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Rebuttal Testimony
Bria E. Shea

State of North Dakota
before the
North Dakota Public Service Commission

In the Matter of the Application of Northern States Power Company
for an Advance Determination of Prudence
for the 151.2 MW Dakota Range III Wind Facility

Case No. PU-18-430

Policy

Exhibit___(BES-2)

June 12, 2019

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I. INTRODUCTION

Q. PLEASE STATE YOUR NAME AND TITLE.

A. My name is Bria E. Shea. I am the Director, Regulatory and Strategic Analysis, for Northern States Power Company – Minnesota (NSP or Xcel Energy or the Company).

Q. ARE YOU THE SAME BRIA E. SHEA WHO SUBMITTED PRE-FILED DIRECT TESTIMONY IN THIS PROCEEDING?

A. Yes.

Q. WHAT IS THE PURPOSE OF YOUR REBUTTAL TESTIMONY?

A. The purpose of my Rebuttal Testimony is to respond to the Direct Testimony of Commission Advocacy Staff Witness James A. Heidell filed in this docket and to address a number of the policy issues discussed in Mr. Heidell's testimony regarding the Company's request for an Advance Determination of Prudence (ADP) for a power purchase agreement (PPA) between the Company and Dakota Range III for a new wind generation facility (Dakota Range III).

Q. PLEASE SUMMARIZE THE RECOMMENDATIONS YOU MAKE IN YOUR REBUTTAL TESTIMONY.

A. In my testimony I recommend that the Commission (1) adopt Mr. Heidell's recommendation to approve the Company's ADP for Dakota Range III, and (2) reject Mr. Heidell's two proposed conditions on approval.

Q. HOW IS YOUR TESTIMONY ORGANIZED?

A. My Testimony is organized as follows:

- Section II provides an overview of Mr. Heidell's testimony and the Company's responses to Mr. Heidell's recommended conditions;
- Section III discusses the prudence of Dakota Range III in light of Mr. Heidell's testimony;
- Section IV discusses the load impacts of the Google data center;
- Section V discusses other issues raised in Mr. Heidell's testimony;
- Section VI discusses the impacts on customers and the Company if the Commission rejects the Company's request for an ADP;
- Section VII introduces the Company's Rebuttal Witnesses; and
- Section VIII sets forth my conclusions.

II. RESPONSE TO MR. HEIDELL'S RECOMMENDATIONS

Q. PLEASE SUMMARIZE MR. HEIDELL'S RECOMMENDATIONS.

A. Mr. Heidell's testimony provides his assessment of the impacts on North Dakota customers of the Dakota Range III PPA and the Company's associated agreement with Honeycrisp Power, LLC, a subsidiary of Google, LLC (Google), to provide electric service to Google's proposed data center to be located at the Company's Sherburne County Generating Station (Sherco) property in Becker, Minnesota (Google ESA). Mr. Heidell recommends that the Company's ADP be approved, subject to certain conditions.

Q. DOES THE COMPANY AGREE WITH MR. HEIDELL'S CONCLUSION?

A. The Company agrees with Mr. Heidell's recommendation that the ADP be approved. However, the Company does not agree with Mr. Heidell's proposed conditions on approval of the ADP.

Q. WHAT CONDITIONS DOES MR. HEIDELL RECOMMEND ON THE COMMISSION'S APPROVAL OF THE ADP?

A. Mr. Heidell recommends the Commission condition approval of the ADP on two requirements:

1. Mr. Heidell recommends that North Dakota customers receive financial compensation for their share of the Renewable Energy Credits (RECs) associated with the project; and
2. Mr. Heidell recommends that North Dakota customers be held harmless for any RECs that the Company may have to purchase to satisfy its commitments under the Google ESA (Cover RECs).

Q. WHAT IS THE COMPANY'S RESPONSE TO MR. HEIDELL'S RECOMMENDED CONDITION THAT NORTH DAKOTA CUSTOMERS BE COMPENSATED FOR THEIR SHARE OF THE RECS?

