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**Missouri Public  
Service Commission**

Exhibit No.:

Issues: AAO – Lost Fixed Cost  
Calculation

Witness: Steven M. Wills

Sponsoring Party: Union Electric Company

Type of Exhibit: Direct Testimony

Case No.: EU-2012-0027

Date Testimony Prepared: October 21, 2011

**MISSOURI PUBLIC SERVICE COMMISSION**

**CASE NO. EU-2012-0027**

**DIRECT TESTIMONY**

**OF**

**STEVEN M. WILLS**

**ON**

**BEHALF OF**

**UNION ELECTRIC COMPANY**

**d/b/a Ameren Missouri**

**St. Louis, Missouri  
October, 2011**

Ameren Exhibit No. 4  
Date 5-03-12 Reporter KF  
File No. EU-2012-0027

**DIRECT TESTIMONY  
OF  
STEVEN M. WILLS**

**CASE NO. EU-2012-0027**

1           **Q.     Please state your name and business address.**

2           A.     Steven M. Wills, Ameren Services Company ("Ameren Services"), One  
3 Ameren Plaza, 1901 Chouteau Avenue, St. Louis, Missouri.

4           **Q.     What is your position with Ameren Services?**

5           A.     I am the Managing Supervisor of Quantitative Analytics in the Corporate  
6 Planning Department, which provides various types of support services to the operating  
7 companies owned by Ameren Corporation, including Union Electric Company d/b/a  
8 Ameren Missouri ("Ameren Missouri" or the "Company").

9           **Q.     Please describe your educational background and employment**  
10 **experience.**

11          A.     I received a Bachelor of Music degree from the University of Missouri-  
12 Columbia in 1996. I subsequently earned a Master of Music degree from Rice University  
13 in 1998, then a Master of Business Administration ("M.B.A.") degree with an emphasis  
14 in Economics from St. Louis University in 2002. While pursuing my M.B.A., I interned  
15 at Ameren Energy in the Pricing and Analysis Group. Following completion of my  
16 M.B.A. in May 2002, I was hired by Laclede Gas Company as a Senior Analyst in its  
17 Financial Services Department. In this role I assisted the Manager of Financial Services  
18 in coordinating all financial aspects of rate cases, regulatory filings, rating agency  
19 studies, and numerous other projects.

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1           In June 2004, I joined Ameren Services as a Forecasting Specialist. In this role, I  
2   developed forecasting models and systems that supported the Ameren operating  
3   companies' involvement in the Midwest Independent Transmission System Operator,  
4   Inc.'s ("MISO") Day 2 Energy Markets.

5           In November 2005, I moved into the Corporate Analysis Department of Ameren  
6   Services, where I was responsible for performing load research activities, electric and gas  
7   sales forecasts, and assisting with weather normalization for rate cases. In January 2007, I  
8   accepted a role I briefly held with Ameren Energy Marketing Company as an Asset and  
9   Trading Optimization Specialist before returning to Ameren Services as a Senior  
10   Commercial Transactions Analyst in July 2007. I was subsequently promoted to my  
11   present position as the Managing Supervisor of the Quantitative Analytics group, where  
12   among other things I supervise many of the same activities mentioned above that I  
13   performed upon joining the Corporate Analysis Department.

14           **Q.     What is the purpose of your testimony in this proceeding?**

15           A.     The purpose of my testimony is to describe the calculation of the dollar  
16   amount requested for the Accounting Authority Order ("AAO") requested in this  
17   proceeding. I will provide a means for accurately establishing the amount of fixed costs  
18   that went unrecovered specifically due to the substantial reduction in Noranda's load  
19   starting in late January 2009 as a result of a devastating ice storm that struck southeast  
20   Missouri at that time. A summary of this calculation is attached to my testimony as  
21   Schedule SMW-1. Company witness Lynn M. Barnes describes these events in more  
22   detail in her direct testimony.

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1     **Q.     Please explain your calculation.**

2           A.     The calculation quite simply uses the retail rates applicable to the Noranda  
3     load multiplied by the volumes<sup>1</sup> that were impacted by the outage to determine the  
4     forgone fixed cost recovery. I also calculated the portion of the retail rate that is  
5     attributable to net fuel costs, as 95% of the under-recovery of fuel costs was made up  
6     through the operation of the fuel-adjustment clause ("FAC") beginning March 1, 2009.  
7     Finally, I calculated the incremental off-system sales revenue retained by the Company  
8     pursuant to the 5% sharing in the FAC<sup>2</sup> that resulted from the utilization of generating  
9     capacity that had been planned to serve Noranda during the outage period. This revenue  
10    contributed to the fixed cost recovery otherwise foregone due to the load impairment.  
11    The result is a clear and accurate picture of the fixed costs that went unrecovered as a  
12    result of the ice storm and ensuing outage.

