

Direct Testimony and Schedule  
Laura McCarten

Before the North Dakota Public Service Commission  
State of North Dakota

In the Matter of the Application of Northern States Power Company for an  
Advance Determination of Prudence for a 187 MW Portfolio of Utility Scale Solar  
Resources

Case No. PU-14-\_\_\_\_\_  
Exhibit \_\_\_\_ (LM-1)

**Policy Testimony**

November 7, 2014

**29**    **PU-14-810**    Filed: 5/6/2015    Pages: 15  
**Exhibit NSP 2**

Northern States Power Company

**Case No. PU-14-810**  
**NSP-2**

## TABLE OF CONTENTS

I.	Introduction and Qualifications	1
II.	Proposed Resource Acquisitions	2
III.	Prudence of the Resource Addition	4
IV.	Policy Impacts	5
V.	Resource Planning Impacts	8
VI.	Conclusion	10

### Schedules

Resume

Schedule 1

1 **I. INTRODUCTION AND QUALIFICATIONS**

2

3 Q. PLEASE STATE YOUR NAME AND TITLE.

4 A. My name is Laura McCarten. I am Regional Vice President for Northern  
5 States Power Company (NSP or the Company).

6

7 Q. PLEASE DESCRIBE YOUR QUALIFICATIONS AND EXPERIENCE.

8 A. I am responsible for regulatory, legislative, and customer and community  
9 relations in North Dakota, South Dakota, and Minnesota. I provide strategic  
10 leadership regarding the development and implementation of our initiatives to  
11 cost effectively meet the energy needs of our retail customers and the  
12 communities we serve. My resume is included as Exhibit\_\_\_(LM-1),  
13 Schedule 1.

14

15 Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS PROCEEDING?

16 A. I provide support for our request for an Advance Determination of Prudence  
17 (ADP) for our proposed acquisition of a single portfolio consisting of  
18 187 MW of solar generating resources (Solar Portfolio) for the NSP integrated  
19 System. In my testimony, I:

- 20 • Describe our proposed 187 MW Solar Portfolio;  
21 • Discuss the prudence of the Solar Portfolio;  
22 • Discuss the rate and regulatory impacts; and  
23 • Discuss the impact on our resource plans.

24

25 Q. WHO ARE THE WITNESSES FOR THE COMPANY IN THIS PROCEEDING?

26 A. In addition to my Policy Testimony, the Company sponsors the following  
27 witness:

- 1           • *Kurtis J. Haeger* – who provides more detailed information with respect  
2           to our resource additions and resource planning.  
3

4 Q. PLEASE SUMMARIZE THE COMPANY'S PROPOSED 187 MW SOLAR PORTFOLIO.

5 A. We are proposing to acquire the single 187 MW portfolio comprised of three  
6 solar projects through fixed price power purchase agreements (PPA). Our  
7 proposal will enable us to meet our requirements under Minnesota's Solar  
8 Energy Standards (SES) in the most cost-effective manner while adding clean,  
9 carbon-free y capacity to the NSP System.  
10

## 11                                   II. PROPOSED RESOURCE ACQUISITIONS

12

13 Q. PLEASE DESCRIBE THE COMPANY'S PROPOSED RESOURCE ACQUISITION.

14 A. We are proposing to purchase the energy from three solar projects consisting  
15 of (1) a PPA for the output of the Marshall Solar Project, a 62.25 MW solar  
16 facility to be developed by NextEra and located near Marshall, Minnesota; (2)  
17 a PPA for the output of the MN Solar 1 Project, a 24.75 MW solar facility to  
18 be developed by juwi solar and located near Tracy, Minnesota; and (3) a PPA  
19 for the output of 100 MW North Star Solar project to be developed by  
20 Community Energy Resources and located near North Branch, Minnesota.  
21 We expect all of these projects to begin operation in late 2016.  
22

23 Q. WHY IS THE COMPANY MAKING THESE RESOURCE ADDITIONS?

24 A. We are purchasing energy (and obtaining the associated accredited capacity)  
25 from these resources primarily to comply with the Minnesota SES. The state  
26 of Minnesota recently enacted a law (Minn. Stat. § 216B.1691, subd. 2f(a)-(c))  
27 that requires the Company to serve 1.5 percent of its Minnesota retail

1 customer load with solar energy by 2020, and establishes a 10 percent solar  
2 energy objective for Minnesota by 2030. But the Solar Portfolio will also  
3 allow the Company to avoid additional purchases of natural gas and other  
4 market energy that we would have otherwise needed to obtain to fuel the  
5 production of generation from other resources.