A. The Company respectfully disagrees with this recommendation as it is inconsistent with the purpose of acquiring Dakota Range III and the Company's request for an ADP. As Mr. Heidell notes, Dakota Range III is proposed as a system resource; however, we are proposing that it serve the system with energy only and are not allocating RECs to specific jurisdictions. Rather, the resource addition is being procured as an inducement to Google to construct its data center in the NSP System assigned, exclusive, service

territory. Consequently, the use of the RECs produced by Dakota Range III must be consistent with our obligations under the Google ESA.

By reducing the system average cost of fuel, Dakota Range III will generate savings for North Dakota customers even without RECs. As described in my Direct Testimony, the RECs themselves will be *[TRADE SECRET BEGINS TRADE SECRET ENDS]* to meet the Company's obligations under the Google ESA. Dakota Range III and the Google ESA are tied to each other, and the Company is requesting an ADP so that it may meet its obligations under the Google ESA. This linkage is recognized in the Google ESA, as the Commission granting an ADP for Dakota Range III is a condition precedent to the Company's obligations under the Google ESA.

Q. WHAT DOES THE COMPANY PLAN TO DO WITH THE DAKOTA RANGE III RECS IF THE GOOGLE LOAD DOES NOT COME ONLINE?

A. If the Google data center load does not materialize, and the Company's obligations under the Google ESA are terminated, the Company will allocate the Dakota Range III RECs to all NSP System customers consistent with past practice, and those attributable to North Dakota will continue to be sold annually and the proceeds passed on to customers as the Commission has previously directed.[1]

[1] Case No. PU-10-019.

Q. WHAT IS THE COMPANY'S RESPONSE TO MR. HEIDELL'S RECOMMENDED CONDITION THAT NORTH DAKOTA CUSTOMERS BE HELD HARMLESS FOR ANY COVER RECS?

A. The Company understands Mr. Heidell's position in this regard but ultimately disagrees with this recommendation. The Google load is system load that benefits every NSP System customer. Consequently, to enjoy the benefits of that load, all customers should pay the associated costs.

Q. IS MR. HEIDELL'S SECOND RECOMMENDED CONDITION NECESSARY?

A. No. Under the structure of the Google ESA, the Company is authorized to, and intends to, *[TRADE SECRET BEGINS TRADE SECRET ENDS]* "Cover RECs." Thus, the incremental cost of any Cover RECs that the Company may need to meet its obligations under the Google ESA *[TRADE SECRET BEGINS TRADE SECRET ENDS]*. Consequently, Mr. Heidell' s condition is moot and does not need to be addressed or adopted by the Commission.

III. PRUDENCE OF DAKOTA RANGE III

Q. IN LIGHT OF MR. HEIDELL'S TESTIMONY, IS THE DAKOTA RANGE III PPA PRUDENT?

A. Yes, the proposed Dakota Range III PPA remains prudent on its face. The PPA will result in cost savings to North Dakota customers under all scenarios, demonstrating that it is a least cost resource.

There is nothing in Mr. Heidell's testimony that would change this assessment. In fact, Mr. Heidell's testimony demonstrates potentially larger benefits of the Dakota Range III PPA than analyzed by the Company. As demonstrated in the Rebuttal Testimony of Company Witness Philip J. Martin, Dakota Range III produces cost savings for North Dakota customers with or without the addition of the Google data center load to the NSP System. Consequently, the record in this proceeding clearly supports the prudence of the resource addition.

Q. IS THE DAKOTA RANGE III PPA LEAST COST?

A. Yes. There is no dispute in the record about the resource addition itself, which will benefit North Dakota customers because the Company will purchase power under the PPA at below market prices, thereby lowering average fuel and purchased power costs on the Company's system. As Mr. Heidell noted, this qualifies the PPA as "least cost" in the eyes of the Commission.

Q. PLEASE EXPLAIN FURTHER.

A. The Company's analysis indicates cost savings in all scenarios, thereby demonstrating the resource addition is least cost and prudent. Mr. Heidell acknowledges that the Company conducted its modeling correctly and that the Company estimated the net cost savings to North Dakota customers from adding Dakota Range III to be $22 million on a present value of revenue requirements (PVRR) basis. Further, Mr. Heidell's own estimates, using different projections for natural gas and MISO clearing prices, found

the net cost savings of the PPA to be up to $48 million PVRR. Therefore, the PPA's net cost savings alone illustrate its prudence.

