BEFORE THE PUBLIC SERVICE COMMISSION OF THE STATE OF MISSOURI

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In the Matter of the First True-Up Filing Under the Commission-Approved Fuel Adjustment Clause of Union Electric Company d/b/a Ameren Missouri.

File No. ER-2010-0274

STIPULATION OF FACTS

COME NOW Union Electric Company d/b/a Ameren Missouri ("Company" or "Ameren Missouri") and the Staff of the Missouri Public Service Commission (the "Staff") and agree that the following facts are true and undisputed:

1. The Company, the Staff, Public Counsel, the Missouri Industrial Energy Consumers ("MIEC"), and Noranda Aluminum, Inc. entered into a non-unanimous agreement, "Stipulation and Agreement as to all FAC Tariff Rate Design Issues" (the "FAC Stipulation"), in Case No. ER-2008-0318. A true and correct copy of the FAC Stipulation is attached hereto and incorporated herein by this reference as Exhibit A. The FAC Stipulation incorporates by reference part of the non-unanimous "Stipulation and Agreement as to Off-System Sales Related Issues" (the "OSS Stipulation") filed December 11, 2008 in Case No. ER-2008-0318. A true and correct copy of the OSS Stipulation is attached hereto and incorporated herein by this reference as Exhibit B

2. No party objected to the FAC Stipulation, and thus the Commission treated the FAC Stipulation as unanimous in accordance with the Commission's procedural rules. The Commission approved the FAC Stipulation as submitted.

3. Except for the "Summer NBFC Rate," the "Winter NBFC Rate," and the sharing percentage to be applied to changes in net fuel costs, the FAC Stipulation reflected agreement on all of

APPENDIX A

the terms and conditions of the Company's fuel adjustment clause, if the Commission authorized Ameren Missouri to implement a fuel adjustment clause in Case No. ER-2008-0318.

4. In Case No. ER-2008-0318 the Commission authorized Ameren Missouri to implement a fuel adjustment clause.

5. The Company filed fuel adjustment clause tariff sheets in Case No. ER-2008-0318 that included all the terms and conditions of the FAC Stipulation, the Staff reviewed them and recommended the Commission approve them, and the Commission approved the tariff sheets on February 19, 2009, to become effective March 1, 2009. A true and correct copy of the FAC tariff sheets the Commission approved in Case No. ER-2008-0318 are attached hereto and incorporated herein by this reference as Exhibit C, and hereinafter are referred to as "Rider FAC."

6. Rider FAC applied to electric service the Company provided from March 1, 2009, through June 20, 2010.

7. Rider FAC was in effect throughout some or all of five different Accumulation Periods ("AP"), as AP is defined in Rider FAC.

8. The Company will make a total of five true-up filings, one for each AP, in which the terms and conditions of Rider FAC will apply for all or part of the AP. This case is the first true-up filing and arose from the first AP under Rider FAC.

9. Starting with customer billings in the Ameren Missouri October 2009 billing month, customer bills contained a Rider FAC line item expressed in dollars, which reflected the FPA_C rate applied to each customer's usage during the period covered by the customer's bill.

10. The FPA_C rate is determined according to a formula in Rider FAC, as follows:

 $FPA_{C} = FPA_{(RP)} + FPA_{(RP-I)} + FPA_{(RP-2)}$ where $FPA_{(RP)} = [[(CF+CPP-OSSR-TS-S) - (NBFC \times S_{AP})] \times 95\% + I + R]/S_{RP}$ 11. The FPA_{C} rate formula contains several inputs, each of which must be determined according to the terms of Rider FAC. One of those inputs—"NBFC"— is defined in Rider FAC.

12. The FAC charges (or credits) appearing as a line item on customers' bills reflect for certain accumulation periods 95% of the difference between (i) and (ii), where (i) is the Company's actual fuel and purchased power costs adjusted by the Taum Sauk (TS) and Stipulation (S) factors as agreed to in the FAC Stipulation, net of off-system sales revenues during the relevant accumulation period(s), and (ii) is, for those same accumulation periods, NBFC multiplied by S_{AP} , where S_{AP} is "[s]upplied kWh during the Accumulation Period that ended prior to the applicable Filing Date, at the generation level."

13. "NBFC" is defined in Rider FAC tariff sheet no. 98.5.

14. The phrase "at the generation level" in the definition of NBFC means that Rider FAC required that the sales used to determine the Summer NBFC Rate and Winter NBFC Rate (the "Test Year Sales") be determined using kWh sales that included associated transmission and distribution losses, such that the Test Year Sales would reflect the total energy that must be generated to meet the normalized test year load upon which customer rates were set.

15. The Summer NBFC Rate and the Winter NBFC Rate were calculated by dividing allocated Summer and Winter Net Base Fuel Costs determined in Staff's simulation model runs ("Modeling Runs") attached as Appendix A to the OSS Stipulation by the respective normalized Summer and Winter kWh sales used in those Modeling Runs.

16. The normalized Summer and Winter kWh sales ("Test Year Sales") used to calculate the Summer NBFC Rate and the Winter NBFC Rate for Rider FAC were not at the generation level because they included distribution losses, but not transmission losses.

17. If the Test Year Sales used to calculate the Summer NBFC Rate and the Winter NBFC Rate in Rider FAC had included transmission losses, and thus had been determined at the generation level, the Summer NBFC Rate and the Winter NBFC Rate in Rider FAC would have been lower and resulted in the product of NBFC and S_{AP} being lower for each of the accumulation periods where the Summer NBFC Rate and the Winter NBFC Rate of Rider FAC are in effect for any purpose, including true-up and prudence reviews.

18. The Modeling Runs are based on the use of an average system loss factor of 4.9%.

19. The average system loss factor of 4.9% contained only distribution losses.

20. When the Modeling Runs were made, and also when Rider FAC was presented to the Commission in January 2009 for approval, neither the Company nor the Staff recognized that the Test Year Sales did not include transmission losses; thus, neither the Company nor the Staff realized that the Summer NBFC Rate and the Winter NBFC Rate in Rider FAC was not calculated at the generation level.

21. Prior to the commencement of the Midwest Independent Transmission System Operator, Inc. ("Midwest ISO") Day Two markets in 2005, the Company included distribution and transmission losses in the average system loss factors the Company used as part of the process of booking unbilled sales.

22. After the commencement of the Midwest ISO Day Two markets in 2005, the Company began selling its generation output into the Midwest ISO markets, and began purchasing from the Midwest ISO markets all of the energy required to serve the Company's load.

23. The Midwest ISO defines "load" to be net of system losses. "System losses" is the term the Midwest ISO uses to describe transmission losses. Consequently, "load" as defined by the Midwest ISO does not include transmission losses.

24. Because of the manner in which the Midwest ISO defines "load," when the Midwest ISO commenced Day Two markets the Company stopped including transmission losses in the Company's average system loss factors.

25. In calculating $\text{FPA}_{(\text{RP})}$ for each AP, the Company must multiply the appropriate NBFC (Summer NBFC Rate or Winter NBFC Rate) by S_{AP} . S_{AP} is defined by Rider FAC as "Supplied kWh during the Accumulation Period that ended prior to the applicable Filing Date, at the generation level."

26. In calculating $\text{FPA}_{(RP)}$ for each AP, the Company calculated S_{AP} according to its definition in Rider FAC; that is, the Company used estimated kWh, at the generation level, meaning the Company used billing month kWhs adjusted to estimate calendar month usage and adjusted for distribution and transmission losses as Ameren Missouri estimated them in its last loss study.

27. When the Company filed to change to its FPA_C based on the first AP, the Staff did not know the Company had not calculated the sales in the first AP in a manner (with transmission losses) consistent with the Test Year Sales (without transmission losses) used to calculate the Summer NBFC Rate of Rider FAC.

28. Because transmission losses were omitted from the Test Year Sales used to calculate the Summer NBFC Rate and Winter NBFC Rate of Rider FAC, the Summer NBFC Rate and the Winter NBFC Rate of Rider FAC were determined on one basis (without transmission losses; i.e., not at the generation level) and S_{AP} was determined on a different basis (with transmission losses; i.e., at the generation level), creating an unintended mismatch. This mismatch produces a Summer NBFC Rate multiplied by Summer S_{AP} and a Winter NBFC Rate multiplied by Winter S_{AP} , against which actual net fuel costs are compared in determining the FPA_(RP) for the accumulation period that is charged (or credited) to customers through FPA_C, that were higher than they would have been had transmission

losses been included when the Summer NBFC Rate and Winter NBFC Rate of Rider FAC were calculated.

29. The Company discovered this mismatch in November 2009 and initially contacted the Staff about it shortly thereafter. They had discussions about the issue in early 2010. Then the Staff, representatives of MIEC and the Company met about the issue on May 11, 2010.

30. The Company and the Staff again met about the issue on August 17, 2010.

31. The Recovery Period (as defined in Rider FAC) arising from the first AP was completed on September 30, 2010.

32. The Company's true-up filing for the first Recovery Period was due and filed by the Company on December 1, 2010.

33. The Company's true-up filing reflects an additional \$482,239 the Company would have billed to its customers throughout the first Recovery Period had the above-described mismatch not existed.

34. This mismatch in including and not including transmission losses in the calculations of the Summer NBFC Rate, Winter NBFC Rate and S_{AP} continued in the Company's calculations of FPA_(RP), FPA_(RP-1) and FPA_(RP-2) throughout the recovery periods for some or all of five different accumulation periods where the Summer NBFC Rate and Winter NBFC Rate found in Rider FAC applied.

35. The Company's position is that it is lawful for the Commission to and that it should allow the Company to collect the additional \$482,239 (plus accumulated interest) through its future FPA_C applied commencing with the first FPA_C adjustment that occurs after this case is resolved, and that the Commission can and should order that the impact of the above-described mismatch be corrected in the Company's next four true-up filings.

36. The Staff's position is that, as a matter of law, the Commission cannot provide the relief requested by the Company; and, secondarily, if it is lawful for the Commission to provide the relief requested by the Company, the Commission should not grant the requested relief.

37. The Company and the Staff agree that the Commission's resolution of this issue, whether in favor of the Company's position or the Staff's position, should apply to this first true-up filing and the Company's next four true-up filings, subject to the rights existing under Section 386.500 et seq., RSMo.

38. The estimated impact of correction of the above-described mismatch in the true-up filings applicable to the next four Recovery Periods is as follows:

 Recovery Period 2:
 \$1,619,423

 Recovery Period 3:
 \$ 982,216

 Recovery Period 4:
 \$1,554,742

 Recovery Period 5:
 \$ 496,675

39. The Summer NBFC Rate and the Winter NBFC Rate in the tariff sheets that succeed Rider FAC that applies to service taken by the Company's customers on and after June 21, 2010 (arising from Case No. ER-2010-0036) were determined at the generation level using sales that include distribution and transmission losses, meaning the issue regarding the mismatch described herein will not be an issue for Accumulation Periods after the fifth Accumulation Period, i.e., starting with the true-up filing for Recovery Period 6.

WHEREFORE, Ameren Missouri and the Staff hereby submit this Stipulation of Facts.

SMITH LEWIS, LLP

/s/James B. Lowery

James B. Lowery, #40503 Suite 200, City Centre Building 111 South Ninth Street P.O. Box 918 Columbia, MO 65205-0918 Phone (573) 443-3141 Facsimile (573) 442-6686 lowery@smithlewis.com

Attorneys for Union Electric Company d/b/a Ameren Missouri UNION ELECTRIC COMPANY d/b/a Ameren Missouri

Thomas M. Byrne, #33340 Managing Associate General Counsel 1901 Chouteau Avenue, MC-1310 P.O. Box 66149, MC-1310 St. Louis, MO 63101-6149 (314) 554-2514 (Telephone) (314) 554-4014 (Facsimile) tbyrne@ameren.com

STAFF OF THE MISSOURI PUBLIC SERVICE COMMISSION

<u>/s/ Nathan Williams</u>

Nathan Williams Deputy Counsel Missouri Bar No. 35512 Attorney for the Staff of the Missouri Public Service Commission P. O. Box 360 Jefferson City, MO 65102 (573) 751-8702 (Telephone) (573) 751-9285 (Fax) nathan.williams@psc.mo.gov

CERTIFICATE OF SERVICE

I hereby certify that a true and correct copy of the above and foregoing document was served via e-mail on all counsel of record to the case in which the fuel adjustment clause in effect for the true-up filing made herein was approved, on this 3rd day of March, 2011.

/s/James B. Lowery

BEFORE THE PUBLIC SERVICE COMMISSION OF THE STATE OF MISSOURI

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In the Matter of Union Electric Company d/b/a AmerenUE for Authority to File Tariffs Increasing Rates for Electric Service Provided to Customers in the Company's Missouri Service Area.

Case No. ER-2008-0318

STIPULATION AND AGREEMENT AS TO ALL FAC TARIFF RATE DESIGN ISSUES

COME NOW Union Electric Company d/b/a AmerenUE ("AmerenUE" or the "Company"), the Staff of the Missouri Public Service Commission, the Office of the Public Counsel ("OPC"), the Missouri Industrial Energy Consumers, and Noranda Aluminum, Inc., and respectfully state to the Missouri Public Service Commission ("Commission") that, as a result of negotiations, the undersigned parties (individually, a "Signatory Party" or collectively, the "Signatory Parties") have reached the stipulations and agreements contained herein in order to settle the issues specified below. As set forth below, this Stipulation and Agreement does not settle the issue of whether or not the Company should be permitted to use a fuel adjustment clause ("FAC") or the issue of what an appropriate sharing percentage in any FAC that might be approved should be, neither of which are FAC rate design issues.

1. Issues Settled. If, but only if, the Commission determines that the Company should be permitted to use an FAC, this Stipulation and Agreement settles all known rate design issues relating to the Company's request to implement an FAC and the terms and conditions of the FAC tariff (except that the

sharing percentage to be inserted into the $FPA_{(RP)}$ formula in the revised FAC tariff attached hereto and incorporated herein by this reference as **Appendix A** will depend on whether an FAC is approved and what sharing percentage is approved by the Commission and with the exceptions stated in paragraph 8).

As noted above, no Signatory Party and no party to this case that does not object to this Stipulation and Agreement shall be deemed to have agreed that it is appropriate for the Commission to permit the Company to use an FAC, nor shall any Signatory Party or party to this case that does not object to this Stipulation and Agreement be deemed to have waived or relinquished its right to oppose the Company's request for an FAC or to have waived or relinquished its right to oppose the Company's proposed 95%/5% sharing mechanism. Any Signatory Party or other party to this case that does not object to this Stipulation and Agreement who has previously filed testimony on FAC issues in this case shall remain free to oppose the FAC request or to propose alternative mechanisms to share the changes in Net Fuel Costs (as defined in the Stipulation and Agreement As to Off-System Sales Related Issues ("OSS Stipulation") filed on December 11, 2008 in this case) through the FAC, if the Company is permitted to use an FAC.

2. Specific Agreements. In settlement of the issues identified above, and only in the event the Company is permitted to use an FAC, the following specific agreements have been reached among the Signatory Parties:

a. Factor NBFC (as defined in the revised FAC tariff attached hereto and incorporated herein by this reference as Appendix B) will be

seasonally differentiated such that a "Summer NBFC Value" (as defined below) applies to June-September ("Summer") calendar months and a "Winter NBFC Value" (as defined below) applies to October-May ("Winter") calendar months.

b. The Summer NBFC Rate and the Winter NBFC Rate shall be calculated as follows: the annual value of costs and revenues associated with the already-settled Net Fuel Costs will be allocated to the Summer and Winter months as follows:

i. The modeled fuel and purchased power costs less modeled revenues from off-system sales of energy used to calculate Net Fuel Costs as specified in paragraph 2 of the OSS Stipulation will be determined for Summer and Winter calendar months based on the monthly results of the Staff's production cost modeling runs attached to the OSS Stipulation as Appendix A thereto, which monthly results are attached hereto and incorporated herein by this reference as **Appendix B**;

ii. Net Fuel Cost components not reflected in Staff's modeled components of Net Fuel Costs as specified in paragraph 2 of the OSS Stipulation shall be pro-rated to Summer and Winter calendar months based on the number of days in each period.

c. The Summer NBFC Rate and the Winter NBFC Rate will be calculated by dividing allocated Summer and Winter Net Base Fuel Costs by normalized Summer and Winter kWh sales (at the generation level),

respectively, as determined in Staff's simulation model runs attached as Appendix A to the OSS Stipulation.

d. The term "NBFC x S_{AP} " in the FPA formula in the FAC tariff will be applied on a calendar month basis such that the Summer NBFC Rate is applied to the kWh delivered (at the generation level consistent with the definition of the term S_{AP}) during Summer calendar months of any Accumulation Period (as defined in the FAC tariff) and the Winter NBFC Rate is applied to the kWh delivered (at the generation level consistent with the definition of the term S_{AP}) during the Winter calendar months of any Accumulation Period.

e. There will be three 4-month Accumulation Periods per year, defined as Calendar months February through May, June through September, and October through January. The first Accumulation Period will be from the start of the effective date of rates set in this case (anticipated to be March 1, 2009) through May 31, 2009.

f. The Recovery Periods (as defined in the FAC tariff) will be synchronized with monthly billing periods such that: (1) two FAC-related changes in rates will coincide with existing seasonal changes in rates; and (2) one additional FAC-related change in rates will occur in February.

g. Each Recovery Period will last twelve billing months.

h. The timing of the Accumulation Periods, Recovery Periods and other events are depicted in Schedule MJL-SR11 attached to Mr. Lyons'

surrebuttal testimony, which is also attached hereto and incorporated herein as **Appendix C**.

i. The Signatory Parties agree to the definitions of Factors CF, CPP, and OSSR on the exemplar tariff sheets attached hereto.

k. Factor CPP shall provide that changes in replacement power insurance premiums (other than those relating to the Taum Sauk Plant) from the level reflected in base rates shall increase or decrease purchased power costs. It will also provide that costs of purchased power will be reduced by expected replacement power insurance recoveries (other than those relating to the Taum Sauk Plant) qualifying as assets under Generally Accepted Accounting Principles. Concurrently with the date the "TS" factor is eliminated, the premiums and recoveries relating to replacement power insurance coverage for the Taum Sauk Plant shall be included in the CPP Factor.