6  
7 To help fulfill our obligations under this new Minnesota law, the Company  
8 initiated a Request for Proposal (RFP) for utility-scale solar resources in April  
9 2014. We received over 100 proposals for over 2,100 MW of solar  
10 photovoltaic (PV) generating resources from 36 developers. The responses  
11 we received provided relatively attractive pricing for solar resources, with 15  
12 projects comprising 630 MW of generating capacity falling at or below our  
13 initial screening threshold of \$85/MWh.

14  
15 The three projects comprising our 187 MW Solar Portfolio were selected  
16 because (1) we need significant solar resources for SES compliance, and (2)  
17 the pricing reflects a 30 percent investment tax credit (ITC). We believe that  
18 purchasing power from the 187 MW Solar Portfolio, combined with  
19 increasing behind-the-meter solar generation and community solar gardens,  
20 will allow us to meet our minimum SES obligations through at least 2030.

21  
22 Q. WHY IS THE COMPANY SEEKING AN ADP FOR RESOURCE ADDITIONS  
23 NECESSARY TO MEET MINNESOTA'S SOLAR ENERGY STANDARDS?

24 A. As the Commission is aware, the Company and its affiliate Northern States  
25 Power Company, a Wisconsin corporation (NSPW) operate a five state  
26 integrated electric system serving customers in ND, SD, MN, WI, and MI.  
27 Through the operation of this integrated system, the energy and capacity

1 provided by the 187 MW Solar Portfolio will be used to serve our customers  
2 in all five of these states. Therefore, a proportional share of the costs of these  
3 solar resources will also be allocated to each of these jurisdictions, if approved  
4 by the respective regulatory bodies. Consequently, we are seeking  
5 Commission approval for these resources pursuant to our commitments to file  
6 applications for ADPs with the Commission when we add resources over  
7 50 MW of size to the integrated system.

8  
9 **III. PRUDENCE OF THE RESOURCE ADDITION**

10  
11 Q. ARE THE PROPOSED RESOURCE ADDITIONS PRUDENT?

12 A. Yes. As a multi-jurisdictional utility, the Company is required to comply with  
13 the laws and policies in all of the states we serve. As mentioned, this 187 MW  
14 Solar Portfolio will help enable us to comply with Minnesota's SES. By  
15 contracting for the output of utility-scale projects that will capture the pricing  
16 benefits of the ITC, the Company has secured reasonably priced resources  
17 that will help meet our SES obligations, have a modest impact on rates, and  
18 provide valuable system energy, fuel hedge value, and environmental  
19 regulation hedge value for the benefit of all our customers in all of the states  
20 we serve. Consequently, acquisition of the 187 MW Solar Portfolio is  
21 prudent.

22  
23 Q. PLEASE SUMMARIZE THE QUALITATIVE BENEFITS OF THE RESOURCE  
24 ADDITIONS.

25 A. Although the proposed 187 MW Solar Portfolio will modestly increase costs  
26 to our customers, these projects will increase the diversity of our resource mix  
27 by providing clean emission free energy, a hedge against volatile natural gas

1 prices and potential environmental regulation. The projects will also provide  
2 accreditable capacity that will help to displace the need for future capacity  
3 resources. The 187 MW Solar Portfolio will also generate Solar RECs (S-  
4 RECs) for our North Dakota customers that may be able to be monetized in  
5 the future as the S-REC market matures. These qualitative benefits partially  
6 offset the modest cost impact of this Solar Portfolio, further demonstrating its  
7 prudence. Company Witness Mr. Kurtis J. Haeger discusses these impacts in  
8 more detail in his Direct Testimony.