IV. LOAD IMPACTS OF THE GOOGLE ESA

Q. DID MR. HEIDELL ADDRESS THE IMPACT OF THE GOOGLE LOAD ON THE PRUDENCE DETERMINATION OF THE ADP?

A. Yes. Mr. Heidell raised the relevant issue that in addition to the cost savings from Dakota Range III, North Dakota customers will also be allocated the costs of supporting the Google load.

Q. DO YOU CONCUR THAT IT IS APPROPRIATE TO ANALYZE THE IMPACT OF THE GOOGLE LOAD WHEN ASSESSING THE PRUDENCE OF DAKOTA RANGE III?

A. The Company is adding Dakota Range III as a low-cost energy resource to the system. Therefore, it is important to analyze the resource addition itself on a standalone basis. That said, Dakota Range III is being brought onto the system due to the Company's need to procure incremental new renewable generation under the terms of the Google ESA. Consequently, additional analysis regarding the impact of the Google load is reasonable – although not necessary – to help ensure that the Commission can make a fully informed decision regarding the prudence of the Dakota Range III resource addition.

The Company takes issue, however, with Mr. Heidell's characterization of the Google data center as "discretionary" load, with the implication that it is not necessary or beneficial to all of our customers. In the current era of

slow load growth, and potentially declining load growth, the Company has made it a priority to attract these types of large projects to the Company's system, as have other utilities across the United States. We believe that load growth is generally beneficial to our existing customers, and efforts to attract load help provide these benefits to all of our customers. Beyond the economic development benefits to the community immediately surrounding any large new load, material load growth brings savings to all NSP System customers by spreading system costs over high sales volumes. Adding system load through the Google ESA or in any other fashion fundamentally benefits customers system-wide.

Q. PLEASE DESCRIBE THE LOAD LEVELS OF THE GOOGLE ESA.

A. The Google ESA allows for Google to have data center load up to ***[TRADE SECRET BEGINS TRADE SECRET ENDS]***. We believe that this load level is ***[TRADE SECRET BEGINS TRADE SECRET ENDS]***. Google will be considered in-service at load levels of ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** and has indicated a very high likelihood that they will achieve at least ***[TRADE SECRET BEGINS TRADE SECRET ENDS]***. In negotiations with Google, we believe a load range of between ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** and ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** by the ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** the Google ESA is a reasonable estimate. I note that Google expects to be a very high load factor customer, with load factors

averaging approximately *[TRADE SECRET BEGINS TRADE SECRET ENDS]* percent.

Q. IS THE ADDITION OF THE GOOGLE LOAD TO THE SYSTEM GUARANTEED?

A. No. Google may not come online at all *[TRADE SECRET BEGINS TRADE SECRET ENDS]*. This is why the standalone cost savings of Dakota Range III are important to consider when assessing the prudence of the resource addition.

Q. WHAT IS THE CURRENT STATUS OF THE GOOGLE TRANSACTION?

A. The Google ESA and ancillary documents have been executed. Google is still working with the Company and the host communities on additional development items that we hope will be completed in the coming months. With respect to regulatory approvals, the Minnesota Public Utilities Commission approved the Google ESA on May 14, 2019 (MPUC Docket No. E002/M-19-39), and the Company has received all necessary approvals from the Federal Energy Regulatory Commission.

Q. WHAT ARE THE IMPLICATIONS OF THE GOOGLE DATA CENTER LOAD?

A. The addition of the Google data center load will increase system-wide costs to serve the additional load. However, when the impact of the additional sales to Google are accounted for, the load will reduce costs for all of our existing customers. As discussed by Mr. Martin in his Rebuttal Testimony, the Company performed an additional analysis in response to Mr. Heidell's testimony that isolates the additional system cost savings generated by the addition of the Google load. This analysis shows that Dakota Range III will

generate system-wide savings of *[TRADE SECRET BEGINS TRADE SECRET ENDS]* PVRR without the Google load, due to the addition of a low-cost resource. If the Google load comes onto the system, these cost savings increase to *[TRADE SECRET BEGINS TRADE SECRET ENDS]* system-wide on a PVRR basis. Thus Dakota Range III is prudent regardless of whether the Google load materializes, but produces even more savings if the Google load does come online.

