Street St. Paul MN, 55101-2131 United States	Electronic Service		No	M-25-378
198	Ronald J.	Schwartau	rschwartau@noblesce.com	Nobles Electric Cooperative		22636 U.S. Hwy. 59 Worthington MN, 56187 United States	Electronic Service		No	M-25-378
199	Douglas	Seaton	doug.seaton@umwlc.org	Upper Midwest Law Center		8421 Wayzata Blvd Ste 300 Golden Valley MN, 55426 United States	Electronic Service		No	M-25-378
200	Jessie	Seim	jessie.seim@piic.org	Prairie Island Indian Community		5636 Sturgeon Lake Rd Welch MN, 55089 United States	Electronic Service		No	M-25-378
201	Darrell	Seki, Sr.	dseki@redlakenation.org			15484 Migizi Drive Red Lake MN, 56671 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
202	Janet	Shaddix Elling	jshaddix@janetshaddix.com	Shaddix And Associates		7400 Lyndale Ave S Ste 190 Richfield MN, 55423 United States	Electronic Service		No	M-25-378
203	Andrew R.	Shedlock	andrew.shedlock@kutakrock.com	Kutak Rock LLP		60 South Sixth St Ste 3400 Minneapolis MN, 55402-4018 United States	Electronic Service		No	M-25-378
204	Beth	Smith	bsmith@greatermankato.com	Greater Mankato Growth		1961 Premier Dr Ste 100 Mankato MN, 56001 United States	Electronic Service		No	M-25-378
205	Joel	Smith	jsmith@mnchippewatribe.org	Minnesota Chippewa Tribe		PO Box 217 Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
206	Joshua	Smith	joshua.smith@sierraclub.org			85 Second St FL 2 San Francisco CA, 94105 United States	Electronic Service		No	M-25-378
207	Ken	Smith	ken.smith@districtenergy.com	District Energy St. Paul Inc.		76 W Kellogg Blvd St. Paul MN, 55102 United States	Electronic Service		No	M-25-378
208	Nizhoni	Smith	nizhoni.smith@lowersioux.com	Lower Sioux Indian Community		PO Box 308 39527 Reservation Highway 1 Morton MN, 56270 United States	Electronic Service		No	M-25-378
209	Roger	Smith, Sr.	rogermsmithsr@fdlrez.com			1720 Big Lake Road Cloquet MN, 55720 United States	Electronic Service		No	M-25-378
210	Beth	Soholt	bsoholt@cleangridalliance.org	Clean Grid Alliance		570 Asbury Street Suite 201 St. Paul MN, 55104 United States	Electronic Service		No	M-25-378
211	Anna	Sommer	asommer@energyfuturesgroup.com	Energy Futures Group		PO Box 692 Canton NY, 13617 United States	Electronic Service		No	M-25-378
212	Marie	Spry	mariespry@grandportage.com			PO Box 428 Grand Portage MN, 55605 United States	Electronic Service		No	M-25-378
213	Mark	Spurr	mspurr@fvbenergy.com	International District Energy Association		222 South Ninth St., Suite 825 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
214	Michael	Stalberger	michael.stalberger@blueearthcountymn.gov	Blue Earth County		410 S 5th Street Mankato MN, 56001 United States	Electronic Service		No	M-25-378
215	Sean	Stalpes	sean.stalpes@state.mn.us		Public Utilities Commission	121 E. 7th Place, Suite 350 Saint Paul MN, 55101-2147 United States	Electronic Service		No	M-25-378
216	LeRoy	Staples Fairbanks III	leroy.fairbanks@llojibwe.net	Leech Lake Band of		190 Sailstar Drive NW	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
				Ojibwe		Cass Lake MN, 56633 United States				
217	Byron E.	Starns	byron.starns@stinson.com	STINSON LLP		50 S 6th St Ste 2600 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
218	Mark	Strohfus	mstrohfus@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
219	Samuel	Strong	sam.strong@redlakenation.org	Red Lake Nation		15484 Migizi Drive Red Lake MN, 56671 United States	Electronic Service		No	M-25-378
220	Timothy	Sullivan	tsullivan@whe.org	Wright Hennepin Coop. Electric Assn.		6800 Electric Drive PO Box 330 Rockford MN, 55373 United States	Electronic Service		No	M-25-378
221	David	Sunderman	daves@benco.org	BENCO (DUPLICATE)		PO Box 8 Mankato MN, 56002-0008 United States	Electronic Service		No	M-25-378
222	Camille	Tanhoff	kamip@uppersiouxcommunity-nsn.gov	Upper Sioux Community		5722 Travers Lane PO BOX 147 Granite Falls MN, 56241 United States	Electronic Service		No	M-25-378
223	Tim	Thompson	tthompson@lrec.coop	Lake Region Electric Cooperative		PO Box 643 1401 South Broadway Pelican Rapids MN, 56572 United States	Electronic Service		No	M-25-378
224	Geoffrey	Tolley	geoff.tolley@gmail.com			855 Stanley Road Two Harbors MN, 55616-1176 United States	Electronic Service		No	M-25-378
225	Jayme	Trusty	execdir@swrdc.org	SWRDC		2401 Broadway Ave #1 Slayton MN, 56172 United States	Electronic Service		No	M-25-378