9  
10 Q. PLEASE SUMMARIZE THE COST IMPACTS OF THE ACQUISITION OF THE 187 MW  
11 SOLAR PORTFOLIO.

12 A. Based on our analysis (which does not reflect environmental externalities such  
13 as carbon costs), we conservatively estimate that the 187 MW Solar Portfolio  
14 will have a \$14 million system-wide annual present value revenue requirement  
15 (PVRR) impact over the lives of the three projects.

16  
17 The 187 MW Solar Portfolio represents some of the most attractively priced  
18 solar energy available in the region, is cost-effective when the qualitative  
19 impacts and additional capacity of the resources are considered, is required for  
20 Minnesota SES compliance, and is therefore a prudent resource addition. Mr.  
21 Haeger discusses the impact of these projects in more detail in his Direct  
22 Testimony.

#### 23 24 **IV. POLICY IMPACTS**

25  
26 Q. MAY THE COMPANY RECOVER ANY COSTS FOR THE 187 MW SOLAR  
27 PORTFOLIO IN NORTH DAKOTA WITHOUT AN ADP?

1 A. Without approval of an ADP, the Company will not be able to include these  
2 PPAs in the derivation of its monthly Fuel Cost Rider (FCR) rate. As  
3 mentioned above, the Company committed to filing applications for ADPs  
4 for resource additions over 50 MW in our 2008 rate case (Case No. PU-07-  
5 776). Additionally, the Company committed to filing ADP applications in a  
6 timely manner in the Prairie Rose Wind ADP proceeding (Case No. PU-12-  
7 059). Lastly, in the Settlement approved in our most recent rate case (Case  
8 No. PU-12-868) the Company agreed that the ADP process will perform a  
9 gatekeeping function and that no resource acquisition over 50 MW may be  
10 included in the calculation of our FCR without an ADP.

11  
12 The Company is meeting its commitments by filing this ADP Application at  
13 this time. Under the Settlement in our last rate case, the Company may not be  
14 able to recover the full costs of the 187 MW Solar Portfolio through the FCR  
15 without the Commission affirmatively granting an ADP.

16  
17 Q. ARE THE COMPANY'S OBLIGATIONS UNDER THE PPAS CONDITIONED ON  
18 APPROVAL OF THE COMMISSION?

19 A. Yes. All of the relevant agreements contain what is known as a "condition  
20 precedent," which requires that the Commission grant an ADP for each of the  
21 projects *before* the Company is required to perform under the contracts. We  
22 also have the right to waive the condition precedent and move forward with  
23 the projects if all required regulatory approvals are not timely attained.

24  
25 Q. IS THE 187 MW SOLAR PORTFOLIO CONSISTENT WITH NORTH DAKOTA  
26 ENERGY POLICY?

27 A. The Company believes that it is the Commission's role to determine if a

1 particular resource addition is consistent with state energy policy. This ADP  
2 proceeding will provide the Commission an opportunity to review the  
3 proposed resource addition and make such a determination.

4  
5 We do, however, recognize the Commission's continuing concern with the  
6 impact of Minnesota energy policies on our North Dakota customers, due to  
7 the integrated nature of our system. In light of this concern, and consistent  
8 with our commitments in the Settlement of our most recent rate case, the  
9 Company has been working with Commission Staff to develop a Negotiated  
10 Agreement to implement a system "Restack" as contemplated in the  
11 Settlement.

12  
13 The Company believes this work has been constructive in developing a  
14 reasonable Restack approach, as well as identifying the potential impacts of  
15 the Restack, and ways to mitigate those impacts on our North Dakota  
16 customers, the Company, and our customers in all of our other affected  
17 jurisdictions. We believe we are on track to file a Negotiated Agreement with  
18 the Commission by the June 30, 2015 deadline provided for in the Settlement,  
19 if not sooner.

20  
21 Q. IF THE COMMISSION DENIES THE COMPANY'S APPLICATION FOR AN ADP FOR  
22 THE 187 MW SOLAR PORTFOLIO, WOULD THIS RESOURCE ADDITION BE  
23 INCLUDED IN THE NEGOTIATED AGREEMENT?