I. The Company shall use its reasonable best efforts to maintain at least its current levels of replacement power insurance coverage until the effective date of rates set in its next general rate proceeding unless the Company reasonably believes it would be imprudent to do so. If the Company elects not to maintain at least its current levels of coverage it shall document its reasons for its election, which shall be included in the Company's next quarterly surveillance filing made under the Commission's FAC rules. The cost of the Company's current level of

replacement power insurance coverage included in base rates in this case is \$2.4 million.

m. Tariff sheet 98.6 attached hereto and incorporated herein by this reference as **Appendix D** will also become a part of the FAC tariff, if an FAC is approved by the Commission.

n. Insofar as this Stipulation and Agreement resolves all known FAC rate design issues in this case, the witnesses listed under FAC Rate Design issue on the List and Order/Schedule of Issues, and Order of Witnesses and Opening Statements filed in this case shall not be required to further testify in this case, except if Commissioners have questions of them as provided for in paragraph 7 of this Stipulation and Agreement below.

3. This Stipulation and Agreement is being entered into solely for the purpose of disposing of the issues that are specifically addressed in this Stipulation and Agreement. In presenting this Stipulation and Agreement, none of the Parties to this Stipulation and Agreement shall be deemed to have approved, accepted, agreed, consented or acquiesced to any ratemaking principle, procedural principle, or principle or rule of law, including, without limitation, any method of cost or revenue determination or cost allocation or revenue related methodology, or any legal principle or rule of law relating to whether or not the Commission can or cannot modify or discontinue an FAC for the Company (if an FAC is permitted in this case) in a subsequent rate case.

terms of this Stipulation and Agreement (whether this Stipulation and Agreement is approved or not) in this or any other proceeding, other than a proceeding limited to enforce the terms of this Stipulation and Agreement, except as otherwise expressly specified herein.

4. This Stipulation and Agreement has resulted from extensive negotiations and the terms hereof are interdependent. If the Commission does not approve this Stipulation and Agreement without modification, then the Stipulation and Agreement as a whole and without modification shall be void and no Party shall be bound by any of the agreements or provisions herein, except as specifically provided herein.

5. If the Commission does not unconditionally approve this Stipulation and Agreement without modification, and notwithstanding its provision that it shall become void, neither this Stipulation and Agreement, nor any matters associated with its consideration by the Commission, shall be considered or argued to be a waiver of the rights that any Party has for a decision in accordance with Section 536.080 RSMo 2000 or Article V, Section 18 of the Missouri Constitution, and the Parties shall retain all procedural and due process rights as fully as though this Stipulation and Agreement had not been presented for approval, and any suggestions or memoranda, testimony or exhibits that have been offered or received in support of this Stipulation and Agreement shall become privileged as reflecting the substantive content of settlement discussions and shall be stricken from and not be considered as part of the administrative or evidentiary record before the Commission for any further purpose whatsoever.

6. If the Commission unconditionally accepts the specific terms of this Stipulation and Agreement without modification, the Parties waive, with respect to the issues resolved herein: their respective rights (1) to call, examine and cross-examine witnesses pursuant to Section 536.070(2), RSMo 2000; (2) their respective rights to present oral argument and/or written briefs pursuant to Section 536.080.1, RSMo 2000; (3) their respective rights to seek rehearing pursuant to Section 386.500, RSMo 2000 and (4) their respective rights to judicial review pursuant to Section 386.510, RSMo 2000. These waivers apply only to a Commission order respecting this Stipulation and Agreement issued in this above-captioned proceeding, and do not apply to any matters raised in any prior or subsequent Commission proceeding, or any matters not explicitly addressed by this Stipulation and Agreement. This Stipulation and Agreement contains the entire agreement of the Parties concerning the issues addressed herein.

7. If the provisions of paragraph 2 of this Stipulation and Agreement contradict or are inconsistent with the provisions of the exemplar FAC tariff attached hereto, the FAC tariff shall control.

8. Notwithstanding paragraph 7, OPC reserves the right to contest whether Factors CPP and OSSR should include all costs and revenues associated with all energy and capacity sales made by the Company, including purely financial transactions. Moreover, notwithstanding paragraph 7, OPC is not waiving the right to argue that the Commission's FAC rules allow exceptions to the use of historic costs.

9. This Stipulation and Agreement does not constitute a contract with the Commission.

10. If the Commission has questions for the Parties' witnesses or Parties, the Parties will make available, at any on-the-record session, their witnesses and attorneys on the issues resolved by this Stipulation and Agreement, so long as all Parties have had adequate notice of that session. The Parties agree to cooperate in presenting this Stipulation and Agreement to the Commission for approval, and will take no action, direct or indirect, in opposition to the request for approval of this Stipulation and Agreement.

WHEREFORE, the undersigned Parties respectfully request the Commission to issue an order in this case approving the Stipulation and Agreement subject to the specific terms and conditions contained therein.

Respectfully submitted,

Steven R. Sullivan, # 33102 Sr. Vice President, General Counsel and Secretary Thomas M. Byrne, # 33340 Managing Assoc. General Counsel Ameren Services Company P.O. Box 66149 St. Louis, MO 63166-6149 (314) 554-2098 (314) 554-2098 (314) 554-2514 (phone) (314) 554-4014 (fax) ssullivan@ameren.com tbyrne@ameren.com

SMITH LEWIS, LLP

/s/James B. Lowery

James B. Lowery, # 40503 Suite 200, City Centre Building 111 South Ninth Street P.O. Box 918 Columbia, MO 65205-0918 Phone (573) 443-3141 Facsimile (573) 442-6686 <u>Iowery@smithlewis.com</u>

Attorneys for Union Electric Company d/b/a AmerenUE

/s/ Steven Dottheim_

Steven Dottheim Chief Deputy General Counsel Missouri Bar No. 29149 P. O. Box 360 Jefferson City, MO 65102 (573) 751-7489 (Telephone) (573) 751-9285 (Fax) steve.dottheim@psc.mo.gov Attorney for the Staff of the Missouri Public Service Commission

<u>/s/ Lewis R. Mills, Jr.</u> Lewis R. Mills, Jr. (# 35275) Public Counsel P O Box 2230 Jefferson City, MO 65102 (573) 751-1304 (573) 751-5562 FAX <u>lewis.mills@ded.mo.gov</u> Attorney for the Office of the Public Counsel

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/s/ Diana M. Vuylsteke_

Diana M. Vuylsteke, # 42419 Bryan Cave, LLP 211 N. Broadway, Suite 3600 St. Louis, Missouri 63102 Telephone: (314) 259-2543 Facsimile: (314) 259-2020 E-mail: <u>dmvuylsteke@bryancave.com</u> Attorney for The Missouri Industrial Energy Consumers

Isl Stuart W. Conrad Stuart W. Conrad, # 23966 Finnegan, Conrad & Peterson, L.C. 3100 Broadway, Suite 1209 Kansas City, Missouri 64111 (816) 753-1122 Facsimile (816)756-0373 Internet: stucon@fcplaw.com Attorney for Noranda Aluminum, Inc.

UNION ELECTRIC COMPANY

ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5

CANCELLING MO.P.S.C. SCHEDULE NO.

SHEET NO. 98.1 SHEET NO.

Original

MISSOURI SERVICE AREA

APPLYING TO

MIDDOONI DERVICE INCHI

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE

APPLICABILITY

This rider is applicable to kilowatt-hours (kWh) of energy supplied to customers served by the Company under Service Classification Nos. 1(M), 2(M), 3(M), 4(M), 5(M), 6(M), 7(M), 8(M), 11(M), and 12(M).

Costs passed through this Fuel and Purchased Power Adjustment Clause (FAC) reflect differences between actual fuel and purchased power costs, including transportation, net of Off-System Sales Revenues (OSSR) (i.e., Actual Net Fuel Costs) and Net Base Fuel Costs (factor NBFC, as defined below), calculated and recovered as provided for herein.

For purposes of this FAC, the true-up year shall be from March 1 through the last day of February of the following year. The Accumulation Periods and Recovery Periods are as set forth in the following table:

| Accumulation Period (AP) | Filing Date | Recovery Period (RP) |
|--------------------------|---------------|---------------------------|
| February through May | By August 1 | October through September |
| June through September | By December 1 | February through January |
| October through January | By April 1 | June through May |

Accumulation Period (AP) means the historical calendar months during which fuel and purchased power costs, including transportation, net of OSSR for all kWh of energy supplied to Missouri retail customers are determined.

Recovery Period (RP) means the billing months as set forth in the above table during which the difference between the Actual Net Fuel Costs during an Accumulation Period and NBFC are applied to and recovered through retail customer billings on a per kWh basis, as adjusted for service voltage level.

The Company will make a Fuel and Purchased Power Adjustment (FPA) filing by each Filing Date. The new FPA rates for which the filing is made will be applicable starting with the Recovery Period that begins following the Filing Date. All FPA filings shall be accompanied by detailed workpapers supporting the filing in an electronic format.

FPA DETERMINATION

 $\underbrace{\qquad \qquad } percent of the difference between Actual Net Fuel Costs and NBFC for all kWh of energy supplied to Missouri retail customers during the respective Accumulation Periods shall be reflected as an FPA_c credit or debit, stated as a separate line item on the customer's bill and will be calculated according to the following formulas.$

For the FPA filing made by each Filing Date, the FPA_c rate, applicable starting with the Recovery Period following the applicable Filing Date, to recover fuel and purchased power costs, including transportation, net of OSSR, to the extent they vary from Net Base Fuel Costs (NBFC), as defined below, during the recently-completed Accumulation Period is calculated as:

* Indicates Addition.

| DATE OF ISSUE | April 4, 2008 | DATE EFFECTIVE | May 4, 2008 |
|---------------|-----------------|-----------------|---------------------|
| | | | Appendix A |
| ISSUED BY | T. R. Voss | President & CEO | St. Louis, Missouri |
| | NAME OF OFFICER | TITLE | ADDRESS |

UNION ELECTRIC COMPANY ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5 Original SHEET NO. 98.2

| | G MO.P.S.C. SCHEDULE NO SHI | EET NO |
|---------------------|---|--|
| APPLYING TO | MISSOURI SERVICE AREA | |
| F | * <u>RIDER FAC</u> UEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.) | |
| $FPA_{(RP)} =$ | = [[(CF+CPP-OSSR-TS-S) - (NBFC x S _{AP})]x% + I + R] | /S _{RP} |
| | , which will be multiplied by the voltage level adjustr forth below, applicable starting with the following Rec lculated as: | |
| | $FPA_{C} = FPA_{(RP)} + FPA_{(RP-1)} + FPA_{(RP-2)}$ | |
| where: | | |
| FPA _C = | Fuel and Purchased Power Adjustment rate applicable s with the Recovery Period following the applicable Fil Date. | |
| FPA _{RP} = | FPA Recovery Period rate component calculated to reco under/over collection during the Accumulation Period ended prior to the applicable Filing Date. | |
| $FPA_{(RP-1)} =$ | FPA Recovery Period rate component from prior $\mbox{FPA}_{\mbox{\tiny RP}}$ calculation, if any. | |
| $FPA_{(RP-2)} =$ | FPA Recovery Period rate component from $\mbox{FPA}_{\mbox{RP}}$ calculat prior to $\mbox{FPA}_{\mbox{(RP-1)}}$, if any. | ion |
| CF = | Fuel costs incurred to support sales to all retail cu and Off-System Sales allocated to Missouri retail ele operations, including transportation, associated with Company's generating plants. These costs consist of following: | ctric the |
| | a) For fossil fuel or hydroelectric plants: | |
| | (i) the following costs reflected in Federal Regulatory Commission (FERC) Account Number 501 commodity, applicable taxes, gas, alternative f fuel additives, Btu adjustments assessed by coa suppliers, railroad transportation, switching a demurrage charges, railcar repair and inspectio railcar depreciation, railcar lease costs, simi costs associated with other applicable modes of transportation, fuel hedging costs (for purpose factor CF, hedging is defined as realized losse costs minus realized gains associated with miti volatility in the Company's cost of fuel and pu power, including but not limited to, the Compan of futures, options and over-the-counter deriva including, without limitation, futures contract calls, caps, floors, collars, and swaps), hedgi associated with SO2 and fuel oil | <pre>: coal uels, l nd n costs, lar s of s and gating rchased y's use tives s, puts,</pre> |
| * Indicates A | Addition. | |

| DATE OF ISSUE | April 4, 2008 | DATE EFFECTIVE | May 4, 2008 |
|---------------|-----------------|-----------------|-----------------------------------|
| ISSUED BY | T. R. Voss | President & CEO | Appendix A St. Louis, Missouri |
| | NAME OF OFFICER | TITLE | ADDRESS |

UNION ELECTRIC COMPANY ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5

CANCELLING MO.P.S.C. SCHEDULE NO.

Original SHEET NO. 98.3

SHEET NO.

| PLYING TO | MISSOURI SERVICE AREA |
|-------------|--|
| Ī | * <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.) |
| | adjustments included in commodity and transportation costs, broker commissions and fees associated with price hedges, oil costs, ash disposal revenues and expenses, and revenues and expenses resulting from fuel and transportation portfolio optimization activities; and |
| | (ii) the following costs reflected in FERC Account Number 547: natural gas generation costs related to commodity, oil, transportation, storage, capacity reservation charges, fuel losses, hedging costs, and revenues and expenses resulting from fuel and transportation portfolio optimization activities; |
| | b) Costs in FERC Account Number 518 (Nuclear Fuel Expense). |
| CPP = | Costs of purchased power reflected in FERC Account Numbers 555, 565, and 575, excluding MISO administrative fees arising under MISO Schedules 10, 16, 17, and 24, and excluding capacity charges for contracts with terms in excess of one (1) year, incurred to support sales to all Missouri retail customers and Off-System Sales allocated to Missouri retail electric operations. Also included in factor "CPP" are insurance premiums in FERC Account Number 924 for replacement power insurance (other than relating to the Taum Sauk Plant) to the extent those premiums are not reflected in base rates. Changes in replacement power insurance premiums (other than those relating to the Taum Sauk Plant) from the level reflected in base rates shall increase or decrease purchased power costs. Additionally, costs of purchased power will be reduced by expected replacement power insurance recoveries (other than those relating to the Taum Sauk Plant) qualifying as assets under Generally Accepted Accounting Principles. Notwithstanding the foregoing, concurrently with the date the "TS" factor is eliminated as provided for in this tariff, the premiums and recoveriage for the Taum Sauk Plant shall be included in this CPP Factor. |
| OSSR = | Revenues from Off-System Sales allocated to Missouri electric operations. Off-System Sales shall include all sales transactions (including MISO revenues in FERC Account Number 447), excluding Missouri retail sales and long-term full and |
| | partial requirements sales, that are associated with (1) AmerenUE Missouri jurisdictional generating units, (2) power purchases made to serve Missouri retail load, and (3) any related transmission. |
| * Indicates | |

DATE OF ISSUE April 4, 2008 DATE EFFECTIVE May 4, 2008 Appendix A ISSUED BY T. R. Voss NAME OF OFFICER <u>St. Louis, Missouri</u> ADDRESS <u>President & CEO</u> TITLE

UNION ELECTRIC COMPANY

ELECTRIC SERVICE

| MO.P.S.C. SCHEDULE NO. | 5 |
|------------------------|---|
|------------------------|---|

CANCELLING MO.P.S.C. SCHEDULE NO.

SHEET NO. 98.4

SHEET NO.

Original

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MISSOURI SERVICE AREA

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.)

TS = The Accumulation Period value of Taum Sauk. This factor will be used to reduce actual fuel costs to reflect the value of Taum Sauk, and will be credited in FPA filings (of which there are three each year as shown in the table above), until the next rate case or, if sooner, until Taum Sauk is placed back in service. This value is \$22.7 million annual for each true-up year as determined in the rate proceeding in which this FAC was established, one third of which (i.e., \$7.56 million) will be applied to each Accumulation Period.

- S = The Accumulation Period value of Blackbox Settlement Amount of \$3 million annually, which shall expire on September 1, 2010. One third of the annual value (\$1 million) shall be applied to each Accumulation Period. For the Accumulation Period during which the factor expires, the factor shall be prorated according to the number of days during which it was effective during that Accumulation Period.
- I = Interest applicable to (i) the difference between Actual Net Fuel Costs (adjusted for Taum Sauk and factor "S") and NBFC for all kWh of energy supplied to Missouri retail customers during an Accumulation Period until those costs have been recovered; (ii) refunds due to prudence reviews (a portion of factor R, below); and (iii) all under- or over-recovery balances created through operation of this FAC, as determined in the annual true-up filings provided for herein (a portion of factor R, below). Interest shall be calculated monthly at a rate equal to the weighted average interest rate paid on the Company's short-term debt, applied to the month-end balance of items (i) through (iii) in the preceding sentence.
- R = Under/over recovery (if any) from currently active and prior Recovery Periods as determined for the annual FAC true-up adjustments, and modifications due to adjustments ordered by the Commission (other than the adjustment for Taum Sauk as already reflected in the TS factor), as a result of required prudence reviews or other disallowances and reconciliations, with interest as defined in item I.
- S_{AP} = Supplied kWh during the Accumulation Period that ended prior to the applicable Filing Date, at the generation level.
- S_{RP} = Applicable Recovery Period estimated kWh, at the generation level, subject to the FPA_{RP} to be billed.

