

BEFORE THE PUBLIC UTILITIES COMMISSION  
OF THE STATE OF SOUTH DAKOTA

*In the Matter of the Complaint by Oak Tree Energy LLC against  
NorthWestern Energy for refusing to enter into a Purchase Power Agreement*

EL11-006

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Responsive Testimony of

**Bleau LaFave**

On behalf of NorthWestern Energy

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Submitted February 24, 2012

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## Exhibits

None

# 1 Testimony

## 2 Introduction

3 **Q: Please state your name and business address.**

4 A: My name is Bleau LaFave. My business address is 3010 West 69<sup>th</sup> Street, Sioux Falls, South  
5 Dakota 57108.

6 **Q: Are you the same Bleau LaFave that has previously filed testimony in this docket?**

7 A: Yes.

## 8 Purpose of Testimony

9 **Q: What is the purpose of your testimony?**

10 A: The purpose of my testimony is to respond to Mr. Rounds's testimony.

11 **Q: Please summarize your testimony.**

12 A: My purpose is to clarify my statements that NorthWestern Energy's estimated 20-year levelized  
13 incremental cost is \$35.85/MWh—not that \$35.85/MWh is NorthWestern Energy's avoided  
14 cost.

## 15 Estimated Incremental Cost versus Avoided Cost

16 **Q: On page 9, line 29 of Mr. Rounds's testimony, he states, "Mr. LaFave provides a 20-year  
17 levelized avoided cost of \$35.85/MWh." Is that a correct characterization of the \$35.85/MWh  
18 listed in your testimony?**

19 A: No. The \$35.85 is the levelized incremental cost over 20 years based on the estimation utilizing  
20 the PURPA avoided cost filing and the market forecast based on a forecast of the load duration  
21 curve. As described in my testimony on page 12 starting at line 22, this number was not created  
22 by the same process used to calculate NorthWestern's avoided cost filing. This estimate used  
23 the incremental costs filing in the 2011 Avoided Cost Filing for the years 2013 through 2016, a  
24 straight-line increase from 2017 to 2022, and the market pricing from 2023 to 2032. Although  
25 based on the filed incremental cost, this estimate is most likely higher than actual incremental  
26 cost and the resulting avoided cost for a specific QF. NorthWestern's 2011 load duration curve  
27 and forecasted 2015 load duration curve were used to estimate the incremental cost, but the  
28 time to move the curve to the point that some amount of market purchases are needed to

1 augment the baseload resources during 100% of the hours would not be linear as estimated in  
2 this calculation.

3 **Q: What is a load duration curve, and how did you use it?**

4 A: The load duration curve is a curve that shows the amount of time NorthWestern uses baseload  
5 resources verses market purchases for supply to NorthWestern customers. As show in Exhibit 3  
6 of my testimony, NorthWestern supplied the entire customer load by internal generation 58% of  
7 the time in 2010. The rest of the time, NorthWestern's load was served by a mixture of  
8 baseload generation and market purchases. In 2011, 53% of the time NorthWestern customers  
9 were served by internal generation only. This percentage is affected by load growth and  
10 baseload plant outages. The forecasted internal generation percentage for 2015 is 35%.

11 From 2016, based load plants were forecasted using a similar rate of change from 2010 to 2015.  
12 Using this simple estimation, the load duration curve showed that in 2023 NorthWestern would  
13 be supplying customers with a blend baseload and market purchases 100% of the time for at  
14 least 1 megawatt. This does not assume any additional volumes above at least 1 megawatt  
15 purchase every hour. The value of the avoided cost would be less for additional megawatts  
16 above 1 megawatt. As an example, when NorthWestern would be buying at least 20 megawatts  
17 100 % of the time would be sometime after 2023 that was forecasted for at least 1 megawatt  
18 purchase.

19 **Q: Why would this estimate most likely be higher than the incremental costs or the avoided  
20 costs?**

21 A: The forecast estimate that was used for the load duration curve assumes that the heavy load  
22 hours and the light load hours fill up at the same rate. Heavy load hours normally grow faster  
23 than light load hours. Most likely in 2023, NorthWestern will still be several years away from  
24 needing to add market purchase supply to baseload resources during all light load hours. The  
25 actual incremental costs would be less than the estimate because the internal baseload  
26 resources are cheaper than market prices that fill the time not needed by market purchases.  
27 The resulting avoided cost price would be even less after applying the avoided cost adjustments  
28 stipulated by PURPA is section 304 for individual QF projects. The final avoided cost for a  
29 specific QF was also described in my testimony on page 17, lines 5 through 15. Although these  
30 are estimates and would most likely be high, we agree with Mr. Rounds that this methodology is  
31 nearest to what the actual avoided cost might be.

32 **Q: Why didn't you produce a 20-year incremental cost and the resulting avoided costs?**

33 A: Completing an all-hour 20-year future estimate using the incremental cost method would be  
34 resource-intensive and expensive and would be no more valid due to the estimated load  
35 forecast, price forecast, technology availability, federal and state regulations, and transmission  
36 availability. The uncertainty of these future forecasts is the basis for the requirement that

1 PURPA only requires a 5-year avoided cost and the SD PUC has a 10-year planning horizon, both  
2 of which are required to be updated every 2 years to reflect changing information.

3 **Q: Does this conclude your Responsive Testimony?**

4 **A:** Yes.

Affidavit of Bleau LaFave

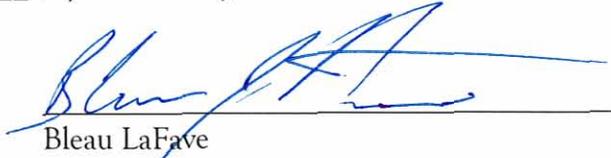
STATE OF SOUTH DAKOTA )  
 : ss  
COUNTY OF LINCOLN )

Bleau LaFave, being first duly sworn upon oath, states and alleges as follows:

- 1) I am the Director of Long-Term Growth for NorthWestern Corporation d/b/a NorthWestern Energy.
- 2) I have read this document and am familiar with its contents, and the same are true to the best of my knowledge and belief.

Further affiant sayeth naught.

Dated at Sioux Falls, South Dakota, this 22 day of February, 2012.

  
 \_\_\_\_\_  
 Bleau LaFave

SUBSCRIBED AND SWORN to before me this 22 day of February, 2012.



  
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 Dori L. Quam  
 Notary Public, South Dakota  
 My commission expires: 2/4/2016