For our North Dakota customers, the savings are realized through changes to cost allocation methods impacted by the Google load, which shift system costs from North Dakota to Minnesota. These savings are described in detail in the Rebuttal Testimony of Company Witness Benjamin C. Halama.

Q. DID MR. HEIDELL REQUEST AN ANALYSIS OF THE IMPACTS OF ADDING THE GOOGLE DATA CENTER LOAD TO THE NSP SYSTEM?

A. Yes. The Company cooperated with Advocacy Staff in producing additional modeling runs to reflect the impacts of the data center load (Supplemental Analysis).

Q. WHAT DID MR. HEIDELL REQUEST FOR THE SUPPLEMENTAL ANALYSIS?

A. Mr. Heidell requested that the Company add the Google load to Strategist for the Dakota Range III scenario with Markets On. The Company and Advocacy Staff agreed to the relevant assumptions for the Supplemental Analysis, including the load levels and load growth to include. Mr. Martin discusses this further in his Rebuttal Testimony and provides the results of the Supplemental Analysis. I note here that the load assumptions were

[TRADE SECRET BEGINS TRADE SECRET ENDS] in year one, growing steadily to *[TRADE SECRET BEGINS TRADE SECRET ENDS]* of the Google ESA. While we believe this a reasonable assumption, it is one of many different load scenarios that could occur.

Q. WHAT WERE THE RESULTS OF THE SUPPLEMENTAL ANALYSIS?

A. The Supplemental Analysis found that the addition of Dakota Range III and the assumed Google data center load results in reduced market sales in the 2021-2030 period by an average of *[TRADE SECRET BEGINS TRADE SECRET ENDS]* annually, and reduced dump energy by *[TRADE SECRET BEGINS TRADE SECRET ENDS]* annually during the same timeframe. This results in an overall system cost increase of *[TRADE SECRET BEGINS TRADE SECRET ENDS]* PVRR system-wide for production costs.

Q. DID THE SUPPLEMENTAL ANALYSIS DEMONSTRATE SAVINGS FOR NORTH DAKOTA CUSTOMERS?

A. Yes. The Supplemental Analysis found that while overall system production costs increase as a result of the addition of the Google load, production costs allocated to North Dakota decrease by *[TRADE SECRET BEGINS TRADE SECRET ENDS]* PVRR and up to *[TRADE SECRET BEGINS TRADE SECRET ENDS]* in a single year due to the shifting of costs from North Dakota to Minnesota under the demand allocator due to the Google load based on the system costs

supported by the Strategist model. Mr. Martin and Mr. Halama discuss this further in their Rebuttal Testimony.

Q. WHAT DO YOU CONCLUDE WITH RESPECT TO THE SUPPLEMENTAL ANALYSIS?

A. I conclude that, based on the assumptions suggested by Mr. Heidell with respect to the Google load, the addition of the Google load will provide cost savings to North Dakota customers net of the costs of serving the load.

Q. DOES MR. HEIDELL SUPPORT YOUR CONCLUSION?

A. I believe so. That said, Mr. Heidell took issue with only applying the demand allocator to the Strategist results rather than taking the production costs embedded in the Strategist results and applying (1) the demand allocator to those components allocated by demand and (2) an energy allocator to those components allocated by energy. Mr. Halama discusses these allocation methods and the types of costs allocated through them in his Rebuttal Testimony.

Q. DID MR. HEIDELL UPDATE THE SUPPLEMENTAL ANALYSIS TO ADDRESS HIS CONCERNS?

A. Yes. Under his own calculations, Mr. Heidell estimated savings to North Dakota customers of *[TRADE SECRET BEGINS TRADE SECRET ENDS]* to *[TRADE SECRET BEGINS TRADE SECRET ENDS]* based on the Strategist results, depending on how often the demand allocator is updated in general rate cases.

Q. WHAT IS THE COMPANY'S POSITION WITH REGARD TO MR. HEIDELL'S METHODOLOGY FOR CALCULATING THE COST SHIFTING UNDER THE DEMAND AND ENERGY ALLOCATION METHODS?