* Indicates Addition.

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|---------------|-----------------|-----------------|---------------------|
| _ | - | | Appendix A |
| ISSUED BY | T. R. Voss | President & CEO | St. Louis, Missouri |
| | NAME OF OFFICER | TITLE | ADDRESS |
| | | | |

UNION ELECTRIC COMPANY

ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5

CANCELLING MO.P.S.C. SCHEDULE NO.

Original

SHEET NO. 98.5

SHEET NO.

APPLYING TO

MISSOURI SERVICE AREA

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.)

NBFC = Net Base Fuel Costs are the net costs determined by the Commission's order as the normalized test year value (and reflecting an adjustment for Taum Sauk, consistent with the term TS) for the sum of allowable fuel costs (consistent with the term CF), plus cost of purchased power (consistent with the term CPP), less revenues from off-system sales (consistent with the term OSSR), less an adjustment consistent with the term "S", expressed in cents per kWh, at the generation level, as included in the Company's retail rates. The NBFC rate applicable to June through September calendar months ("Summer NBFC Rate") is x.xxx cents per kWh. The NBFC rate applicable to October through May calendar months ("Winter NBFC Rate") is x.xxx cents per kWh.

To determine the FPA rates applicable to the individual Service Classifications, the FPA_c rate determined in accordance with the foregoing will be multiplied by the following voltage level adjustment factors:

| Secondary Voltage Service | 1.0888 |
|------------------------------------|--------|
| Primary Voltage Service | 1.0492 |
| Large Transmission Voltage Service | 1.0147 |

The FPA rates applicable to the individual Service Classifications shall be rounded to the nearest 0.001 cents, to be charged on a cents/kWh basis for each applicable kWh billed.

TRUE-UP OF FAC

After the completion of each true-up year, the Company will make a true-up filing by May 1 of each year (starting by May 1, 2010) with the Commission. Such filings shall be made by May 1 of every subsequent year until all fuel and purchased power costs accumulated during the effective period of the FAC have been recovered and trued-up. Any true-up adjustments or refunds shall be reflected in item R above, and shall include interest calculated as provided for in item I above.

The true-up adjustment shall be the difference between the revenues billed and the revenues authorized for collection during the true-up year.

GENERAL RATE CASE/PRUDENCE REVIEWS

The following shall apply to this Fuel and Purchased Power Adjustment Clause, in accordance with Section 386.266.4, RSMo.and applicable Missouri Public Service Commission Rules governing rate adjustment mechanisms established under Section 386.266, RSMo:

The Company shall file a general rate case with the effective date of new rates to be no later than four years after the effective date of a Missouri Public Service Commission order implementing or continuing this Fuel and Purchased Power Adjustment Clause. The four-year period referenced above shall not include any periods in which the Company is prohibited from

| DATE OF ISSUE | April 4, 2008 | DATE EFFECTIVE | May 4, 2008 |
|---------------|-----------------|-----------------|---------------------|
| _ | _ | | - Appendix A |
| ISSUED BY | T. R. Voss | President & CEO | St. Louis, Missouri |
| | NAME OF OFFICER | TITLE | ADDRESS |

UNION ELECTRIC COMPANY ELECTRIC SERVICE

| MO.P.S.C. SCHEDULE NO. | 5 | Original | SHEET NO. | 98.5 |
|-----------------------------------|---|----------|-----------|------|
| CANCELLING MO.P.S.C. SCHEDULE NO. | | | SHEET NO. | |

APPLYING TO

MISSOURI SERVICE AREA

collecting any charges under this Fuel and Purchased Power Adjustment Clause, or any period for which charges hereunder must be fully refunded. In the event a court determines that this Fuel and Purchased Power Adjustment Clause is unlawful and all moneys collected hereunder are fully refunded, the Company shall be relieved of the obligation under this Fuel and Purchased Power Adjustment Clause to file such a rate case. Prudence reviews of the costs subject to this Fuel and Purchased Power Adjustment Clause shall occur no less frequently than every eighteen months, and any such costs which are determined by the Missouri Public Service Commission to have been imprudently incurred shall be returned to customers with interest at a rate equal to the weighted average interest rate paid on the Company's short-term debt. *Indicates Addition.

 DATE OF ISSUE
 April 4, 2008
 DATE EFFECTIVE
 May 4, 2008

 ISSUED BY
 T. R. Voss
 President & CEO
 St. Louis, Missouri

 NAME OF OFFICER
 TITLE
 ADDRESS

Commission Case - True Up Commission Case - True Up Baseline (test) 2008

Energy Generated (MWH)

Page: 1

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| Source | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec | Jan | Feb | Mar | Total |
|--|----------------------|----------------------|---------------------|----------------------|----------------------|---------------------|----------------------|----------------------|----------------------|----------------------|----------|----------|--------------------------|
| Generating Units | | | | | | | | | | | | | |
| AUDRAIN CT1 | 0 | 0 | 1,514 | 1,614 | 234 | 283 | 339 | 2 | 583 | 211 | 0 | 7 | 4,788 |
| AUDRAIN CT2 | 0 | 2 | 1,555 | 1,578 | 240 | 288 | 338 | 0 | 573 | 214 | 0 | 5 | 4,793 |
| AUDRAIN CT3 | 0 | 2 | 1,547 | 1,557 | 240 | 278 | 362 | 0 | 584 | 221 | 0 | 0 | 4,791 |
| AUDRAIN CT4 | Ő | 2 | 1,526 | 1,546 | 228 | 276 | 362 | 0 | 589 | 229 | 0 | 0 | 4,758 |
| AUDRAIN CT5 | 0 | 2 | 1,519 | 1,534 | 235 | 268 | 364 | 0 | 579 | 208 | 0 | 0 | 4,710 |
| AUDRAIN CT6 | 0 | 2 | 1,580 | 1,597 | 214 | 288 | 331 | 0 | 558 | 229 | 0 | 0 | 4,800 |
| AUDRAIN CT7 | 0 | 2 | 1,514 | 1,641 | 243 | 278 | 349 | 0 | 555 | 229 | 0 | 0 | 4,811 |
| AUDRAIN CT8 | 0 | 2 | 1,516 | 1,564 | 243 | 293 | 338 | 0 | 579 | 191 | 0 | 0 | 4,726 |
| CALLAWAY 1D | 153,747 | 723,938 | 817,183 | 861,601 | 861,140 | 820,822 | 884,814 | 838,192 | 865,025 | 853,906 | 813,973 | 817,994 | 9,312,333 |
| FAIRGROUNDS GT | 0 | 0 | 0 | 5 | 5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 9 |
| GOOSE CREEK CT1 | 0 | 2 | 1,525 | 1,392 | 239 | 291 | 357 | 0 | 596 | 227 | 0 | 0 | 4,628 |
| GOOSE CREEK CT2 | 0 | 2 | 1,520 | 1,505 | 224 | 276 | 372 | 0 | 561 | 219 | 0 | 0 | 4,679 |
| GOOSE CREEK CT3 | 0 | 2 | 1,495 | 1,491 | 231 | 286 | 372 | 0 | 556 | 224 | 0 | 0 | 4,657 |
| GOOSE CREEK CT4 | 0 | 2 | 1,464 | 1,478 | 229 | 279 | 374 | 0 | 576 | 227 | 0 | 0 | 4,628 |
| GOOSE CREEK CT5 | 0 | 2 | 1,496 | 1,441 | 209 | 281 | 359 | 0 | 573 | 227 | 0 | 0 | 4,588 |
| GOOSE CREEK CT6 | 0 | 2 | 1,536 | 1,479 | 224 | 276 | 370 | 0 | 584 | 227 | 0 | 0 | 4,697 |
| HOWARD BEND CT | 0 | 1 | 0 | 7 | 4 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 12 |
| KINMUNDY CT 1 | 0 | 0 | 428 | 1,088 | 18 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 1,533 |
| KINMUNDY CT 2 | 0 | 0 | 428 | 1,088 | 18 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 1,533 |
| KIRKSVILLE CT | 0 | 0 | 0 | 1 | 1 | 0 | 2 | 1 | 0 | 0 | 0 | 0 | 6 |
| LABADIE 1 | 390,247 | 382,920 | 394,263 | 401,835 | 413,383 | 372,112 | 0 | 150,638 | 414,316 | 396,287 | 376,188 | 395,862 | 4,088,050 |
| LABADIE 2 | 388,033 | 378,223 | 389,953 | 404,592 | 407,447 | 383,239 | 396,944 | 372,542 | 398,618 | 409,751 | 377,629 | 384,091 | 4,691,061 |
| LABADIE 3 | 393,849 | 381,478 | 391,058 | 407,544 | 412,707 | 384,658 | 389,627 | 378,742 | 400,882 | 410,475 | 380,450 | 380,842 | 4,712,312 |
| LABADIE 4 | 377,858 | 371,430 | 393,306 | 406,352 | 400,497 | 386,427 | 394,230 | 375,393 | 398,697 | 378,314 | 382,408 | 389,234 | 4,654,145 |
| MERAMEC 1 | 78,757 | 70,423 | 79,099 | 82,500 | 81,644 | 75,492 | 75,907 | 79,449 | 83,619 | 83,388 | 79,505 | 4,654 | 874,438 |
| MERAMEC 2 | 81,027 | 73,580 | 79,554 | 87,700 | 84,350 | 74,951 | 77,188 | 78,841 | 81,605 | 86,939 | 81,015 | 83,479 | 970,229 |
| MERAMEC 3 | 165,327 | 155,077 | 161,729 | 165,639 | 166,799 | 138,663 | 18,811 | 158,655 | 158,840 | 169,041 | 156,387 | 158,040 | 1,773,007 |
| MERAMEC 4 | 203,163 | 187,275 | 190,614 | 211,598 | 205,788 | 182,360 | 156,825 | 124,341 | 204,733 | 210,776 | 197,755 | 201,864 | 2,277,091 |
| MERAMEC CT1 | 0 | 0 | 0 | 6 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 11 |
| MERAMEC CT2 | 0 | 1 | 1,184 | 1,437 | 226 | 375 | 542 | 2 | 376 | 162 | 1 | 4 | 4,310 |
| MEXICO CT | 0 | 0 | 0 | 3 | 5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 8 |
| MOBERLY CT | 0 | 0 | 0 | 5 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 6 |
| MOREAU CT | 0 | 0 | 0 | 5 | 5 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 9 |
| PENO CREEK CT1 | 326 | 11 | 2,195 | 2,590 | 562 | 1,308 | 1,731 | 571 | 1,384 | 1,543 | 112 | 104 | 12,436 |
| PENO CREEK CT2 | 326 | 4 | 2,190 | 2,581 | 558 | 1,306 | 1,731 | 558 | 1,377 | 1,532 | 103 | 92 | 12,357 |
| PENO CREEK CT3 | 324 | 3 | 2,189 | 2,581 | 549 | 1,305 | 1,731 | 549 | 1,376 | 1,524 | 95 | 80 | 12,306 |
| PENO CREEK CT4 | 322 | 1 | 2,187 | 2,573 | 548 | 1,303 | 1,731 | 543 | 1,373 | 1,523 | 93 | 62 | 12,261 |
| PINCKNEY CT1 | 1,041 | 23 | 3,237 | 3,132 | 1,019 | 1,990 | 2,332 | 979 | 1,843 | 2,368 | 487 | 629 | 19,078 |
| PINCKNEY CT2 | 1,040 | 20 | 3,236 | 3,125 | 1,010 | 1,990 | 2,324 | 959 | 1,841 | 2,365 | 472 | 626 | 19,008 |
| PINCKNEY CT3 | 1,039 | 16 | 3,233 | 3,119 | 1,007 | 1,990 | 2,319 | 939 | 1,840 | 2,358 | 467 | 616 | 18,943 |
| PINCKNEY CT4 | 1,038 | 10 | 3,232 | 3,114 | 1,001 | 1,990 | 2,318 | 928 | 1,838 | 2,353 | 453 | 613 | 18,887 |
| PINCKNEY CT5 | 0 | 0 | 115 | 316 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 437 |
| PINCKNEY CT6 | 0 | 0 | 115 | 316 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 437 |
| PINCKNEY CT7 | 0 | 0 | 115 | 316 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 437 |
| PINCKNEY CT8 | 0 | 0 | 115 | 316 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 437 |
| RACCOON CRK CT1 | 0 | 1 | 1,520 | 1,555 | 238 | 266 | 362 | 0 | 586 | 227 | 1 | 0 | 4,755 |
| RACCOON CRK CT2 | 0 | 1 | 1,534 | 1,588 | 238 | 286 | 326 | 0 | 578 | 227 | 0 | 0 | 4,778 |
| RACCOON CRK CT3 | 0 | 1 | 1,510 | 1,603 | 208 | 290 | 362 | 0 | 576 | 214 | 0 | 0 | 4,764 |
| RACCOON CRK CT4 | 0 | 1 | 1,523 | 1,548 | 223 | 286 | 351 | 0 | 588 | 212 | 0 | 0 | 4,732 |
| RUSH ISLAND 1F | 324,382 | 293,842 | 338,342 | 348,440 | 327,986 | 321,332 | 314,258 | 324,691 | 351,515 | 319,102 | 170,926 | 43,537 | 3,478,351 |
| RUSH ISLAND 2F | 355,889 | 323,535 | 360,090 | 371,803 | 371,507 | 324,509 | 325,875 | 359,144 | 367,565 | 365,461 | 352,662 | 354,484 | 4,232,525 |
| SIOUX 1L-34 | 283,830 | 276,017 | 276,011 | 285,160 | 286,926 | 257,227 | 45,708 | 31 | 280,486 | 304,494 | 274,321 | 292,060 | 2,862,271 |
| SIOUX 2L-34 | 300,174 | 287,529 | 280,614 | 303,909 | 298,135 | 272,042 | 290,276 | 278,259 | 293,937 | 309,988 | 292,212 | 306,978 | 3,514,052 |
| VENICE CT2 | 101 | 2 | 2,067 | 2,232 | 555 | 879 | 1,093 | 268 | 778 | 1,035 | 10 | 39 | 9,058 |
| VENICE CT3 | 311 | 0 | 6,726 | 6,871 | 2,036 | 3,721 | 2,902 | 209 | 2,854 | 2,345 | 178 | 233 | 28,385 |
| VENICE CT4 | 311 | 0 | 6,708 | 6,784 | 1,952 | 3,709 | 2,902 | 16 | 2,808 | 2,318 | 60 | 154 | 27,722 |
| VENICE CT5 | 0 | 0 | 428 | 1,088 | 18 | 0 | 0 | 0 | 0 | 0 | 0 | 0 0 | 1,533 |
| VIADUCT CT1 | 17 670 | 1 | 0 | 2 | 2 | 0 | 19 642 | 17 202 | 17 262 | 17 002 | 10 224 | | 254 270 |
| Pumped Storage | -17,679 | -23,229 | -25,498 | -28,059 | -28,113 | -24,187 | -18,642 | -17,202 | -17,263 | -17,002 | -18,324 | -19,082 | -254,279 |
| Hydro Units | 70 200 | 07 000 | 01 700 | 70 000 | 62 200 | 62 000 | 72 100 | 72 000 | 74 200 | 60 000 | | 02 065 | 007 165 |
| KEOKUK | 78,200 | 87,900 | 84,700 | 79,900 | 63,200 | 62,800 | 73,100 | 72,800 | 74,200 | 69,800 | 58,500 | 82,065 | 887,165 |
| OSAGE | 49,717 | 37,855 | 46,070 | 43,558 | 58,180 | 53,062 | 53,385 | 23,797 | 12,880 | 9,238 | 15,834 | 27,405 | 430,981 |
| Purchases | 0 | 0 | | E2 760 | E0 000 | 10 640 | E0 000 | E2 760 | E1 000 | 0 | 0 | 0 | 270 000 |
| APL-FIXPURCH | 115 200 | 110 604 | 53,760 | 53,760 | 58,880 | 48,640 | 58,880 | 53,760 | 51,200 | 110 040 | 111 260 | 115 200 | 378,880 |
| APL-ECONPURCH | 115,200 | 110,604 | 16,960 | 20,831 | 20,800 | 13,767 | 12,659 | 10,070 | 22,901 | 119,040 | 111,360 | 115,200 | 689,391 |
| PURCHASE-E | 79,019 | 61,867 | 63,734 | 113,474 | 114,114 | 32,454 | 110,088 | 107,727 | 76,976 | 145,269 | 117,259 | 77,169 | 1,099,149 |
| Sales | 115 200 | 110 040 | E2 760 | E6 200 | | E1 200 | E0 000 | EC 200 | E2 760 | 110 040 | 111 200 | 115 200 | 069 060 |
| APL-FIXSALE | -115,200 -405,600 | -119,040 | -53,760 -271,200 | -56,320 | -58,880 | -51,200 -205,600 | -58,880 | -56,320 | -53,760 | -119,040 | -111,360 | -115,200 | -968,960 |
| SALES-F | -405,600 | -379,200 -626,491 | | -156,800 -427,319 | -150,400 -463,096 | | -334,400 -305,146 | -315,200 -320,835 | -323,200 -503,540 | -327,104 -315,436 | -312,000 | -384,000 | -3,564,704 -5,552,154 |
| SALES-E =================================== | | | -610,036 | | | -751,799 | | | | | -334,137 | -466,238 | |
| | = | | | | | | | = | | | | | |