24 A. The Company does not want to prejudge the outcome of the Restack  
25 negotiations. However, generally speaking, should the Commission deny the  
26 Company's application for an ADP for the 187 MW Solar Portfolio because it  
27 is incompatible with North Dakota energy policy, it would be the Company's

1 intention that this resource addition would be addressed in the Negotiated  
2 Agreement implementing the Restack.

3  
4 **V. RESOURCE PLANNING IMPACTS**

5  
6 Q. WILL THE COMPANY BE MAKING ANY ADDITIONAL RESOURCE ADDITIONS TO  
7 COMPLY WITH THE MINNESOTA SES?

8 A. The 187 MW Solar Portfolio is intended to be the principal utility-scale  
9 resource addition the Company will make to meet its 1.5 percent SES  
10 obligations in Minnesota. Our current plans are to meet the remainder of our  
11 SES obligations through small, behind-the-meter solar installations, such as  
12 rooftop solar, and through Minnesota's new Community Solar Garden  
13 program. I note that the Company is required to meet ten percent of its SES  
14 obligations through these small scale solar programs. Mr. Haeger provides  
15 additional information with respect to the Company's Minnesota SES  
16 compliance plans.

17  
18 Q. WILL ANY OF THE COSTS OF THESE SMALL SCALE SOLAR PROGRAMS BE  
19 ALLOCATED TO THE COMPANY'S NORTH DAKOTA CUSTOMERS?

20 A. To the extent that any of the costs of these small scale solar programs would  
21 be allocated to our North Dakota customers through the Company's normal  
22 allocation processes, the terms of the Settlement Agreement in our most  
23 recent rate case would not allow the permanent inclusion of these costs in the  
24 Company's North Dakota rates without ultimate Commission review. More  
25 specifically, in our last rate case, the Company and Advocacy Staff agreed to a  
26 process that will provide for timely Commission review of smaller resource  
27 additions to the integrated system to determine whether the resource's energy

1 and related costs should be included in the Company's North Dakota FCR.  
2 In the event we would allocate the costs of these small scale solar resources  
3 under our normal allocation procedures to our North Dakota jurisdiction,  
4 Commission review of the resources will be conducted through the agreed-to  
5 FCR review process.

6

7 Q. DOES THE CAPACITY FROM THE 187 MW SOLAR PORTFOLIO AFFECT THE  
8 COMPANY'S CAPACITY NEEDS IN THE 2017-2019 TIME FRAME IDENTIFIED IN  
9 CASE NOS. PU-13-194 AND PU-13-195 OR ITS COMMITMENTS TO CONSTRUCT  
10 THERMAL GENERATION IN NORTH DAKOTA BY 2036?

11 A. The 187 MW Solar portfolio will provide some additional capacity beginning  
12 June of 2018. We do not believe that the addition of this capacity will have a  
13 material impact on our resource needs in 2017 to 2019 or our commitments  
14 with respect to construction of North Dakota based generation that were  
15 made in the Settlement Agreement in our most recent rate case.

16

17 Q. HAS THE COMPANY SELECTED A RESOURCE TO MEET ITS IDENTIFIED  
18 CAPACITY NEEDS IN THE 2017-2019 TIME FRAME?

19 A. Not yet. The Minnesota Competitive Acquisition Process (CAP) is still  
20 ongoing. The CAP proceeding is currently scheduled for hearing before the  
21 Minnesota Public Utilities Commission (MPUC) in early December 2014, and  
22 we expect a final order from the MPUC by the end of the year. Mr. Haeger  
23 provides further information with respect to the Company's forecasted  
24 resource needs and the status of the CAP proceeding.

25

26 As agreed-to in the Settlement in our most recent rate case, and consistent  
27 with other commitments the Company has made to the Commission, should

1 the Company seek to acquire a resource addition as part of the CAP process  
2 (other than a resource for which the Commission has already issued an ADP),  
3 the Company will file an application for an ADP for that resource.