13           **Q.     Please explain how the calculation is laid out in Schedule SMW-1.**

14           A.     Moving from left to right across the page, I show the actual and  
15    normalized volumes of energy, demand and losses (on AECI's transmission system) and  
16    calculate the difference as the impact of the outage on Noranda's energy consumption. I  
17    also show the normalized level of energy at generation including losses on the Ameren

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<sup>1</sup> The outage impact volumes include an energy component, a demand component, and a loss component. The loss component accounts for contractually required energy Ameren Missouri supplies to Associated Electric Cooperative, Inc. ("AECI") to compensate it for losses incurred on its transmission system. Losses are supplied to AECI (and paid for by Noranda) because Ameren Missouri delivers the energy Noranda consumes to a delivery point on AECI's system approximately 40 miles from the Noranda plant, with the energy then being transported to Noranda by AECI pursuant to a separate transmission arrangement between Noranda and AECI. All components are priced according to the Company's Large Transmission Service ("LTS") rate schedule, which applies only to Noranda since Noranda is (and has been since adoption of the LTS rate) the Company's only LTS customer.

<sup>2</sup> For the period from January 27<sup>th</sup> through February 28<sup>th</sup>, prior to the effective date of the implementation of Ameren Missouri's first FAC tariff, 100% of the revenue from power not taken by Noranda was used to offset forgone fixed cost recovery.

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1 Missouri system for purposes of completing the FAC-related calculations. I then show  
2 the applicable rates for each measure (energy/demand/losses) that were in effect at the  
3 time the outage was ongoing. From there I calculate the foregone cost recovery (fixed  
4 and variable) due to the outage by simply applying the appropriate rates to the load  
5 reduction measures. Finally, I perform the FAC-related calculations which account for  
6 the variable costs for which accounting authority is not being sought. In the FAC, the  
7 Net Base Fuel Cost ("NBFC") rate, as defined in the tariff, is applied to the sales at  
8 generation to determine the amount of fuel costs the Company recovered through actual  
9 sales in its base rates. Because sales to Noranda were down during this time, fuel cost  
10 recovery was also down. The operation of the FAC allows Ameren Missouri to recover  
11 95% of that fuel cost recovery shortfall in future periods, so I show the calculation of that  
12 future recovery. Next, I show the incremental amount of off-system sales revenue the  
13 Company was able to retain in order to mitigate the lost fixed cost recovery. The final  
14 column shows the total lost fixed cost recovery the Company incurred, calculated by  
15 taking the total foregone cost recovery column and subtracting the NBFC and off-system  
16 sales sharing recoveries.

17 **Q. How were the volumes impacted by the outage determined?**

18 **A.** Because Noranda has an extremely consistent load, both in terms of total  
19 energy consumption and load shape (the pattern of energy consumption across time), I  
20 used actual historical load data as a proxy for the load that would have been expected to  
21 be present absent the outage. This is the same methodology used by both the Company  
22 and the Missouri Public Service Commission Staff ("Staff") to annualize Noranda's load  
23 for purposes of removing the impact of the outage from the test year in each of the

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1 Company's recent electric rate cases that included such impacts, Case Nos. ER-2010-  
2 0036 and ER-2011-0028.

3 **Q. How did you determine the dates that the outage started and ended?**

4 A. The start of the outage is quite easy to identify. We are all well aware of  
5 the ice storm as a discreet event that occurred on January 27, 2009. It is easy to see the  
6 Noranda load drop that evening around 10:00 p.m. when reviewing hourly consumption  
7 data. The end of the outage is more difficult to pinpoint precisely. Necessitated by the  
8 nature of the recovery work, Noranda's load came back in very small, incremental steps  
9 over a period of time exceeding a year. I chose April 9, 2010 as the date that Noranda  
10 returned to full load after careful inspection of the hourly load data. At this point,  
11 Noranda's load clearly sustained its pre-outage level on a consistent basis going forward.

12 **Q. Please summarize your testimony and conclusions.**

13 A. The substantial and sustained drop in Noranda's load due to the ice storm  
14 caused the Company to forgo recovery of \$36.19 million of fixed costs, which I was able  
15 to calculate with a high degree of accuracy given in particular the fact that Noranda is the  
16 only LTS customer and given Noranda's extremely consistent load, both in terms of total  
17 energy consumption and load shape.

18 **Q. Does this conclude your direct testimony?**

19 A. Yes, it does.

In the Matter of the Application of )  
Union Electric Company d/b/a Ameren )  
Missouri for the Issuance of an )  
Accounting Authority Order Relating to )  
its Electrical Operations. )

**STATE OF MISSOURI            )**  
                                       **) ss**  
**CITY OF ST. LOUIS          )**

**Amanda Teedall - Notary Public**  
**Notary Seal, State of**  
**Missouri - St. Charles County**  
**Commission #11158967**  
**My Commission Expires 9/5/2015**