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Appendix B

| Total 2,858,035 3,055,656 3,524,066 4,054,107 3,948,257 3,198,705 2,991,555 3,084,040 3,670,290 3,888,078 3,465,094 3,133,703 40,871,585 Units 3,502,461 3,905,390 4,219,336 4,411,082 4,333,573 4,020,768 3,400,511 3,525,443 4,329,896 4,323,313 3,937,963 3,816,384 47,726,117 Coal 3,342,535 3,181,328 3,334,632 3,477,071 3,457,169 3,173,012 2,485,649 2,680,726 3,434,812 3,444,016 3,121,458 2,995,125 38,127,532 Nuclear 153,747 723,938 817,183 861,601 861,140 820,822 884,814 838,192 865,025 853,906 813,973 817,994 9,312,333 CT 6,179 124 67,521 72,409 15,264 26,935 30,048 6,525 30,058 25,390 2,533 3,266 286,252 | | | | | | | | | | | | | | |
|--|---------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|------------|
| Units 3,502,461 3,905,390 4,219,336 4,411,082 4,333,573 4,020,768 3,400,511 3,525,443 4,329,896 4,323,313 3,937,963 3,816,384 47,726,117 Coal 3,342,535 3,181,328 3,334,632 3,477,071 3,457,169 3,173,012 2,485,649 2,680,726 3,434,812 3,444,016 3,121,458 2,995,125 38,127,532 Nuclear 153,747 723,938 817,183 861,601 861,140 820,822 884,814 838,192 865,025 853,906 813,973 817,994 9,312,333 CT 6,179 124 67,521 72,409 15,264 26,935 30,048 6,525 30,058 25,390 2,533 3,266 286,252 Hydros 127,917 125,755 130,770 123,458 121,380 115,862 126,485 96,597 87,080 79,038 74,334 109,470 1,318,146 Purchases 194,219 172,470 134,454 188,064 193,794 94,862 181,627 171,557 151,077 264,309 228,619 192,369 </th <th>Source</th> <th>Apr</th> <th>May</th> <th>Jun</th> <th>Jul</th> <th>Aug</th> <th>Sep</th> <th>Oct</th> <th>Nov</th> <th>Dec</th> <th>Jan</th> <th>Feb</th> <th>Mar</th> <th>Total</th> | Source | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec | Jan | Feb | Mar | Total |
| Coal 3,342,535 3,181,328 3,334,632 3,477,071 3,457,169 3,173,012 2,485,649 2,680,726 3,434,812 3,444,016 3,121,458 2,995,125 38,127,532 Nuclear 153,747 723,938 817,183 861,601 861,140 820,822 884,814 838,192 865,025 853,906 813,973 817,994 9,312,333 CT 6,179 124 67,521 72,409 15,264 26,935 30,048 6,525 30,058 25,390 2,533 3,266 286,252 Hydros 127,917 125,755 130,770 123,458 121,380 115,862 126,485 96,597 87,080 79,038 74,334 109,470 1,318,146 Purchases 194,219 172,470 134,454 188,064 193,794 94,862 181,627 171,557 151,077 264,309 228,619 192,369 2,167,420 Sales -948,882 -1,124,731 -934,996 -640,438 -672,376 -1,008,599 -698,426 -692,355 -880,500 -761,580 -757,497 -965,438 | Total | 2,858,035 | 3,055,656 | 3,524,066 | 4,054,107 | 3,948,257 | 3,198,705 | 2,991,555 | 3,084,040 | 3,670,290 | 3,888,078 | 3,465,094 | 3,133,703 | 40,871,585 |
| Nuclear 153,747 723,938 817,183 861,601 861,140 820,822 884,814 838,192 865,025 853,906 813,973 817,994 9,312,333 CT 6,179 124 67,521 72,409 15,264 26,935 30,048 6,525 30,058 25,390 2,533 3,266 286,252 Hydros 127,917 125,755 130,770 123,458 121,380 115,862 126,485 96,597 87,080 79,038 74,334 109,470 1,318,146 Purchases 194,219 172,470 134,454 188,064 193,794 94,862 181,627 171,557 151,077 264,309 228,619 192,369 2,167,420 Sales -948,882 -1,124,731 -934,996 -640,438 -672,376 -1,008,599 -698,426 -692,355 -880,500 -761,580 -757,497 -965,438 -10,085,818 | Units | | | , ,, | , , | , , | | - , , - | | , , | 1 1 | | | |
| Hydros 127,917 125,755 130,770 123,458 121,380 115,862 126,485 96,597 87,080 79,038 74,334 109,470 1,318,146 Purchases 194,219 172,470 134,454 188,064 193,794 94,862 181,627 171,557 151,077 264,309 228,619 192,369 2,167,420 Sales -948,882 -1,124,731 -934,996 -640,438 -672,376 -1,008,599 -698,426 -692,355 -880,500 -761,580 -757,497 -965,438 -10,085,818 | Nuclear | 153,747 | 723,938 | 817,183 | 861,601 | 861,140 | 820,822 | 884,814 | 838,192 | 865,025 | 853,906 | 813,973 | 817,994 | 9,312,333 |
| Purchases 194,219 172,470 134,454 188,064 193,794 94,862 181,627 171,557 151,077 264,309 228,619 192,369 2,167,420 Sales -948,882 -1,124,731 -934,996 -640,438 -672,376 -1,008,599 -698,426 -692,355 -880,500 -761,580 -757,497 -965,438 -10,085,818 | CT | 6,179 | 124 | 67,521 | 72,409 | 15,264 | 26,935 | 30,048 | 6,525 | 30,058 | 25,390 | 2,533 | 3,266 | 286,252 |
| Sales -948,882 -1,124,731 -934,996 -640,438 -672,376 -1,008,599 -698,426 -692,355 -880,500 -761,580 -757,497 -965,438 -10,085,818 | Hydros | | | , . | | | - , | | | | | | | |
| | | | , . | - , - | | | | | , | | | | | |
| Storage $-17,679$ $-23,229$ $-25,498$ $-28,059$ $-28,113$ $-24,187$ $-18,642$ $-17,202$ $-17,263$ $-17,002$ $-18,324$ $-19,082$ $-254,279$ | | | , , - | | | | | | | , | | | | |
| | Storage | -17,679 | -23,229 | -25,498 | -28,059 | -28,113 | -24,187 | -18,642 | -17,202 | -17,263 | -17,002 | -18,324 | -19,082 | -254,279 |

Commission Case - True Up Commission Case - True Up Baseline (test) 2008

rDate: 11-13-2008 rTime: 14:13:03

Appendix B

| Source | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec | Jan | Feb | Mar | Total |
|------------------|-----------|-----------|------------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-------------|
| Generating Units | | | | | | | | | | | | | |
| AUDRAIN CT1 | 0.00 | 0.00 | 158.93 | 163.23 | 26.40 | 23.71 | 28.41 | 0.19 | 53.80 | 20.54 | 0.00 | 0.84 | 476.06 |
| AUDRAIN CT2 | 0.00 | 0.28 | 163.21 | 159.54 | 27.15 | 24.12 | 28.42 | 0.00 | 52.87 | 20.79 | 0.00 | 0.54 | 476.92 |
| AUDRAIN CT3 | 0.00 | 0.28 | 162.40 | 157.45 | 27.02 | 23.30 | 30.31 | 0.00 | 53.80 | 21.53 | 0.00 | 0.00 | 476.10 |
| | | | 160.27 | 156.40 | 27.02 | 23.30 | 30.31 | 0.00 | | 22.27 | 0.00 | 0.00 | 472.53 |
| AUDRAIN CT4 | 0.00 | 0.28 | | | | | | | 54.26 | | | | |
| AUDRAIN CT5 | 0.00 | 0.28 | 159.47 | 155.08 | 26.48 | 22.47 | 30.52 | 0.00 | 53.33 | 20.29 | 0.00 | 0.00 | 467.93 |
| AUDRAIN CT6 | 0.00 | 0.28 | 165.88 | 161.42 | 24.19 | 24.12 | 27.79 | 0.00 | 51.47 | 22.27 | 0.00 | 0.00 | 477.42 |
| AUDRAIN CT7 | 0.00 | 0.28 | 158.93 | 165.90 | 27.33 | 23.30 | 29.26 | 0.00 | 51.24 | 22.27 | 0.00 | 0.00 | 478.51 |
| AUDRAIN CT8 | 0.00 | 0.28 | 159.20 | 158.25 | 27.33 | 24.54 | 28.42 | 0.00 | 53.33 | 18.56 | 0.00 | 0.00 | 469.91 |
| CALLAWAY 1D | 965.14 | 4,550.87 | 5,130.77 | 5,409.17 | 5,406.02 | 5,153.59 | 5,553.62 | 5,261.99 | 5,430.35 | 5,362.22 | 5,109.79 | 5,136.17 | 58,469.70 |
| FAIRGROUNDS GT | 0.00 | 0.00 | 0.00 | 1.41 | 1.41 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 2.82 |
| GOOSE CREEK CT1 | 0.00 | 0.25 | 160.38 | 141.34 | 26.99 | 24.35 | 29.88 | 0.00 | 55.02 | 22.10 | 0.00 | 0.00 | 460.32 |
| GOOSE CREEK CT2 | 0.00 | 0.25 | 159.85 | 152.85 | 25.29 | 23.12 | 31.13 | 0.00 | 51.78 | 21.37 | 0.00 | 0.00 | 465.64 |
| GOOSE CREEK CT3 | 0.00 | 0.25 | 157.20 | 151.32 | 26.14 | 23.94 | 31.13 | 0.00 | 51.32 | 21.86 | 0.00 | 0.00 | 463.16 |
| GOOSE CREEK CT4 | 0.00 | 0.25 | 154.03 | 150.20 | 25.86 | 23.32 | 31.34 | 0.00 | 53.17 | 22.10 | 0.00 | 0.00 | 460.27 |
| GOOSE CREEK CT5 | 0.00 | 0.25 | 157.20 | 146.31 | 23.60 | 23.53 | 30.09 | 0.00 | 52.94 | 22.10 | 0.00 | 0.00 | 456.01 |
| GOOSE CREEK CT6 | 0.00 | 0.25 | 161.44 | 150.19 | 25.29 | 23.12 | 30.92 | 0.00 | 53.86 | 22.10 | 0.00 | 0.00 | 467.18 |
| HOWARD BEND CT | 0.00 | 0.28 | 0.00 | 2.27 | 1.42 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 3.98 |
| KINMUNDY CT 1 | 0.00 | 0.00 | 45.56 | 113.43 | 2.26 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 161.25 |
| KINMUNDY CT 2 | 0.00 | 0.00 | 45.56 | 113.43 | 2.26 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 161.25 |
| KIRKSVILLE CT | 0.00 | 0.09 | 0.00 | 0.24 | 0.26 | 0.00 | 0.00 | 0.19 | 0.00 | 0.00 | 0.00 | 0.00 | 1.14 |
| | | | | | | | | | | | | | |
| LABADIE 1 | 5,009.76 | 4,916.84 | 5,061.92 | 5,163.74 | 5,308.94 | 4,776.94 | 0.00 | 1,982.66 | 5,316.61 | 5,097.33 | 4,831.22 | 5,073.60 | 52,539.56 |
| LABADIE 2 | 5,013.50 | 4,894.45 | 5,043.36 | 5,223.66 | 5,267.50 | 4,954.10 | 5,131.19 | 4,826.09 | 5,164.35 | 5,292.09 | 4,876.18 | 4,975.07 | 60,661.54 |
| LABADIE 3 | 5,029.32 | 4,875.68 | 4,991.51 | 5,210.41 | 5,279.34 | 4,917.60 | 4,987.56 | 4,854.10 | 5,126.81 | 5,248.65 | 4,857.12 | 4,879.55 | 60,257.65 |
| LABADIE 4 | 4,831.18 | 4,757.74 | 5,030.69 | 5,197.11 | 5,127.74 | 4,946.19 | 5,038.45 | 4,814.08 | 5,100.79 | 4,852.70 | 4,893.05 | 4,981.44 | 59,571.17 |
| MERAMEC 1 | 1,270.01 | 1,151.11 | 1,274.75 | 1,326.38 | 1,317.93 | 1,211.62 | 1,218.66 | 1,270.50 | 1,339.58 | 1,337.11 | 1,281.63 | 79.30 | 14,078.57 |
| MERAMEC 2 | 1,305.44 | 1,202.35 | 1,282.45 | 1,409.37 | 1,361.18 | 1,202.93 | 1,239.01 | 1,261.46 | 1,308.02 | 1,392.52 | 1,304.54 | 1,346.31 | 15,615.61 |
| MERAMEC 3 | 2,661.82 | 2,509.17 | 2,603.31 | 2,665.90 | 2,692.41 | 2,215.47 | 307.94 | 2,532.39 | 2,546.22 | 2,711.80 | 2,523.33 | 2,551.81 | 28,521.58 |
| MERAMEC 4 | 3,101.08 | 2,871.47 | 2,908.44 | 3,226.01 | 3,147.49 | 2,760.15 | 2,375.89 | 1,889.88 | 3,106.90 | 3,206.29 | 3,023.33 | 3,088.15 | 34,705.06 |
| MERAMEC CT1 | 0.00 | 0.00 | 0.00 | 1.47 | 1.47 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 2.94 |
| MERAMEC CT2 | 0.00 | 0.18 | 135.66 | 158.23 | 29.01 | 35.17 | 49.03 | 0.19 | 39.19 | 17.16 | 0.23 | 0.55 | 464.60 |
| MEXICO CT | 0.00 | 0.00 | 0.00 | 0.93 | 1.40 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 2.33 |
| MOBERLY CT | 0.00 | 0.00 | 0.00 | 1.43 | 0.48 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 1.91 |
| MOREAU CT | 0.00 | 0.00 | 0.00 | 1.45 | 1.41 | | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 2.82 |
| | | | | | | 0.00 | | | | | | | |
| PENO CREEK CT1 | 33.06 | 1.36 | 212.31 | 242.29 | 57.78 | 98.15 | 130.24 | 47.16 | 122.28 | 141.45 | 13.17 | 11.66 | 1,110.90 |
| PENO CREEK CT2 | 33.06 | 0.53 | 211.84 | 241.39 | 57.41 | 98.04 | 130.24 | 46.17 | 121.68 | 140.46 | 12.29 | 10.60 | 1,103.70 |
| PENO CREEK CT3 | 32.92 | 0.35 | 211.77 | 241.39 | 56.49 | 97.93 | 130.24 | 45.52 | 121.63 | 139.78 | 11.32 | 9.36 | 1,098.70 |
| PENO CREEK CT4 | 32.77 | 0.18 | 211.66 | 240.67 | 56.42 | 97.82 | 130.24 | 45.05 | 121.39 | 139.64 | 11.17 | 7.43 | 1,094.42 |
| PINCKNEY CT1 | 97.38 | 2.28 | 291.55 | 278.44 | 99.36 | 138.75 | 166.37 | 69.91 | 146.73 | 201.00 | 49.77 | 64.04 | 1,605.58 |
| PINCKNEY CT2 | 97.36 | 2.03 | 291.42 | 277.89 | 98.55 | 138.75 | 165.80 | 68.53 | 146.57 | 200.75 | 48.04 | 63.80 | 1,599.49 |
| PINCKNEY CT3 | 97.24 | 1.71 | 291.20 | 277.37 | 98.23 | 138.75 | 165.49 | 67.17 | 146.47 | 200.15 | 47.54 | 62.74 | 1,594.05 |
| PINCKNEY CT4 | 97.14 | 1.05 | 291.10 | 276.88 | 97.67 | 138.74 | 165.40 | 66.37 | 146.36 | 199.74 | 46.14 | 62.42 | 1,589.00 |
| PINCKNEY CT5 | 0.00 | 0.00 | 12.88 | 34.71 | 0.76 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 48.35 |
| PINCKNEY CT6 | 0.00 | 0.00 | 12.88 | 34.71 | 0.76 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 48.35 |
| PINCKNEY CT7 | 0.00 | 0.00 | 12.88 | 34.71 | 0.76 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 48.35 |
| PINCKNEY CT8 | 0.00 | 0.00 | 12.88 | 34.71 | 0.76 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 48.35 |
| RACCOON CRK CT1 | 0.00 | 0.22 | 160.18 | 158.26 | 26.97 | 22.34 | 30.38 | 0.00 | 54.24 | 22.16 | 0.00 | 0.00 | 474.98 |
| | | | | | | | | | | | 0.22 | | |
| RACCOON CRK CT2 | 0.00 | 0.22 | 161.61 | 161.53 | 26.97 | 23.98 | 27.44 | 0.00 | 53.54 | 22.16 | | 0.00 | 477.47 |
| RACCOON CRK CT3 | 0.00 | 0.22 | 159.22 | 163.04 | 23.57 | 24.39 | 30.38 | 0.00 | 53.31 | 20.93 | 0.00 | 0.00 | 475.07 |
| RACCOON CRK CT4 | 0.00 | 0.22 | 160.55 | 157.54 | 25.28 | 23.98 | 29.54 | 0.00 | 54.47 | 20.69 | 0.00 | 0.00 | 472.27 |
| RUSH ISLAND 1F | 5,473.26 | 5,021.42 | 5,709.88 | 5,864.05 | 5,536.36 | 5,452.58 | 5,323.80 | 5,494.71 | 5,935.51 | 5,387.01 | 2,881.71 | 786.08 | 58,866.36 |
| RUSH ISLAND 2F | 5,988.77 | 5,507.07 | 6,057.49 | 6,248.38 | 6,250.12 | 5,481.54 | 5,525.70 | 6,049.38 | 6,185.10 | 6,139.18 | 5,916.65 | 5,965.92 | 71,315.29 |
| SIOUX 1L-34 | 4,965.16 | 4,859.34 | 4,850.17 | 5,000.97 | 5,032.10 | 4,541.35 | 803.02 | 1.34 | 4,950.85 | 5,319.87 | 4,794.91 | 5,095.54 | 50,214.62 |
| SIOUX 2L-34 | 5,194.21 | 5,011.19 | 4,888.02 | 5,268.41 | 5,182.19 | 4,754.28 | 5,055.66 | 4,850.57 | 5,112.69 | 5,363.99 | 5,053.92 | 5,298.38 | 61,033.50 |
| VENICE CT2 | 11.10 | 0.22 | 207.43 | 214.55 | 59.33 | 71.97 | 84.32 | 24.45 | 72.01 | 97.03 | 1.11 | 4.24 | 847.76 |
| VENICE CT3 | 30.72 | 0.00 | 618.74 | 618.95 | 200.95 | 262.84 | 207.30 | 14.56 | 230.82 | 201.32 | 17.30 | 22.65 | 2,426.14 |
| VENICE CT4 | 30.72 | 0.00 | 617.16 | 611.31 | 192.74 | 262.02 | 207.30 | 1.18 | 227.23 | 199.04 | 5.85 | 14.98 | 2,369.54 |
| VENICE CT5 | 0.00 | 0.00 | 45.88 | 114.24 | 2.28 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 162.41 |
| VIADUCT CT1 | 0.00 | | 0.00 | 0.46 | 0.50 | 0.00 | 0.25 | 0.12 | 0.00 | 0.00 | 0.00 | 0.00 | 1.68 |
| Pumped Storage | 0.00 | 0.00 | 0.00 | 0.40 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Hydro Units | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0 00 |
| KEOKUK | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| OSAGE | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 |
| Purchases | | | | | | | | | | | | | |
| APL-FIXPURCH | 0.00 | 0.00 | 1,851.49 | 1,851.49 | 2,027.83 | 1,675.16 | | 1,851.49 | 1,763.33 | 0.00 | 0.00 | 0.00 | 13,048.62 |
| APL-ECONPURCH | 1,847.81 | 1,774.08 | 584.10 | 717.41 | 716.35 | 474.14 | 435.97 | 346.82 | 788.70 | 1,909.40 | 1,786.21 | 1,847.81 | 13,228.81 |
| PURCHASE-E | 4,382.60 | 1,840.39 | 3,948.31 | 7,577.54 | 7,819.94 | 1,296.01 | 3,961.00 | 3,826.89 | 3,152.81 | 7,624.65 | 6,827.71 | 4,510.37 | 56,768.22 |
| Sales | | | | | | | | | | | | | |
| APL-FIXSALE | -6,596.25 | -5,102.43 | -3,719.84 | -3,794.47 | -3,906.31 | -2,576.51 | -3,063.35 | -2,713.09 | -2,713.66 | -6,143.83 | -6,232.32 | -6,697.12 | -53,259.17 |
| SALES-F | | | -13,470.07 | | | | | | | | | | -162,630.86 |
| SALES-E | | | -27,882.58 | | | | | | | | | | -235,858.04 |
| | | | | | | | | | | | | | |
| | | | | | | | | | | | | | |