4  
5 Q. DOES THE COMPANY STILL PLAN TO MOVE FORWARD WITH THE 187 MW  
6 SOLAR PORTFOLIO IF THE GERONIMO SOLAR PROJECT IS SELECTED AS PART OF  
7 THE CAP PROCEEDING?

8 A. The Company believes that the 187 MW Solar Portfolio is the most prudent  
9 and cost-effective way for the Company to meet its Minnesota SES  
10 requirements, and has recommended that the MPUC approve the portfolio.  
11 If the MPUC finds the Geronimo project in the public interest in the CAP  
12 proceeding, we have recommended that only two of the PPAs that makeup  
13 the Solar Portfolio proceed, so that the total amount of utility-scale solar  
14 additions to our system remains at 187 MW.

15  
16 Should the MPUC direct us to move forward with the Geronimo solar  
17 project, we will file an application for an ADP with the Commission to  
18 provide the Commission an opportunity to assess the prudence of that project  
19 consistent with the circumstances surrounding it at that time. We will also  
20 update this Application should undertaking the Geronimo solar project impact  
21 our proposed 187 MW Solar Portfolio power purchase.

22  
23 **VI. CONCLUSION**

24  
25 Q. PLEASE SUMMARIZE YOUR TESTIMONY.

26 A. The 187 MW Solar Portfolio is a cost-effective way for the Company to meet  
27 its Minnesota SES requirements at modest cost while adding clean, carbon-

1 free capacity and energy to the integrated system. The addition of this solar  
2 capacity provides a hedge against volatile fuel prices, and the clean nature of  
3 this resource provides a hedge against future environmental regulation.  
4 Consequently, when viewed as a whole, the Company respectfully requests the  
5 Commission finds the 187 MW Solar Portfolio resource addition prudent.

6

7 Q. DOES THIS CONCLUDE YOUR DIRECT TESTIMONY?

8 A. Yes, it does.



## Laura McCarten

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<b>Experience</b>	2008-Present	Xcel Energy	Minneapolis, MN
	<b>Regional Vice President, NSPM</b>		
	<ul style="list-style-type: none"> <li>▪ For Xcel Energy's North Dakota service territory, responsible for regulatory and legislative interface and strategies, customer and community relations and public affairs, gas business development, and provide strategic leadership on initiatives to effectively serve customers.</li> <li>▪ For Xcel Energy's Minnesota service territory, responsible for managing relationships with communities and large customer accounts, gas business development and our HomeSmart service.</li> <li>▪ For Xcel Energy's South Dakota service territory, responsible for regulatory and legislative interface and strategies, customer and community relations and public affairs, and provide strategic leadership on initiatives to effectively serve customers.</li> </ul>		
	2006-2008	Xcel Energy	Minneapolis, MN
	<b>Director, Regional Transmission Development</b>		
	1997-2005	Xcel Energy	Minneapolis, MN
	<b>Director, Minnesota Community Services</b>		
	1994-1997	Xcel Energy	Mankato, MN
	<b>Regional General Manager</b>		
	1992-1994	Northern States Power	Minneapolis, MN
	<b>Manager, Regulatory Affairs</b>		
	1979-1991	Northern States Power	Minneapolis, MN
	<b>Nuclear Generation: Spent Nuclear Fuel Project Manager, Engineer</b>		
<b>Education</b>	1979	University of Wisconsin	Madison, WI
	<b>Bachelor of Science in Nuclear Engineering</b>		
<b>Professional Development</b>	<ul style="list-style-type: none"> <li>▪ Xcel Energy Leadership Advantage Program (2004)</li> <li>▪ University of Michigan Business School, Strategic Marketing Planning (1998)</li> <li>▪ University of Minnesota, Carlson School of Management, Minnesota Management Institute (1996)</li> </ul>		
<b>Community Service</b>	<ul style="list-style-type: none"> <li>▪ Lignite Energy Council, Board of Directors</li> <li>▪ Minneapolis Regional Chamber of Commerce, Board of Directors</li> <li>▪ North Central Electrical League, Board of Directors</li> <li>▪ Ordway Center for the Performing Arts, Board of Directors</li> <li>▪ University Enterprise Laboratories, Board of Directors</li> </ul>		