A. The Company generally accepts Mr. Heidell's methodology in this regard as a reasonable approximation of the impacts of additional high-load factor load to the NSP System. However, in response to Mr. Heidell's testimony and to allay his concerns, the Company performed an additional analysis applying both the demand and energy allocators. As shown in Mr. Halama's Rebuttal Testimony, Exhibit___(BCH-1), Schedule 2, the Company's additional analysis estimated cost savings to North Dakota customers of *TRADE SECRET BEGINS TRADE SECRET ENDS]* PVRR based on the demand and energy allocators applied to the Strategist results, at the higher end of Mr. Heidell's range.

Q. WHAT CONCLUSIONS DID MR. HEIDELL DRAW FROM THESE ESTIMATED COST SAVINGS?

A. Mr. Heidell concluded that the estimated cost savings to North Dakota customers are reasonable, but ultimately concluded that the savings are not "material" because of the inherent uncertainty of long-range forecasting, the risk of curtailments, the cost of Cover RECs, lower wind energy production, and increased transmission costs. As noted above, the cost of Cover RECs to the Company is *TRADE SECRET BEGINS TRADE SECRET ENDS]*. Additionally, the risks associated with long-range forecasting and wind energy generation are inherent in and priced into in any wind PPA, and cannot be used to summarily waive off real savings to customers.

Q. IS THERE ANYTHING MR. HEIDELL FAILED TO CONSIDER IN CONCLUDING THAT THE COST SAVINGS ARE NOT MATERIAL?

A. Yes. The Supplemental Analysis and Mr. Heidell's analysis used only the Strategist modelling outputs to determine overall savings to North Dakota customers, which the Company believes underestimates the overall cost savings to our North Dakota customers.

Q. PLEASE EXPLAIN.

A. Strategist is a production cost model which only captures the production costs of the NSP System. It does not account for the allocation of other system costs when load grows in Minnesota. As Mr. Halama discusses in his Rebuttal Testimony, Strategist only calculates production costs of serving load, leaving out the benefits of that new load. For example, Strategist does not account for the shifting of other system costs, including transmission costs and certain administrative and general costs, from North Dakota to Minnesota when a significant new load customer is added in Minnesota.

Q. WHEN THESE OTHER SHIFTED COSTS ARE ACCOUNTED FOR, WHAT DOES THE COMPANY ESTIMATE TO BE THE TOTAL COST SAVINGS TO NORTH DAKOTA CUSTOMERS?

A. We estimate that the Google load addition as provided for in the Supplemental Analysis will result in cost savings to North Dakota customers of approximately ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** PVRR and, between ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** and ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** annually depending on the

additional load provided by Google. These savings are net of the increased system production costs to support the additional Google load. Further details of our additional analysis are provided in the Rebuttal Testimony of Mr. Halama.

Q. DO YOU BELIEVE THESE SAVINGS TO BE REASONABLE?

A. Yes. While overall system costs will increase due to the load growth, the Company is procuring an inexpensive resource to serve the new load, and the increase in retail sales from the new load will reduce the average cost per kWh in North Dakota, as demonstrated by Mr. Halama's analysis.

As Mr. Martin discusses, these savings are commensurate with the level of savings we would expect to see from this type of load growth, especially at Google's very high load factor, particularly when it is paired with the addition of an extremely low-cost wind resource.

V. OTHER ISSUES RAISED BY MR. HEIDELL

Q. DID MR. HEIDELL IDENTIFY OTHER ISSUES IN THIS PROCEEDING?

A. Yes. Mr. Heidell identified the allocation of transmission costs to support Google as well the gains on sale of the land that Google will purchase for the data center as additional potential impacts of the Google ESA. Mr. Heidell also raised the issue of the timing of the Dakota Range III resource addition in light of the Company's resource planning calendar.

Q. PLEASE RESPOND TO MR. HEIDELL'S COMMENTS WITH RESPECT TO THE TRANSMISSION COSTS TO SUPPORT GOOGLE.

A. Mr. Heidell is correct that the Company will be constructing additional transmission infrastructure to support Google's development of the data center. While some of those facilities are directly attributable to Google and its needs, a portion of those facilities would be necessary to support any load growth in that area.