| Commission Case - True | Up |
|------------------------|----|
| Commission Case - True | Up |
| Baseline (test) | |
| 2008 | |

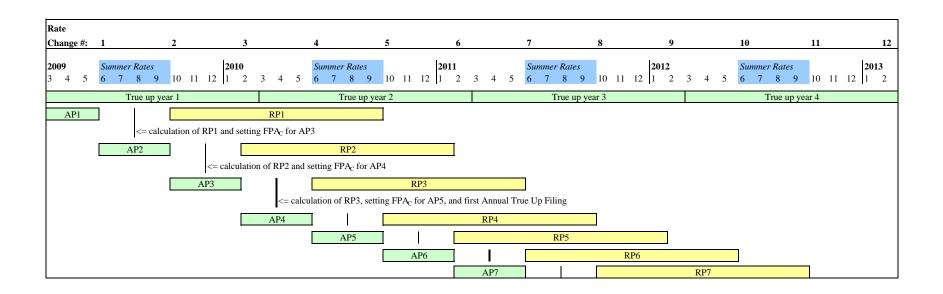
rDate: 11-13-2008 rTime: 14:13:03

RealTime

Appendix B

| Source | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec | Jan | Feb | Mar | Total | |
|-----------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|-------------|--|
| Total | 10,085.41 | 6,015.59 | 22,804.49 | 47,078.43 | 41,972.21 | 20,545.80 | 20,174.04 | 22,883.85 | 26,165.96 | 34,067.53 | 24,303.09 | 7,120.92 | 283,217.33 | |
| Units | | | | 64,192.36 | | | | | | | | | 651,919.74 | |
| Coal | 49,843.52 | 47,577.82 | 49,701.97 | 51,804.39 | 51,503.30 | 47,214.77 | 37,006.88 | 39,827.17 | 51,193.42 | 51,348.53 | 46,237.60 | 44,121.14 | 567,380.51 | |
| Nuclear | 965.14 | 4,550.87 | 5,130.77 | 5,409.17 | 5,406.02 | 5,153.59 | 5,553.62 | 5,261.99 | 5,430.35 | 5,362.22 | 5,109.79 | 5,136.17 | 58,469.70 | |
| CT | 593.45 | 14.94 | 6,660.33 | 6,978.80 | 1,589.63 | 2,003.63 | 2,268.15 | 496.76 | 2,600.11 | 2,263.65 | 264.13 | 335.93 | 26,069.54 | |
| Purchases | 6,230.41 | 3,614.47 | 6,383.90 | 10,146.44 | 10,564.12 | 3,445.32 | 6,424.80 | 6,025.20 | 5,704.84 | 9,534.06 | 8,613.92 | 6,358.18 | 83,045.65 | |
| Sales | -47,547.11 | -49,742.51 | -45,072.49 | -27,260.37 | -27,090.87 | -37,271.51 | -31,079.40 | -28,727.26 | -38,762.76 | -34,440.94 | -35,922.35 | -48,830.49 | -451,748.07 | |

Illustration of AmerenUE's Proposed FAC with Seasonal NBFC and Rate Changes



UNION ELECTRIC COMPANY ELECTRIC SERVICE

| | MO.P.S.C. SCHEDULE NO. | 5 | Original | SHEET NO. | 98.6 |
|--|------------------------|---|----------|-----------|------|
|--|------------------------|---|----------|-----------|------|

CANCELLING MO P.S.C. SCHEDULE NO

| <pre>arrent FPAc Rate: eriod Ending: rgy Cost (CF+CPP-OSSR-TS-S) gy Cost (\$/kWh) mulation Period Sales kWh irst Subtotal (12.) Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) hird Subtotal Recovery Period Sales kWh</pre> | - x (S _{AP}) x | mm/dd/yy \$0 \$0.0000 0 \$0 TBD% \$0 \$0 \$0 |
|---|--|--|
| gy Cost (\$/kWh) mulation Period Sales kWh irst Subtotal (12.) Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) hird Subtotal | - x (S _{AP}) x | \$0.0000 0 \$0 TBD% \$0 |
| (\$/kWh) mulation Period Sales kWh irst Subtotal (12.) Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) nird Subtotal | (S _{AP}) | 0 \$0 TBD% \$0 |
| mulation Period Sales kWh irst Subtotal (12.) Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) hird Subtotal | (S _{AP}) | 0 \$0 TBD% \$0 |
| irst Subtotal (12.) Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) nird Subtotal | x | \$0 TBD% \$0 |
| Responsibility cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) nird Subtotal | | TBD% \$C |
| cond Subtotal t for Under / Over recovery iods Plus Interest (I + R) nird Subtotal | | \$ C |
| t for Under / Over recovery iods Plus Interest (I + R) nird Subtotal | y for ± | |
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| nird Subtotal | | γu |
| | | |
| Recovery Period Sales KWn | | \$0 |
| | (S_{RP}) ÷ | C دم ممر |
| | | \$0.0000 \$0.0000 |
| | + + | \$0.0000 |
| nout Voltage Level Adjustme | | \$0.0000 |
| evel Adjustment Factor | :iic) | \$0.0000 |
| ondary | x | 1.0888 |
| nary | x | 1.0000 |
| - | | 1.0147 |
| | | |
| | | \$0.0000 |
| nary | | \$0.0000 |
| ge Transmission | | \$0.0000 |
| | ge Transmission 1 voltage level adjustment) ondary mary | ge Transmission x n voltage level adjustment) ondary mary |

* Indicates Addition.

DATE OF ISSUE DATE EFFECTIVE ISSUED BY T. R. Voss NAME OF OFFICER President & CEO TITLE

BEFORE THE PUBLIC SERVICE COMMISSION OF THE STATE OF MISSOURI

)

)

)

In the Matter of Union Electric Company d/b/a AmerenUE for Authority to File Tariffs Increasing Rates for Electric Service Provided to Customers in the Company's Missouri Service Area.

Case No. ER-2008-0318

STIPULATION AND AGREEMENT AS TO OFF-SYSTEM SALES RELATED ISSUES

COME NOW Union Electric Company d/b/a AmerenUE ("AmerenUE" or the "Company"), the Staff of the Missouri Public Service Commission, The Office of the Public Counsel, the Missouri Industrial Energy Consumers, the Missouri Energy Group, and Noranda Aluminum, Inc., and respectfully state to the Missouri Public Service Commission ("Commission") that, as a result of negotiations, the undersigned parties ("Parties") have reached the stipulations and agreements contained herein in order to settle the issues specified below.

1. **Issues Settled.** This Stipulation and Agreement is intended to settle the following issues previously identified by some or all of the Parties through testimony and/or schedules: This Stipulation and Agreement settles all off-system sales issues, including:

- a. Off-system sales revenues and margins from energy;
- Natural gas and purchased power/market energy prices used to determine purchased power and off-system sales;
- c. Prior period Taum Sauk capacity sales;
- d. Non-Taum Sauk capacity sales;

- e. Current period Taum Sauk capacity sales;
- f. Ancillary Services revenues; and
- g. Non-asset based (speculative) trading margins.

This Stipulation and Agreement also settles all fuel-cost issues except the Revenue Sufficiency Guarantee (RSG) resettlement issue and the Fuel Adjustment Clause issues. In general terms (more specificity and precision is in Paragraph 2 herein), the Signatories have agreed for settlement purposes to calculate net fuel costs starting with Staff's modeled total fuel and purchased power costs. Added to this amount are: 1) fixed gas supply costs; 2) MISO Day 2 costs; and 3) an amount to reflect underforecasting error. Subtracted from the sum of these amounts are: 1) Westinghouse credits; 2) capacity revenues (including current period Taum Sauk capacity revenues); 3) ancillary service revenues; 4) MISO Day 2 revenues; and 3) a "black box" settlement amount. These same calculations apply if a fuel adjustment clause is authorized and implemented. The calculation described above results in the "Net Base Fuel Costs" which would be used to calculate periodic adjustments along with a "TS factor" and an "S Factor" if a fuel adjustment clause is implemented. If a fuel adjustment clause is implemented, the "TS factor adjustment is intended to offset a portion of actual fuel costs until the re-constructed Taum Sauk plant returns to service and the "S factor" is intended to offset a portion of actual fuel costs by \$3 million per year for a period of 18 months.

2. Specific Agreements. In settlement of the above issues, the

following specific agreements have been reached among the signatories:

A. If no FAC:

- a. Staff's true-up production cost modeling runs (attached as **Appendix A**), consisting of three runs, one with off-system sales and one without off-system sales including Taum Sauk, and one with off-system sales without Taum Sauk, shall be used to establish the modeled portion of net fuel costs.
- b. Net Fuel Costs for purposes of establishing initial rates shall be established as follows:
 - i. Staff's Modeled Net Fuel Costs of \$283.3 million (with Taum Sauk), consisting of:
 - Staff's modeled total fuel and purchased power costs [\$735.0 million], less modeled revenues from off-system sales of energy [\$451.7 million] (including Taum Sauk current period energyrelated benefits of \$17.8 million)
 - 2. plus:
 - a. Fixed Gas Supply Costs [\$8.1 million]¹
 - b. MISO Day 2 Costs [\$57.9 million]
 - c. Under-forecasting Error [\$3.8 million]
 - 3. minus:
 - a. Westinghouse Credits [\$1.8 million]
 - b. Current period capacity Revenues [\$11.3 million] (including Taum Sauk capacity revenues of \$4.9 million)
 - c. Ancillary Services Revenues [\$3.5 million]
 - d. MISO Day 2 Revenues [\$12.3 million] (includes the RSG Margin of \$5.2 million)
 - e. Black Box Settlement Amount [\$3 million]

B. If FAC implemented:

- a. Staff's true-up production cost modeling runs (attached as **Appendix A**), consisting of three runs, one with off-system sales and one without off-system sales including Taum Sauk, and one with off-system sales without Taum Sauk, shall be used to establish the modeled portion of net fuel costs.
- b. Net Fuel Costs for purposes of establishing initial rates shall be as described above in subsection A.b.

¹ All non-modeled figures use the Company's actual true-up data through September 30, 2008, which was provided to the parties to this case on November 7, 2008.

- c. Cost and revenues used to calculate Net Fuel Costs above shall be directly assigned, if possible, or allocated to calendar months to be used to determine the Net Base Fuel Costs in the FAC tariff.
- d. The following provisions shall apply to the calculation of periodic adjustment rate calculations (AmerenUE's proposed method for making this FPA calculation appears at the top of its proposed tariff sheet No. 98.2 on Schedule MJL-E1-2 attached to the direct testimony of AmerenUE witness Martin J. Lyons, Jr.).
 - i. "TS" as defined in AmerenUE's proposed FAC tariff shall equal an annual value of \$22.7 million (i.e., if there are three accumulation periods one-third of this value shall be used in the FPA_(rp) formula).
 - ii. An additional factor, called factor "S," shall be included in the FPA_(rp) formula as follows:

 $FPA_{(RP)}=[[(CF+CPP-OSSR-TS-S)-(NBFC^*S_{AP})]^*$ percentage sharing split+I+R]/S_{RP}

The FAC tariff shall set the value of factor "S" at an annual value of \$3 million (i.e., if there are three accumulation periods one-third of this value shall be used in the FPA_(rp) formula), and shall provide that factor "S" shall expire on September 1, 2010; except that if the "S" factor expires during an accumulation period, the factor shall be prorated according to the number of days during which it was effective during that accumulation period.

C. Items agreed upon that are not dependent on whether a fuel adjustment clause is approved by the Commission and implemented by AmerenUE

a. The \$57.9 million of MISO Day 2 Costs listed above do not reflect the \$6.2 million proposed by the Company relating to the RSG resettlement issue identified in testimony filed in this case. This RSG resettlement issue is not settled by this Stipulation and Agreement. If the Commission rules in the Company's favor on the RSG resettlement issue, the \$57.9 million of MISO Day 2 Costs shall be increased to \$64.1 million in calculating Net Fuel Costs in this case.

b. Jurisdictional factor - All of the above-cited figures are total AmerenUE numbers to which the Missouri retail jurisdictional allocation factors of 98.46% shall be applied to the variable

components² of net fuel costs and 98.4% to the fixed components³ of net fuel costs, as reflected in Staff's runs.⁴

3. Testimony Received Into Evidence. Unless called by the Commission or the Regulatory Law Judge to respond to questions of the Commissioners or the Regulatory Law Judge respecting this Stipulation and Agreement, in the event the Commission accepts the specific terms of this Stipulation and Agreement the portions of the testimony of the following witnesses concerning matters not at issue between the Parties, including the Issues Settled as set out in paragraph 1, supra, shall be received into evidence without the necessity of these witnesses taking the stand:

> Shawn E. Schukar⁵ Timothy D. Finnell Scott A. Glaeser John P. Cassidy Michael Rahrer Erin L. Malonev Ryan Kind James R. Dauphinais Billie Sue LaConte Stephen M. Rackers

² Fuel for load, purchases for load, MISO DAY 2 costs, underforecasting error, and TS energy. ³ Fuel for interchange, Westinghouse credits, capacity purchases, purchases for interchange, capacity revenues, ancillary services revenues, MISO DAY 2 revenues, TS capacity, and S. ⁴ Fuel and purchased power cost of \$735.0 million plus fix gas supply cost of \$8.1 million, totaling

^{\$743.1} million, is allocated \$550.4 million to variable cost and \$192.7 million to fixed cost. ⁵ Mr. Schukar's proposed Supplemental Testimony for which the Company sought leave to file on November 28, 2008 shall not be received into evidence.

Because some of the offers of admissions from the depositions of Ryan Kind and Jim Dauphinais pertain to the issues settled herein, AmerenUE agrees to withdraw its original offers of admissions with respect to those two witnesses. Those portions of the depositions designated in the original offers shall not be made part of the record. AmerenUE reserves the right to re-file a list of designated portions of these depositions that it considers admissions with respect to Fuel Adjustment Clause issues. The Signatories agree not to object to the timeliness of the filing of such designations, but do not waive any other arguments with respect thereto.