226	Caralyn	Trutna	carrie@uppersiouxcommunity-nsn.gov	Upper Sioux Community		Upper Sioux Community P.O. Box 147 Granite Falls MN, 55372 United States	Electronic Service		No	M-25-378
227	Jen	Tyler	tyler.jennifer@epa.gov	US Environmental Protection Agency		Environmental Planning & Evaluation Unit 77 W Jackson Blvd. Mailstop B-19J Chicago IL, 60604-3590 United States	Electronic Service		No	M-25-378
228	Jackie	Van Norman	jvannorman@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
229	Sam	Villella	sdvillella@gmail.com			10534 Alamo Street NE Blaine MN, 55449 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
230	Carla	Vita	carla.vita@state.mn.us	MN DEED		Great Northern Building 12th Floor 180 East Fifth Street St. Paul MN, 55101 United States	Electronic Service		No	M-25-378
231	Julie	Voeck	julie.voeck@nee.com	NextEra Energy Resources, LLC		700 Universe Blvd Juno Beach FL, 33408 United States	Electronic Service		No	M-25-378
232	Amelia	Vohs	avohs@mncenter.org	Minnesota Center for Environmental Advocacy		1919 University Avenue West Suite 515 St. Paul MN, 55104 United States	Electronic Service		No	M-25-378
233	Trent	Waite	twaite@grenergy.com			null null, null United States	Electronic Service		No	M-25-378
234	Cynthia	Warzecha	cynthia.warzecha@state.mn.us	Minnesota Department of Natural Resources		500 Lafayette Road Box 25 St. Paul MN, 55155-4040 United States	Electronic Service		No	M-25-378
235	Julianna	Wei	julianna.wei@rondo.com	Rondo Energy, Inc.		1960 North Loop Alameda CA, 94502 United States	Electronic Service		No	M-25-378
236	Heather	Westra	heather.westra@piic.org	Prairie Island Indian Community		5636 Sturgeon Lake Rd Welch MN, 55089 United States	Electronic Service		No	M-25-378
237	Alan	Whipple	sa.property@state.mn.us		Minnesota Department Of Revenue	Property Tax Division 600 N. Robert Street St. Paul MN, 55146-3340 United States	Electronic Service		No	M-25-378
238	Steve	White	steve.white@llojibwe.net	Leech Lake Band of Ojibwe		190 Sailstar Drive NW Cass Lake MN, 56633 United States	Electronic Service		No	M-25-378
239	Cody	Whitebear	cody.whitebear@piic.org	Prairie Island Indian Community		5636 Sturgeon Lake Road Welch MN, 55089 United States	Electronic Service		No	M-25-378
240	John	Williams	jwilliams@grenergy.com	Great River Energy		12300 Elm Creek Blvd Maple Grove MN, 55369 United States	Electronic Service		No	M-25-378
241	Laurie	Williams	laurie.williams@sierraclub.org	Sierra Club		Environmental Law Program 1536 Wynkoop St Ste 200 Denver CO, 80202 United States	Electronic Service		No	M-25-378
242	Virgil	Wind	virgil.wind@millelacsband.com	Mille Lacs Band of Ojibwe		43408 Oodena Drive Onamia MN, 56359 United States	Electronic Service		No	M-25-378

#	First Name	Last Name	Email	Organization	Agency	Address	Delivery Method	Alternate Delivery Method	View Trade Secret	Service List Name
243	Joseph	Windler	jwindler@winthrop.com	Winthrop & Weinstine		225 South Sixth Street, Suite 3500 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
244	Rob	Witwer	rob.witwer@onwardenergy.com	Onward Energy Holdings, LLC		767 Third Ave 17th Floor New York NY, 10017 United States	Electronic Service		No	M-25-378
245	Jonathan	Wolfgram	jonathan.wolfgram@state.mn.us		Office of Pipeline Safety	445 Minnesota St Ste 147 Woodbury MN, 55125 United States	Electronic Service		No	M-25-378
246	Tim	Wulling	t.wulling@earthlink.net			1495 Raymond Ave. Saint Paul MN, 55108 United States	Electronic Service		No	M-25-378
247	Laurie	York	laurie.york@whiteearth-nsn.gov	White Earth Reservation Business Committee		PO Box 418 White Earth MN, 56591 United States	Electronic Service		No	M-25-378
248	Curtis	Zaun	czaun@mnseia.org	MnSEIA		PO Box 8141 Saint Paul MN, 55108 United States	Electronic Service		No	M-25-378
249	Kurt	Zimmerman	kwz@ibew160.org	Local Union #160, IBEW		2909 Anthony Ln St Anthony Village MN, 55418-3238 United States	Electronic Service		No	M-25-378
250	Emily	Ziring	eziring@stlouispark.org	City of St. Louis Park		5005 Minnetonka Blvd St. Louis Park MN, 55416 United States	Electronic Service		No	M-25-378
251	Patrick	Zomer	pat.zomer@lawmoss.com	Moss & Barnett PA		150 S 5th St #1200 Minneapolis MN, 55402 United States	Electronic Service		No	M-25-378
252	David	Zoppo	david.zoppo@huschblackwell.com	American Transmission Company LLC		33 East Main Street Suite 300 Madison WI, 53703 United States	Electronic Service		No	M-25-378