It is common practice at the Company and across the industry to build transmission to support load, and allocate the costs system-wide because constructing the infrastructure has system-wide benefits. Thus, the Company is treating the Google ESA like any other large commercial and industrial user that requires access to transmission infrastructure. Indeed, the Commission has previously granted Certificates of Public Convenience and Necessity (CPCN) to several load-serving transmission projects needed to service North Dakota load but allocated across the NSP System. For example, in 2017, the Commission issued a CPCN for the Minot Load Serving Project, which included a new substation and 230kV transmission line to serve the City of Minot alone (Case No. PU-16-644), but allocated the costs system-wide.

Q. HOW DOES THE COMPANY PLAN TO DISTRIBUTE THE PROCEEDS OF THE LAND SALE ASSOCIATED WITH THE GOOGLE ESA?

A. As Mr. Heidell noted in his testimony, the Company has executed an agreement to sell a parcel of the Company's land holdings at the Sherco Generating Station to Google for construction of the data center. As with

other land sales, the Company will distribute the North Dakota share of the proceeds of this sale to North Dakota customers.

Q. HOW DOES THE COMPANY'S PROPOSAL RELATE TO ITS INTEGRATED RESOURCE PLAN?

A. As the Commission is aware, the Company and Commission Staff have discussed the development of a North Dakota Resource Plan process for the Company. In early July, the Company will file its Upper Midwest Resource Plan with the Minnesota Public Utilities Commission and will provide the Commission with a copy of the plan consistent with our commitments in the Settlement Agreement in Case No. PU-07-776.

Mr. Heidell suggests in his testimony that the Company's filing of this ADP forces the Commission to make a resource procurement decision outside of the Company's Integrated Resource Plan (IRP) and long-range resource procurement plan. The Company disagrees with this assertion and notes that resource additions frequently happen outside of the IRP cycle. While the Dakota Range III PPA, if approved, will be included in the Company's IRP, the IRP itself is outside of the scope of this proceeding and does not bear on the prudence of the Dakota Range III PPA.

VI. IMPACTS OF REJECTING THE ADP APPLICATION

Q. WHAT DOES THE COMPANY PROPOSE SHOULD THE COMMISSION REJECT ITS ADP APPLICATION?

A. As discussed throughout my Rebuttal Testimony, the Company believes and the record in this Case supports that the Dakota Range III resource addition is prudent. The Company has not made a formal proposal as to how to address the possibility that the Commission could reject our Application. However, as I mentioned earlier in my Rebuttal Testimony and in my Direct Testimony, should the Commission choose not to participate in the costs associated with the Google ESA, we do not believe that it is equitable for our North Dakota customers to enjoy the benefits of the Google load.

Q. HOW DOES MR. HEIDELL PROPOSE TO ADDRESS THE COSTS OF DAKOTA RANGE III IF THE COMMISSION REJECTS THE ADP?

A. If the Commission rejects the Company's request for an ADP for the Dakota Range III PPA, Mr. Heidell proposes addressing the costs of the PPA in the Fuel Cost Rider (FCR) by removing the cost of the PPA from the Company's fuel and purchased power costs, and removing the load of the data center from system sales in the calculation of average system fuel and power costs. Thus, the PPA and the Google data center load would be removed from the numerator and denominator, respectively, of the Company's calculation of the system average cost of fuel. Mr. Heidell proposes to do this in a three-step process, with the goal being to ensure that North Dakota does not share in the benefits of the PPA or the costs of serving the Google data center load.

Q. DOES MR. HEIDELL'S PROPOSAL ACCOMPLISH HIS GOALS?

A. While the Company appreciates Mr. Heidell's thoughtful approach to this difficult issue, we do not believe his proposal would accomplish his stated goals.

Q. IN YOUR VIEW, WHAT ARE THE ISSUES ASSOCIATED WITH MR. HEIDELL'S PROPOSAL?

A. At base, Mr. Heidell's proposal only addresses the fuel-based impacts of separating the Google load and resources from North Dakota. He does not address the base rate impacts of the Google load and how to effectively identify the system costs deriving exclusively from Google, nor the demand allocator and energy allocator shifts caused exclusively by the Google load.