4. This Stipulation and Agreement is being entered into for the purpose of disposing of the issues that are specifically addressed in this Stipulation and Agreement. In presenting this Stipulation and Agreement, none of the Parties to this Stipulation and Agreement shall be deemed to have approved, accepted, agreed, consented or acquiesced to any ratemaking principle or procedural principle, including, without limitation, any method of cost or revenue determination or cost allocation or revenue related methodology, and none of the Parties shall be prejudiced or bound in any manner by the terms of this Stipulation and Agreement (whether this Stipulation and Agreement is approved or not) in this or any other proceeding, other than a proceeding limited to enforce the terms of this Stipulation and Agreement, except as otherwise expressly specified herein.

5. This Stipulation and Agreement has resulted from extensive negotiations and the terms hereof are interdependent. If the Commission does

not approve this Stipulation and Agreement without modification, then the Stipulation and Agreement shall be void and no Party shall be bound by any of the agreements or provisions herein, except as specifically provided herein.

6. If the Commission does not unconditionally approve this Stipulation and Agreement without modification, and notwithstanding its provision that it shall become void, neither this Stipulation and Agreement, nor any matters associated with its consideration by the Commission, shall be considered or argued to be a waiver of the rights that any Party has for a decision in accordance with Section 536.080 RSMo 2000 or Article V, Section 18 of the Missouri Constitution, and the Parties shall retain all procedural and due process rights as fully as though this Stipulation and Agreement had not been presented for approval, and any suggestions or memoranda, testimony or exhibits that have been offered or received in support of this Stipulation and Agreement shall become privileged as reflecting the substantive content of settlement discussions and shall be stricken from and not be considered as part of the administrative or evidentiary record before the Commission for any further purpose whatsoever.

7. If the Commission unconditionally accepts the specific terms of this Stipulation and Agreement without modification, the Parties waive, with respect to the issues resolved herein: their respective rights (1) to call, examine and cross-examine witnesses pursuant to Section 536.070(2), RSMo 2000; (2) their respective rights to present oral argument and/or written briefs pursuant to Section 536.080.1, RSMo 2000; (3) their respective rights to seek rehearing pursuant to Section 386.500, RSMo 2000 and (4) their respective rights to

judicial review pursuant to Section 386.510, RSMo 2000. These waivers apply only to a Commission order respecting this Stipulation and Agreement issued in this above-captioned proceeding, and do not apply to any matters raised in any prior or subsequent Commission proceeding, or any matters not explicitly addressed by this Stipulation and Agreement. This Stipulation and Agreement contains the entire agreement of the Parties concerning the issues addressed herein.

8. If the Commission has questions for the Parties' witnesses or Parties, the Parties will make available, at any on-the-record session, their witnesses and attorneys on the issues resolved by this Stipulation and Agreement, so long as all Parties have had adequate notice of that session. The Parties agree to cooperate in presenting this Stipulation and Agreement to the Commission for approval, and will take no action, direct or indirect, in opposition to the request for approval of this Stipulation and Agreement. WHEREFORE, the undersigned Parties respectfully request the Commission to issue an order in this case approving the Stipulation and

Agreement subject to the specific terms and conditions contained therein.

Respectfully submitted,

Steven R. Sullivan, # 33102

Sr. Vice President, General Counsel and Secretary **Thomas M. Byrne, # 33340** Managing Assoc. General Counsel Ameren Services Company P.O. Box 66149 St. Louis, MO 63166-6149 (314) 554-2098 (314) 554-2514 (phone) (314) 554-4014 (fax) <u>ssullivan@ameren.com</u> tbyrne@ameren.com

SMITH LEWIS, LLP

/s/James B. Lowery

James B. Lowery, # 40503 Suite 200, City Centre Building 111 South Ninth Street P.O. Box 918 Columbia, MO 65205-0918 Phone (573) 443-3141 Facsimile (573) 442-6686 <u>lowery@smithlewis.com</u>

Attorneys for Union Electric Company d/b/a AmerenUE

/s/Steven Dottheim

Steven Dottheim Chief Deputy General Counsel Missouri Bar No. 29149 P. O. Box 360 Jefferson City, MO 65102 (573) 751-7489 (Telephone) (573) 751-9285 (Fax) steve.dottheim@psc.mo.gov Attorney for the Staff of the Missouri Public Service Commission

<u>/s/Lewis R. Mills, Jr.</u>

Lewis R. Mills, Jr. (# 35275) Public Counsel P O Box 2230 Jefferson City, MO 65102 (573) 751-1304 (573) 751-5562 FAX <u>lewis.mills@ded.mo.gov</u> Attorney for the Office of the Public Counsel

/s/Diana M. Vuylsteke

Diana M. Vuylsteke, # 42419 Bryan Cave, LLP 211 N. Broadway, Suite 3600 St. Louis, Missouri 63102 Telephone: (314) 259-2543 Facsimile: (314) 259-2020 dmvuylsteke@bryancave.com Attorney for The Missouri Industrial Energy Consumers

rDate: 12-01-2008 rTime: 22:25:42

| Resource | Cap Fact ===== | Generation | Total Cost | \$/MWH ====== | Heat Rate ===== | Star Cold | ts Hot | -Hours Full ===== | Part | Fuel | Quantity | Fuel Cost |
|---|---|---|--|--|---|---|-----------|--|---|---|--|--|
| U:AUDRAIN CT1 U:AUDRAIN CT2 U:AUDRAIN CT3 U:AUDRAIN CT4 U:AUDRAIN CT5 U:AUDRAIN CT6 U:AUDRAIN CT7 U:AUDRAIN CT7 U:AUDRAIN CT8 U:CALLAWAY 1D U:FAIRGROUNDS GT U:GOOSE CREEK CT1 U:GOOSE CREEK CT3 U:GOOSE CREEK CT3 U:GOOSE CREEK CT4 U:GOOSE CREEK CT4 U:GOOSE CREEK CT5 U:GOOSE CREEK CT6 U:HOWARD BEND CT U:KINMUNDY CT 1 U:KINMUNDY CT 2 U:KINKSVILLE CT U:LABADIE 1 | | $\begin{array}{c} 4,838\\ 4,822\\ 4,818\\ 4,775\\ 4,720\\ 4,809\\ 4,820\\ 4,755\\ 9,312,324\\ 9\\ 4,630\\ 4,631\\ 4,658\\ 4,630\\ 4,681\\ 4,658\\ 4,630\\ 4,590\\ 4,698\\ 13\\ 1,533\\ 1,533\\ 1,533\\ 1,533\\ 4,085,733\\ \end{array}$ | $\begin{array}{r} 481.31\\ 479.85\\ 478.83\\ 474.43\\ 468.99\\ 478.47\\ 479.57\\ 470.96\\ 58,469.64\\ 2.82\\ 460.57\\ 465.89\\ 463.40\\ 460.52\\ 456.26\\ 467.43\\ 4.54\\ 161.25\\ 161.25\end{array}$ | 99.49 99.52 99.39 99.36 99.37 99.49 99.49 99.49 29.96 6.28 299.96 99.48 99.54 99.48 99.47 99.41 99.41 99.49 | 11757 11756 11756 11755 11755 11755 11755 11757 9941 11432 11777 11774 | 20 20 20 20 20 20 20 20 20 20 20 20 20 2 | | 445 450 427 419 441 436 431 1076 511 444 449 433 442 429 414 529 0 0 534 1739 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 | P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:NUCLEAR P:OIL MO P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:OIL MO P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:CAS P:GAS P:CAS P:GAS P:CAS P: | 59,048 58,867 58,804 58,286 57,602 58,692 58,692 58,817 57,819 92,573,740 150 56,684 57,270 56,684 56,679 56,157 57,481 242 18,971 18,971 18,971 144 13,536 40,615,880 | $\begin{array}{c} 481.3\\ 479.8\\ 478.8\\ 478.8\\ 474.4\\ 469.0\\ 478.5\\ 479.6\\ 479.6\\ 479.6\\ 479.6\\ 2.8\\ 469.6\\ 2.8\\ 460.6\\ 465.9\\ 463.4\\ 460.5\\ 456.3\\ 465.4\\ 4.5\\ 161.2\\ 161.2\\ 1.1\\ 253.7\\ 17.4\\ 52,240.1\\ 52,511.2\end{array}$ |
| U:LABADIE 2 | 0.895 | 4,687,754 | 60,621.12 | 12.93 | 9980 | 9 | 0 | 536 | 177 | I:OIL MO I:LAB COAL P:LAB COAL Total | 22,347 22,347 46,784,000 | 418.8 28.7 60,173.6 60,621.1 |
| U:LABADIE 3 | 0.874 | 4,709,464 | 60,223.27 | 12.79 | 9839 | 13 | 0 | 685 | 183 | I:OIL MO I:LAB COAL P:LAB COAL Total | 31,091 31,091 46,338,480 | 582.6 40.0 59,600.6 60,223.2 |
| U:LABADIE 4 | 0.863 | 4,650,543 | 59,528.25 | 12.80 | 9888 | 8 | 0 | 889 | 161 | I:OIL MO I:LAB COAL P:LAB COAL Total | 19,270 19,270 45,982,250 | 361.1 24.8 59,142.3 59,528.2 |
| U:MERAMEC 1 | 0.793 | 874,206 | 14,075.23 | 16.10 | 10970 | 7 | 0 | 1074 | 349 | C:GAS I:GAS I:MER 12 COA P:MER 12 COA Total | 61,402 2,130 2,191 9,528,320 | 495.6 17.7 3.1 13,558.8 14,075.2 |
| U:MERAMEC 2 | 0.872 | 970,142 | 15,614.35 | 16.09 | 10964 | 6 | 0 | 410 | 120 | C:GAS I:GAS I:MER 12 COA P:MER 12 COA Total | 68,100 1,966 2,022 10,568,540 | 556.3 16.1 2.9 15,039.0 15,614.4 |
| U:MERAMEC 3 | 0.761 | 1,772,882 | 28,519.73 | 16.09 | 10931 | 10 | 0 | 1515 | 263 | C:GAS I:GAS I:MER 34 COA P:MER 34 COA Total | 124,158 9,244 10,466 19,255,780 | 1,028.8 75.0 14.9 27,401.0 28,519.7 |
| U:MERAMEC 4 | 0.717 | 2,277,084 | 34,704.74 | 15.24 | 10368 | 11 | 0 | 1425 | 366 | C:GAS I:GAS I:MER 34 COA P:MER 34 COA Total | 151,212 7,980 9,558 23,458,100 | 1,245.7 64.5 13.6 33,380.9 34,704.7 |
| U:MERAMEC CT1 U:MERAMEC CT2 | 0.000 0.009 | 11 4,330 | | 267.19 107.85 | | 0 28 | 0 0 | 528 0 | | P:OIL MO I:OIL MO P:GAS Total | 157 2,710 51,711 | 2.9 50.8 416.2 467.0 |
| U:MEXICO CT U:MOBERLY CT U:MOREAU CT U:PENO CREEK CT1 U:PENO CREEK CT2 U:PENO CREEK CT3 U:PENO CREEK CT4 U:PINCKNEY CT1 U:PINCKNEY CT3 U:PINCKNEY CT4 U:PINCKNEY CT5 U:PINCKNEY CT6 U:PINCKNEY CT6 U:PINCKNEY CT7 U:PINCKNEY CT8 U:RACCOON CRK CT1 U:RACCOON CRK CT2 U:RACCOON CRK CT4 U:RACCOON CRK CT4 U:RACCOON CRK CT4 U:RACCOON CRK CT4 | 0.000 0.000 0.030 0.030 0.030 0.058 0.058 0.058 0.058 0.058 0.058 0.001 0.001 0.001 0.001 0.001 0.007 0.007 0.007 | 8 9 12,550 12,472 12,420 12,349 19,161 19,082 19,010 18,954 437 437 437 437 4759 4,759 4,700 4,768 4,739 3,477,455 | $1.91 \\ 2.82 \\ 1,121.30 \\ 1,114.14 \\ 1,109.36 \\ 1,102.62 \\ 1,613.46 \\ 1,606.72 \\ 1,600.38 \\ 1,595.56 \\ 48.35 $ | 89.33 89.29 84.21 84.20 84.19 84.18 110.72 110.72 110.72 110.72 99.91 99.97 99.78 99.81 | 11665 11432 10693 10692 10692 10690 10483 10482 10482 10482 10481 12680 12680 | 0 0 92 92 91 183 182 182 182 182 3 3 3 20 20 20 8 | | 511 508 521 0 0 0 0 0 0 0 0 0 0 0 0 0 0 435 419 412 418 2229 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 | P:OIL MO P:OIL MO P:OIL MO P:GAS P:G | $\begin{array}{c} 124\\ 102\\ 150\\ 143, 101\\ 142, 223\\ 141, 657\\ 203, 785\\ 202, 950\\ 202, 172\\ 201, 567\\ 5, 689\\ 5, 682\\ 7, 70\\ 35, 082, 780\\ 35, 082, 780\\ 35, 1$ | $\begin{array}{c} 2.3 \\ 1.9 \\ 2.8 \\ 1,121.3 \\ 1,114.1 \\ 1,109.4 \\ 1,102.6 \\ 1,613.5 \\ 1,606.7 \\ 1,600.7 \\ 1,600.4 \\ 1,595.4 \\ 48.4 \\ 48.4 \\ 48.4 \\ 48.4 \\ 48.4 \\ 48.4 \\ 475.5 \\ 478.9 \\ 475.7 \\ 473.0 \\ 491.6 \\ 43.6 \\ 58,318.1 \\ 58,853.2 \end{array}$ |

Title: Commission Case - True Up Baseline - No Taum Sauk Study Start: 04-01-2007 Study Stop: 03-30-2008

rDate: 12-01-2008 rTime: 22:25:42

| D | Cap Fact | Generation | Total Cost | Ó / METT | Heat Rate | Start Cold | | -Hours Full | | Fuel | Ouantity | Fuel Cost |
|---|-------------|---|---|--|---------------|---------------|---|-----------------------|------|---|--|--|
| Resource | Fact | Generation | Total Cost | \$/MWH ====== | Rate ===== | Cold | | Full | Part | Fuel | ~ | Fuel Cost |
| U:RUSH ISLAND 2F | 0.811 | 4,231,963 | 71,307.04 | 16.85 | 10086 | 5 | 0 | 852 | | I:OIL MO I:RUS COAL P:RUS COAL Total | 17,240 17,240 42,685,040 | 323.1 28.7 70,955.3 71,307.0 |
| U:SIOUX 1L-34 | 0.714 | 2,862,101 | 50,212.16 | 17.54 | 9857 | 12 | 0 | 1864 | 82 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 6,782 45,384 26,917,910 1,295,045 | 127.1 80.4 47,709.3 2,295.3 50,212.2 |
| U:SIOUX 2L-34 | 0.876 | 3,513,797 | 61,029.50 | 17.37 | 9761 | 13 | 0 | 298 | 34 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 7,895 52,839 32,857,770 1,439,174 | 148.0 93.7 58,237.1 2,550.8 61,029.5 |
| U:VENICE CT2 | 0.020 | 9,154 | 856.79 | 93.60 | 10478 | 52 | 0 | 0 | 0 | I:OIL MO P:GAS Total | 5,021 95,912 | 94.1 762.7 856.8 |
| U:VENICE CT3 | 0.018 | 28,782 | 2,460.52 | 85.49 | 10405 | 41 | 0 | 0 | 0 | P:GAS | 308,382 | 2,460.5 |
| U:VENICE CT4 | 0.018 | 28,036 | 2,396.31 | | 10405 | 40 | Ő | Ő | | P:GAS | 300,506 | 2,396.3 |
| U:VENICE CT5 | 0.002 | 1,533 | 162.41 | 105.91 | 12123 | 3 | 0 | 0 | 0 | P:GAS | 19,107 | 162.4 |
| U:VIADUCT CT1 | 0.000 | 8 | 1.68 | 207.82 | 18713 | 0 | 0 | 523 | 0 | P:GAS | 201 | 1.7 |
| H:KEOKUK H:OSAGE B:APL-FIXPURCH B:APL-ECONPURCH B:PURCHASE-E S:APL-FIXSALE S:SALES-F S:SALES-E | | 887,165 430,981 378,880 687,498 1,106,186 -968,960 -3,564,704 -5,798,906 | 0.00 0.00 13,048.62 13,195.65 65,028.80 -53,259.18 -162,631.20 -226,282.00 | 0.00 0.00 34.44 19.19 58.79 54.97 45.62 39.02 | | | | 0 0 0 0 0 | | | | |
| | ===== | | | ====== | ===== | | | ===== | | | | |
| Total | | 40,871,583 | 301,002.30 | 7.36 | | 1748 | 0 | 26523 | 1992 | | | 651,901.5 |