Q. PLEASE EXPLAIN.

The Company believes it is simply not possible to isolate the system costs associated with the Google load in order to prevent them from being applied to North Dakota. Further, as discussed above and in the Rebuttal Testimony of Mr. Martin and Mr. Halama, the addition of a large load customer in Minnesota shifts the demand and energy allocations from North Dakota to Minnesota. This produces savings to North Dakota customers that would also have to be accounted for in Mr. Heidell's calculations. Thus, to fully account for the impacts of the transaction, the Company would have to adjust these allocation factors based on the expected impacts of serving the Google load. While Google sales can easily be accounted for, it would be difficult or impossible for the Company to directly correlate actual certain

system costs to the Google load, for example, the addition of a new generating resource.

Q. WHAT ARE THE IMPLICATIONS OF MR. HEIDELL'S PROPOSAL?

A. In many ways, Mr. Heidell is suggesting an initial form of system separation that the Company had proposed in its Resource Treatment Framework (Case Nos. PU-12-813, *et al.*). By adjusting system costs for both production costs and load impacts, Mr. Heidell is essentially proposing to eliminate the impact of the Google load on North Dakota customers. I note that the Google load has the potential to be the largest customer on the NSP System and at modelled load levels would account for almost ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** of system demand. At the high range of Google's expected ***[TRADE SECRET BEGINS TRADE SECRET ENDS]***, it would account for ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** of system demand. And, at the maximum load provided for in the ESA, Google would account for almost ***[TRADE SECRET BEGINS TRADE SECRET ENDS]*** of the total NSP System. This would have material impacts on system planning going into the future.

Q. WHAT IS THE COMPANY'S RECOMMENDATION IN THIS RESPECT?

A. The Company believes it has demonstrated the prudence of Dakota Range III, and therefore the Commission should grant the requested ADP and this issue does not need to be addressed. However, should the Commission deny our requested ADP, we believe additional proceedings will be necessary to determine how best to proceed.

VII. OTHER COMPANY REBUTTAL WITNESSES

Q. WILL ANY OTHER COMPANY WITNESSES BE FILING REBUTTAL TESTIMONY?

A. Yes. The Company is filing Rebuttal Testimony of the following Witnesses:

- Mr. Philip Joseph "P.J." Martin, whose testimony addresses the results of additional analyses done at Mr. Heidell's request and in response to his testimony; and
- Mr. Benjamin C. Halama, whose Rebuttal Testimony addresses the impacts of the Google data center load on cost allocations between North Dakota and Minnesota.

VIII. CONCLUSION

Q. PLEASE SUMMARIZE YOUR CONCLUSIONS.

A. For the reasons stated above, the Dakota Range III PPA is prudent and should be approved without conditions. Further, while the Google ESA is not at issue in this proceeding, the Company's Supplemental Analysis demonstrates that the addition of the Google load to the NSP System will reduce system costs for existing customers even more so than the addition of Dakota Range III alone.

Q. DOES THIS CONCLUDE YOUR PRE-FILED REBUTTAL TESTIMONY?

A. Yes, it does.

BEFORE THE PUBLIC SERVICE COMMISSION
OF THE STATE OF NORTH DAKOTA

NORTHERN STATES POWER COMPANY
ADVANCE PRUDENCE
151.2 MW DAKOTA RANGE III WIND FACILITY

CASE NO. PU-18-430

VERIFICATION

STATE OF MINNESOTA)
)SS.
COUNTY OF HENNEPIN

Bria E. Shea, being first duly sworn on oath, deposes and says that she is the Director of Regulatory and Strategic Analysis for Applicant Northern States Power Company, a Minnesota corporation, in the above-captioned matter, that the testimony submitted in the above-captioned matter under her name was prepared under her direction, that she knows the contents thereof, and that the same is true and correct to the best of her knowledge and belief.

Bria E. Shea

Subscribed and sworn to before me on this 12th day of June, 2019

James G. Erickson
Notary Public
Minnesota
My Commission Expires January 31, 2024

Notary Public
My Commission expires: January 31, 2024