| Resource | Cap Fact ===== | Generation | Total Cost | \$/MWH ====== | Heat Rate ===== | Star Cold | Hot | -Hours Full | Part | Fuel | Quantity | Fuel Cost |
|--|--|--|--|--|--|--|--|---|---|--|---|--|
| U: AUDRAIN CT1 U: AUDRAIN CT2 U: AUDRAIN CT2 U: AUDRAIN CT4 U: AUDRAIN CT4 U: AUDRAIN CT5 U: AUDRAIN CT6 U: AUDRAIN CT7 U: AUDRAIN CT7 U: CALLAWAY 1D U: FAIRGROUNDS GT U: GOOSE CREEK CT1 U: GOOSE CREEK CT1 U: GOOSE CREEK CT4 U: GOOSE CREEK CT4 U: GOOSE CREEK CT4 U: GOOSE CREEK CT5 U: GOOSE CREEK CT6 U: HOWARD BEND CT U: KINMUNDY CT 1 U: KINMUNDY CT 2 U: KINKSVILLE CT U: LABADIE 1 | $\begin{array}{c}\\ 0.001\\ 0.001\\ 0.001\\ 0.001\\ 0.001\\ 0.000\\ 0.000\\ 0.857\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.000\\ 0.645 \end{array}$ | 832 759 688 560 454 443 375 304 9,305,572 0 154 114 103 63 64 53 0 6 3,442,289 | $\begin{array}{c} 85.53\\ 77.88\\ 70.51\\ 57.30\\ 46.65\\ 45.73\\ 38.86\\ 31.32\\ 58,420.55\\ 0.00\\ 15.95\\ 11.78\\ 10.67\\ 6.65\\ 6.58\\ 5.48\\ 5.48\\ 0.00\\ \end{array}$ | 102.81 102.56 102.52 102.42 103.12 103.59 103.19 6.28 0.00 103.93 102.98 | 11827 11808 11800 11786 11822 11832 11830 11848 9940 0 11877 11806 11854 | 3 3 2 2 2 2 2 2 2 1 1 6 0 0 0 0 0 0 0 0 0 0 0 0 0 5 | ===== 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 | 445 450 427 427 419 441 430 441 431 1076 511 444 433 442 429 414 529 0 0 534 1739 | 0 0 0 0 0 0 27 0 0 0 0 0 0 0 0 0 0 0 0 0 | P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:GAS P:OIL MO P:GAS P:G | 10,191 9,274 8,383 6,803 5,553 5,434 4,599 3,725 92,496,100 0 1,882 1,391 1,258 783 776 646 0 84 0 13,536 34,134,050 | 85.5 77.9 70.5 57.3 46.7 45.7 38.9 31.3 58,420.6 0.0 16.0 11.8 10.7 6.6 6.6 6.6 6.5 5.5 0.0 0.0 0.7 0.0 0.0 253.7 17.4 43,903.2 44,174.3 |
| U:LABADIE 2 | 0.757 | 3,964,883 | 51,238.38 | 12.92 | 9960 | 9 | 0 | 536 | 177 | I:OIL MO I:LAB COAL P:LAB COAL Total | 22,347 22,347 39,489,110 | 418.8 28.7 50,790.9 51,238.4 |
| U:LABADIE 3 | 0.765 | 4,122,554 | 52,759.48 | 12.80 | 9833 | 13 | 0 | 685 | 183 | I:OIL MO I:LAB COAL P:LAB COAL Total | 31,091 31,091 40,535,560 | 582.6 40.0 52,136.8 52,759.5 |
| U:LABADIE 4 | 0.747 | 4,023,443 | 51,502.38 | 12.80 | 9878 | 8 | 0 | 889 | 161 | I:OIL MO I:LAB COAL P:LAB COAL Total | 19,270 19,270 39,742,260 | 361.1 24.8 51,116.5 51,502.4 |
| U:MERAMEC 1 | 0.457 | 503,806 | 8,600.06 | 17.07 | 11618 | 7 | 0 | 1074 | 349 | C:GAS I:GAS I:MER 12 COA P:MER 12 COA Total | 37,488 2,130 2,191 5,815,669 | 303.5 17.7 3.1 8,275.7 8,600.1 |
| U:MERAMEC 2 | 0.484 | 538,357 | 9,217.52 | 17.12 | 11653 | 6 | 0 | 410 | 120 | C:GAS I:GAS I:MER 12 COA P:MER 12 COA Total | 40,175 1,966 2,022 6,233,226 | 328.6 16.1 2.9 8,869.9 9,217.5 |
| U:MERAMEC 3 | 0.536 | 1,248,428 | 20,292.74 | 16.25 | 11031 | 10 | 0 | 1515 | 263 | C:GAS I:GAS I:MER 34 COA P:MER 34 COA Total | 88,264 9,244 10,466 13,683,280 | 731.5 75.0 14.9 19,471.3 20,292.8 |
| U:MERAMEC 4 | 0.475 | 1,509,006 | 23,234.21 | 15.40 | 10462 | 11 | 0 | 1425 | 366 | C:GAS I:GAS I:MER 34 COA P:MER 34 COA Total | 101,152 7,980 9,558 15,686,300 | 834.5 64.5 13.6 22,321.6 23,234.2 |
| U:MERAMEC CT1 U:MERAMEC CT2 | 0.000 0.001 | 0 525 | 0.00 63.69 | 0.00 121.23 | 0 12360 | 0 5 | 0 0 | 528 0 | 0 0 | P:OIL MO I:OIL MO P:GAS Total | 0 511 6,494 | 0.0 9.6 54.1 63.7 |
| U:MEXICO CT U:MOBERLY CT U:MOREAU CT U:PENO CREEK CT1 U:PENO CREEK CT2 U:PENO CREEK CT3 U:PENO CREEK CT4 U:PINCKNEY CT1 U:PINCKNEY CT2 U:PINCKNEY CT4 U:PINCKNEY CT5 U:PINCKNEY CT5 U:PINCKNEY CT6 U:PINCKNEY CT6 U:PINCKNEY CT7 U:PINCKNEY CT7 U:PINCKNEY CT8 U:RACCOON CRK CT1 U:RACCOON CRK CT1 U:RACCOON CRK CT3 U:RACCOON CRK CT4 U:RUSH ISLAND 1F | 0.000 0.000 0.007 0.007 0.015 0.015 0.014 0.013 0.000 0 | 0 0 3,094 2,888 2,469 5,116 4,848 4,596 4,361 7 7 5 5 239 163 148 92 2,286,679 | 0.77 0.55 0.54 26.18 18.15 16.52 | 94.18 94.57 94.98 88.39 88.39 88.43 113.30 116.13 115.56 115.84 109.37 111.03 111.50 | 10545 10539 10537 12972 13275 13026 13054 12463 12455 12475 12497 | 0 0 222 20 19 18 45 42 40 0 0 0 0 0 1 1 1 1 8 | | 511 508 521 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 | P:OIL MO P:OIL MO P:OIL MO P:GAS | $\begin{array}{c} 0\\ 0\\ 0\\ 35,228\\ 32,870\\ 30,321\\ 28,243\\ 54,751\\ 51,851\\ 49,114\\ 46,595\\ 96\\ 91\\ 655\\ 64\\ 3,108\\ 2,138\\ 1,947\\ 1,229\\ 26,230\\ 26,230\\ 26,230\\ 24,245,190\\ \end{array}$ | $\begin{array}{c} 0.0\\ 0.0\\ 0.0\\ 290.9\\ 272.0\\ 251.4\\ 234.5\\ 452.2\\ 428.5\\ 406.2\\ 385.7\\ 0.8\\ 0.5\\ 0.5\\ 0.5\\ 26.2\\ 18.1\\ 16.5\\ 10.4\\ 491.6\\ 43.6\\ 40,302.8\\ 40,837.9 \end{array}$ |

rDate: 11-13-2008 rTime: 14:28:22

| Resource | Cap Fact ===== | Generation | Total Cost | \$/MWH ====== | Heat Rate ===== | Star Cold ===== | Hot | -Hours Full ===== | Part | Fuel | Quantity | Fuel Cost |
|---|----------------------------------|---|--|---|------------------------------|-----------------------|------------------|-------------------------|------------------|---|--|--|
| U:RUSH ISLAND 2F | 0.534 | 2,786,013 | 49,452.79 | 17.75 | 10602 | 5 | 0 | 852 | 26 | I:OIL MO I:RUS COAL P:RUS COAL Total | 17,240 17,240 29,538,020 | 323.1 28.7 49,101.1 49,452.8 |
| U:SIOUX 1L-34 | 0.530 | 2,126,266 | 38,552.73 | 18.13 | 10175 | 12 | 0 | 1864 | 82 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 6,782 45,384 20,642,870 991,733 | 127.1 80.4 36,587.5 1,757.7 38,552.7 |
| U:SIOUX 2L-34 | 0.661 | 2,652,070 | 47,520.84 | 17.92 | 10058 | 13 | 0 | 298 | 34 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 7,895 52,839 25,576,490 1,098,767 | 148.0 93.7 45,331.8 1,947.5 47,520.9 |
| U:VENICE CT2 | 0.005 | 2,082 | 204.81 | 98.38 | 10521 | 12 | 0 | 0 | 0 | I:OIL MO P:GAS Total | 1,122 21,902 | 21.0 183.8 204.8 |
| U:VENICE CT3 U:VENICE CT4 U:VENICE CT5 U:VIADUCT CT1 | 0.004 0.004 0.000 0.000 | 6,778 5,614 15 0 | 609.90 504.91 1.72 0.00 | 89.98 89.94 113.84 0.00 | 10429 10423 12750 0 | 9 8 0 0 | 0 0 0 0 | 0 0 523 | 0 0 0 0 | P:GAS P:GAS P:GAS P:GAS | 72,748 60,287 203 0 | 609.9 504.9 1.7 0.0 |
| H:KEOKUK H:OSAGE P:TAUM SAUK B:APL-FIXPURCH B:APL-ECONPURCH B:PURCHASE-E | | 887,165 430,981 -254,279 378,880 431,155 437,642 | 0.00 0.00 13,048.62 7,216.88 23,362.40 | 0.00 0.00 34.44 16.74 53.38 | | | | 0 0 0 | | | | |
| Total | | 40,871,588 | 544,123.68 | 13.31 | | ===== 424 | ===== 0 | ===== 26523 | ===== 1992 | | | =========== 500,495.8 |

rDate: 11-13-2008 rTime: 14:13:03

| Resource | Cap Fact ===== | Generation | Total Cost | \$/MWH ====== | Heat Rate ===== | Star Cold ===== | Hot | -Hours Full ===== | Part | Fuel | Quantity | Fuel Cost |
|---|-------------------------|-------------------------|----------------------------|------------------|----------------------------------|-----------------------|-------------|-------------------------|-------------|----------------------------------|----------------------------|-------------------------|
| U:AUDRAIN CT1 U:AUDRAIN CT2 U:AUDRAIN CT3 | 0.007 0.007 0.007 | 4,788 4,793 4,791 | 476.06 476.92 476.10 | 99.43 | ===== 11755 11757 11755 | 20 20 20 | 0 0 0 | 445 450 427 | 0 0 0 | P:GAS P:GAS P:GAS P:GAS | 58,432 58,514 58,474 | 476.1 476.9 476.1 |
| U:AUDRAIN CT4 | 0.007 | 4,758 | 472.53 | 99.31 | 11755 | 19 | 0 | 427 | 0 | P:GAS | 58,074 | 472.5 |
| U:AUDRAIN CT5 U:AUDRAIN CT6 | 0.007 0.007 | 4,710 4,800 | 467.93 477.42 | | 11755 11754 | 19 20 | 0 0 | 419 441 | 0 0 | P:GAS P:GAS | 57,480 58,571 | 467.9 477.4 |
| U:AUDRAIN CT7 | 0.007 | 4,811 | 478.51 | | 11754 | 20 | 0 | 436 | 0 | P:GAS | 58,695 | 478.5 |
| U:AUDRAIN CT8 U:CALLAWAY 1D | 0.007 0.858 | 4,726 9,312,331 | 469.91 58,469.69 | 99.43 6.28 | 11756 9941 | 19 6 | 0 0 | 431 1076 | 0 27 | P:GAS P:NUCLEAR | 57,698 92,573,850 | 469.9 58,469.7 |
| U:FAIRGROUNDS GT U:GOOSE CREEK CT1 | 0.000 0.007 | 9 4,628 | 2.82 460.32 | | 11432 11776 | 0 20 | 0 0 | 511 444 | 0 0 | P:OIL MO P:GAS | 150 56,658 | 2.8 460.3 |
| U:GOOSE CREEK CT1 | 0.007 | 4,628 | 465.64 | | 11773 | 20 | 0 | 444 | | P:GAS P:GAS | 57,243 | 460.3 |
| U:GOOSE CREEK CT3 U:GOOSE CREEK CT4 | 0.007 0.007 | 4,657 4,628 | 463.16 460.27 | | 11773 11776 | 20 20 | 0 0 | 433 442 | 0 0 | P:GAS P:GAS | 56,970 56,653 | 463.2 460.3 |
| U:GOOSE CREEK CI4 U:GOOSE CREEK CI5 | 0.007 | 4,628 | 456.01 | | 11773 | 19 | 0 | 442 | 0 | P:GAS P:GAS | 56,053 | 456.0 |
| U:GOOSE CREEK CT6 U:HOWARD BEND CT | 0.007 0.000 | 4,697 12 | 467.18 3.98 | 99.47 340.75 | 11773 14303 | 20 0 | 0 0 | 414 529 | 0 0 | P:GAS P:OIL MO | 57,455 212 | 467.2 4.0 |
| U:KINMUNDY CT 1 | 0.000 | 1,533 | | | 12034 | 3 | 0 | 0 | 0 | P:GAS | 18,971 | 161.2 |
| U:KINMUNDY CT 2 U:KIRKSVILLE CT | 0.002 | 1,533 7 | | 105.16 174.84 | 12034 22207 | 3 0 | 0 0 | 0 534 | 0 0 | P:GAS P:GAS | 18,971 | 161.2 1.1 |
| U:LABADIE 1 | 0.000 0.766 | 4,088,051 | 52,539.56 | 12.85 | 9941 | 5 | 0 | 1739 | 113 | I:OIL MO | 144 13,536 | 253.7 |
| | | | | | | | | | | I:LAB COAL P:LAB COAL | 13,536 40,637,910 | 17.4 52,268.5 |
| | | | | | | | | | | Total | | 52,539.6 |
| U:LABADIE 2 | 0.896 | 4,691,062 | 60,661.53 | 12.93 | 9980 | 9 | 0 | 536 | 177 | I:OIL MO I:LAB COAL | 22,347 22,347 | 418.8 28.7 |
| | | | | | | | | | | P:LAB COAL | 46,815,420 | 60,214.0 |
| | | | | | | | | | | Total | | 60,661.5 |
| U:LABADIE 3 | 0.875 | 4,712,310 | 60,257.67 | 12.79 | 9839 | 13 | 0 | 685 | 183 | I:OIL MO I:LAB COAL | 31,091 31,091 | 582.6 40.0 |
| | | | | | | | | | | P:LAB COAL | 46,365,280 | 59,635.0 |
| | | | | | | | | | | Total | | 60,257.7 |
| U:LABADIE 4 | 0.864 | 4,654,144 | 59,571.15 | 12.80 | 9887 | 8 | 0 | 889 | 161 | I:OIL MO | 19,270 | 361.1 |
| | | | | | | | | | | I:LAB COAL P:LAB COAL | 19,270 46,015,620 | 24.8 59,185.3 |
| | | | | | | | | | | Total | | 59,571.2 |
| U:MERAMEC 1 | 0.793 | 874,437 | 14,078.58 | 16.10 | 10969 | 7 | 0 | 1074 | 349 | C:GAS | 61,417 | 495.7 |
| | | | | | | | | | | I:GAS I:MER 12 COA | 2,130 2,191 | 17.7 3.1 |
| | | | | | | | | | | P:MER 12 COA | 9,530,595 | 13,562.0 |
| | | | | | | | | | | Total | | 14,078.6 |
| U:MERAMEC 2 | 0.872 | 970,230 | 15,615.62 | 16.09 | 10964 | 6 | 0 | 410 | 120 | C:GAS | 68,106 | 556.4 |
| | | | | | | | | | | I:GAS I:MER 12 COA | 1,966 2,022 | 16.1 2.9 |
| | | | | | | | | | | P:MER 12 COA | | 15,040.3 |
| | | | | | | | | | | Total | | 15,615.6 |
| U:MERAMEC 3 | 0.761 | 1,773,007 | 28,521.57 | 16.09 | 10931 | 10 | 0 | 1515 | 263 | C:GAS I:GAS | 124,166 9,244 | 1,028.9 75.0 |
| | | | | | | | | | | I:MER 34 COA | 10,466 | 14.9 |
| | | | | | | | | | | P:MER 34 COA Total | 19,257,040 | 27,402.8 28,521.6 |
| | 0.717 | 0 077 001 | 34,705.07 | 15 04 | 10260 | 11 | 0 | 1405 | 266 | | 151 010 | |
| U:MERAMEC 4 | 0.717 | 2,277,091 | 34,705.07 | 15.24 | 10300 | 11 | U | 1425 | 300 | C:GAS I:GAS | 151,213 7,980 | 1,245.8 64.5 |
| | | | | | | | | | | I:MER 34 COA P:MER 34 COA | | 13.6 33,381.2 |
| | | | | | | | | | | Total | 23,430,520 | 34,705.1 |
| U:MERAMEC CT1 | 0.000 | 11 | 2.94 | 267.19 | 10676 | 0 | 0 | 528 | 0 | P:OIL MO | 157 | 2.9 |
| U:MERAMEC CT2 | 0.009 | 4,310 | 464.60 | 107.79 | 11941 | 28 | 0 | 0 | 0 | I:OIL MO P:GAS | 2,697 | 50.5 |
| | | | | | | | | | | Total | 51,467 | 414.1 464.6 |
| U:MEXICO CT | 0.000 | 8 | 2.33 | 297.78 | 11316 | 0 | 0 | 511 | 0 | P:OIL MO | 124 | 2.3 |
| U:MOBERLY CT | 0.000 | б | 1.91 | 304.33 | 11665 | 0 | 0 | 508 | 0 | P:OIL MO | 102 | 1.9 |
| U:MOREAU CT U:PENO CREEK CT1 | 0.000 0.030 | 9 12,436 | 2.82 1,110.90 | | 11432 10693 | 0 92 | 0 0 | 521 0 | | P:OIL MO P:GAS | 150 141,849 | 2.8 1,110.9 |
| U:PENO CREEK CT2 | 0.030 | 12,357 | 1,103.70 | 89.32 | 10691 | 91 | 0 | 0 | 0 | P:GAS | 140,973 | 1,103.7 |
| U:PENO CREEK CT3 U:PENO CREEK CT4 | 0.029 0.029 | 12,306 12,262 | 1,098.70 1,094.42 | | 10691 10690 | 91 91 | 0 0 | 0 0 | | P:GAS P:GAS | 140,382 139,873 | 1,098.7 1,094.4 |
| U:PINCKNEY CT1 | 0.058 | 19,078 | 1,605.58 | 84.16 | 10480 | 183 | 0 | 0 | 0 | P:GAS | 202,859 | 1,605.6 |
| U:PINCKNEY CT2 U:PINCKNEY CT3 | 0.058 0.058 | 19,008 18,943 | 1,599.49 1,594.05 | | 10479 10479 | 183 182 | 0 0 | 0 | | P:GAS P:GAS | 202,099 201,416 | 1,599.5 1,594.1 |
| U:PINCKNEY CT4 | 0.057 | 18,887 | 1,589.00 | 84.13 | 10478 | 182 | 0 | 0 | 0 | P:GAS | 200,811 | 1,589.0 |
| U:PINCKNEY CT5 U:PINCKNEY CT6 | 0.001 0.001 | 437 437 | | 110.73 110.73 | | 3 3 | 0 0 | 0 0 | | P:GAS P:GAS | 5,689 5,689 | 48.4 48.4 |
| U:PINCKNEY CT7 | 0.001 | 437 | 48.35 | 110.73 | 12681 | 3 | 0 | 0 | 0 | P:GAS | 5,689 | 48.4 |
| U:PINCKNEY CT8 U:RACCOON CRK CT1 | 0.001 0.007 | 437 4,755 | 48.35 474.98 | 110.73 | 12681 11809 | 3 20 | 0 0 | 0 435 | | P:GAS P:GAS | 5,689 58,326 | 48.4 475.0 |
| U:RACCOON CRK CT2 | 0.007 | 4,778 | 477.47 | 99.92 | 11806 | 20 | 0 | 419 | 0 | P:GAS | 58,576 | 477.5 |
| U:RACCOON CRK CT3 U:RACCOON CRK CT4 | 0.007 0.007 | 4,764 4,732 | 475.07 472.27 | | 11807 11808 | 20 20 | 0 0 | 412 418 | | P:GAS P:GAS | 58,415 58,043 | 475.1 472.3 |
| U:RUSH ISLAND 1F | 0.662 | 4,732 3,478,350 | 472.27 58,866.38 | | 10088 | 20 | 0 | 2229 | | I:OIL MO | 26,230 | 491.6 |
| | | | | | | | | | | I:RUS COAL P:RUS COAL | 26,230 35,090,660 | 43.6 58,331.2 |
| | | | | | | | | | | Total | 100,000,000 | 58,331.2 58,866.4 |
| | | | | | | | | | | | | |

rDate: 11-13-2008 rTime: 14:13:03

| Resource | Cap Fact ===== | Generation | Total Cost | \$/MWH ====== | Heat Rate ===== | Star Cold ===== | Hot | -Hours Full ===== | Part | Fuel | Quantity | Fuel Cost |
|---|----------------------------------|---|--|--|-----------------------|-----------------------|------------------|-------------------------|---------------|---|--|--|
| U:RUSH ISLAND 2F | 0.811 | 4,232,527 | 71,315.30 | 16.85 | | 5 | 0 | 852 | | I:OIL MO I:RUS COAL P:RUS COAL Total | 17,240 17,240 42,689,990 | 323.1 28.7 70,963.6 71,315.3 |
| U:SIOUX 1L-34 | 0.714 | 2,862,272 | 50,214.63 | 17.54 | 9857 | 12 | 0 | 1864 | 82 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 6,782 45,384 26,919,330 1,295,018 | 127.1 80.4 47,711.8 2,295.3 50,214.6 |
| U:SIOUX 2L-34 | 0.876 | 3,514,052 | 61,033.48 | 17.37 | 9761 | 13 | 0 | 298 | 34 | I:OIL MO I:SI 80-20 P:SI 80-20 P:SI 60-40 Total | 7,895 52,839 32,860,020 1,439,179 | 148.0 93.7 58,241.1 2,550.8 61,033.5 |
| U:VENICE CT2 | 0.020 | 9,058 | 847.76 | 93.59 | 10477 | 51 | 0 | 0 | 0 | I:OIL MO P:GAS Total | 4,983 94,902 | 93.4 754.4 847.8 |
| U:VENICE CT3 U:VENICE CT4 U:VENICE CT5 U:VIADUCT CT1 | 0.018 0.018 0.002 0.000 | 28,385 27,722 1,533 8 | 2,426.14 2,369.54 162.41 1.68 | 85.47 85.48 105.91 207.82 | 10403 12123 | 40 40 3 0 | 0 0 0 0 | 0 0 523 | 0 | P:GAS P:GAS P:GAS P:GAS | 304,159 297,160 19,107 201 | 2,426.1 2,369.5 162.4 1.7 |
| H:KEOKUK H:OSAGE P:TAUM SAUK B:APL-FIXPURCH B:APL-ECONPURCH B:PURCHASE-E S:SALES-F S:SALES-F | | 887,165 430,981 -254,279 378,880 689,391 1,099,148 -968,960 -3,564,704 -5,552,154 | $\begin{array}{c} 0.00\\ 0.00\\ 13,048.62\\ 13,228.82\\ 56,768.21\\ -53,259.25\\ -162,630.90\\ -235,858.00\end{array}$ | $\begin{array}{c} 0.00\\ 0.00\\ 34.44\\ 19.19\\ 51.65\\ 54.97\\ 45.62\\ 42.48\\ \end{array}$ | | | | 0 0 0 0 0 | | | | |
| Total | | | 283,217.30 | | | ===== 1744 | ===== 0 | ===== 26523 | ===== 1992 | | | 651,919.8 |

ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5

CANCELLING MO.P.S.C. SCHEDULE NO.

Original SHEET NO. 98.1

SHEET NO.

APPLYING TO

MISSOURI SERVICE AREA

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE

APPLICABILITY

This rider is applicable to kilowatt-hours (kWh) of energy supplied to customers served by the Company under Service Classification Nos. 1(M), 2(M), 3(M), 4(M), 5(M), 6(M), 7(M), 8(M), 11(M), and 12(M).

Costs passed through this Fuel and Purchased Power Adjustment Clause (FAC) reflect differences between actual fuel and purchased power costs, including transportation, net of Off-System Sales Revenues (OSSR) (i.e., Actual Net Fuel Costs) and Net Base Fuel Costs (factor NBFC, as defined below), calculated and recovered as provided for herein.

For purposes of this FAC, the true-up year shall be from March 1 through the last day of February of the following year. The Accumulation Periods and Recovery Periods are as set forth in the following table:

| Accumulation Period (AP) | Filing Date | Recovery Period (RP) |
|--------------------------|---------------|---------------------------|
| February through May | By August 1 | October through September |
| June through September | By December 1 | February through January |
| October through January | By April 1 | June through May |

Accumulation Period (AP) means the historical calendar months during which fuel and purchased power costs, including transportation, net of OSSR for all kWh of energy supplied to Missouri retail customers are determined.

Recovery Period (RP) means the billing months as set forth in the above table during which the difference between the Actual Net Fuel Costs during an Accumulation Period and NBFC are applied to and recovered through retail customer billings on a per kWh basis, as adjusted for service voltage level.

The Company will make a Fuel and Purchased Power Adjustment (FPA) filing by each Filing Date. The new FPA rates for which the filing is made will be applicable starting with the Recovery Period that begins following the Filing Date. All FPA filings shall be accompanied by detailed workpapers supporting the filing in an electronic format.

FPA DETERMINATION

Ninety five percent (95%) of the difference between Actual Net Fuel Costs and NBFC for all kWh of energy supplied to Missouri retail customers during the respective Accumulation Periods shall be reflected as an FPA_c credit or debit, stated as a separate line item on the customer's bill and will be calculated according to the following formulas.

For the FPA filing made by each Filing Date, the FPA_c rate, applicable starting with the Recovery Period following the applicable Filing Date, to recover fuel and purchased power costs, including transportation, net of OSSR, to the extent they vary from Net Base Fuel Costs (NBFC), as defined below, during the recently-completed Accumulation Period is calculated as: **SUPERSEDED**

* Indicates Addition.

June 21, 2010

Issued pursuant to the Order of the MoPSC in Case No. ER-2008-0318.
DATE OF ISSUE ______ January 30, 2009 DATE EFFECTIVE ______ March 1, 2009

| ISSUED BY | T. R. Voss | President & CEO | St. Louis, Missouri |
|-----------|-----------------|-----------------|---------------------|
| | NAME OF OFFICER | TITLE | ADDRESS |
| | | | Exhibit C |

UNION ELECTRIC COMPANY ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5 Original SHEET NO. 98.2

| * RIDER FAC FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.) FPA_(RP) = [[(CF+CPP-OSSR-TS-S) - (NBFC x S_{AP})]x 95% + I + R]/S_{RP} The FPA rate, which will be multiplied by the voltage level adjustment factors set forth below, applicable starting with the following Recovery period is calculated as: FPA_C = FPA_(RP) + FPA_(RP-1) + FPA_(RP-2) where: FPA_c = Fuel and Purchased Power Adjustment rate applicable starting with the Recovery Period following the applicable Filing Date. FPA_{RP} = FPA Recovery Period rate component calculated to recover under/over collection during the Accumulation Period that ended prior to the applicable Filing Date. FPA_(RP-1) = FPA Recovery Period rate component from prior FPA_{RP} calculation, if any. |
|--|
| The FPA rate, which will be multiplied by the voltage level adjustment factors set forth below, applicable starting with the following Recovery Period is calculated as: $FPA_{C} = FPA_{(RP)} + FPA_{(RP-1)} + FPA_{(RP-2)}$ where: $FPA_{C} = Fuel and Purchased Power Adjustment rate applicable startingwith the Recovery Period following the applicable FilingDate. FPA_{RP} = FPA Recovery Period rate component calculated to recoverunder/over collection during the Accumulation Period thatended prior to the applicable Filing Date. FPA_{(RP-1)} = FPA Recovery Period rate component from prior FPA_{RP}calculation, if any.$ |
| <pre>factors set forth below, applicable starting with the following Recovery Period is calculated as:</pre> |
| <pre>where: FPA_C = Fuel and Purchased Power Adjustment rate applicable starting with the Recovery Period following the applicable Filing Date. FPA_{RP} = FPA Recovery Period rate component calculated to recover under/over collection during the Accumulation Period that ended prior to the applicable Filing Date. FPA_(RP-1) = FPA Recovery Period rate component from prior FPA_{RP} calculation, if any.</pre> |
| FPA_C = Fuel and Purchased Power Adjustment rate applicable starting with the Recovery Period following the applicable Filing Date. FPA_{RP} = FPA Recovery Period rate component calculated to recover under/over collection during the Accumulation Period that ended prior to the applicable Filing Date. FPA_(RP-1) = FPA Recovery Period rate component from prior FPA_{RP} calculation, if any. |
| <pre>with the Recovery Period following the applicable Filing Date. FPA_{RP} = FPA Recovery Period rate component calculated to recover under/over collection during the Accumulation Period that ended prior to the applicable Filing Date. FPA_(RP-1) = FPA Recovery Period rate component from prior FPA_{RP} calculation, if any.</pre> |
| <pre>under/over collection during the Accumulation Period that ended prior to the applicable Filing Date. FPA_(RP-1) = FPA Recovery Period rate component from prior FPA_{RP} calculation, if any.</pre> |
| calculation, if any. |
| $FPA_{nn,\alpha} = FPA Recovery Period rate component from FPA_{nn,\alpha} calculation$ |
| prior to $FPA_{(RP-1)}$, if any. |
| <pre>CF = Fuel costs incurred to support sales to all retail customers and Off-System Sales allocated to Missouri retail electric operations, including transportation, associated with the Company's generating plants. These costs consist of the following:</pre> |
| a) For fossil fuel or hydroelectric plants: |
| (i) the following costs reflected in Federal Energy Regulatory Commission (FERC) Account Number 501: coal commodity, applicable taxes, gas, alternative fuels, fuel additives, Btu adjustments assessed by coal suppliers, railroad transportation, switching and demurrage charges, railcar repair and inspection costs, railcar depreciation, railcar lease costs, similar costs associated with other applicable modes of transportation, fuel hedging costs (for purposes of factor CF, hedging is defined as realized losses and costs minus realized gains associated with mitigating volatility in the Company's cost of fuel and purchased power, including but not limited to, the Company's use of futures, options and over-the-counter derivatives including, without limitation, futures contracts, puts, calls, caps, floors, collars, and swaps), hedging costs associated with SO2 and fuel oil |
| * Indicates Addition. SUPERSEDED June 21, 2010 |

| ISSUED BY | T. R. Voss | President & CEO | St. Louis, Missouri |
|-----------|-----------------|-----------------|---------------------|
| | NAME OF OFFICER | TITLE | ADDRESS |

UNION ELECTRIC COMPANY ELECTRIC SERVICE

APPLYING

| | MO.P.S.C. SCHEDULE NO. 5 | Original | SHEET NO. 98.3 |
|-----------|---|--|---|
| CANCELLIN | G MO.P.S.C. SCHEDULE NO | | SHEET NO. |
| IG TO | MISSOURI SERVICI | E AREA | |
| 1 | * <u>RIDER F</u> FUEL AND PURCHASED POWER ADJUS | | <u>)</u> |
| | costs, broker commiss: price hedges, oil cost expenses, and revenues | in commodity and transp ions and fees associate ts, ash disposal revent s and expenses resultin rtfolio optimization ac | ed with les and ng from fuel |
| | Number 547: natural of commodity, oil, transpreservation charges, for revenues and expenses | costs reflected in FER gas generation costs re portation, storage, cap fuel losses, hedging co resulting from fuel an lio optimization active | elated to pacity osts, and nd |
| | <pre>b) Costs in FERC Account Expense).</pre> | Number 518 (Nuclear Fu | ıel |
| CPP = | Costs of purchased power responses of purchased power responses and 575, excluding under MISO Schedules 10, 16 capacity charges for contract (1) year, incurred to support customers and Off-System Sate electric operations. Also are insurance premiums in Fireplacement power insurance Sauk Plant) to the extent the base rates. Changes in replacement power costs. Adds power will be reduced by expression of the than those relating the date the "TS" factor is this tariff, the premiums and replacement power insurance shall be included in this Capacity of the section. | g MISO administrative a , 17, and 24, and exclu- cts with terms in excess rt sales to all Missour les allocated to Missour included in factor "CPF ERC Account Number 924 (other than relating to hose premiums are not a lacement power insurand to the Taum Sauk Plant es shall increase or de itionally, costs of pur pected replacement power e relating to the Taum Generally Accepted Account the foregoing, concurr eliminated as provided and recoveries relating coverage for the Taum | fees arising uding ss of one ri retail uri retail p" for to the Taum reflected in ce premiums) from the ecrease rchased er insurance Sauk Plant) punting rently with d for in to |
| OSSR = | Revenues from Off-System Sat operations. | les allocated to Missou | ıri electric |
| | Off-System Sales shall inclu (including MISO revenues in excluding Missouri retail sa partial requirements sales, AmerenUE Missouri jurisdict: purchases made to serve Miss | FERC Account Number 44 ales and long-term full that are associated w ional generating units | 47), l and ith (1) , (2) power |

* Indicates Addition.

SUPERSEDED June 21, 2010

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related transmission.

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ELECTRIC SERVICE

| MO.P.S.C. SCHEDULE NO. | 5 |
|------------------------|---|
|------------------------|---|

CANCELLING MO.P.S.C. SCHEDULE NO.

SHEET NO. 98.4

SHEET NO.

Original

MISSOURI SERVICE AREA

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.)

TS = The Accumulation Period value of Taum Sauk. This factor will be used to reduce actual fuel costs to reflect the value of Taum Sauk, and will be credited in FPA filings (of which there are three each year as shown in the table above), until the next rate case or, if sooner, until Taum Sauk is placed back in service. This value is \$22.7 million annual for each true-up year as determined in the rate proceeding in which this FAC was established, one third of which (i.e., \$7.56 million) will be applied to each Accumulation Period.

- S = The Accumulation Period value of Blackbox Settlement Amount of \$3 million annually, which shall expire on September 1, 2010. One third of the annual value (\$1 million) shall be applied to each Accumulation Period. For the Accumulation Period during which the factor expires, the factor shall be prorated according to the number of days during which it was effective during that Accumulation Period.
- I = Interest applicable to (i) the difference between Actual Net Fuel Costs (adjusted for Taum Sauk and factor "S") and NBFC for all kWh of energy supplied to Missouri retail customers during an Accumulation Period until those costs have been recovered; (ii) refunds due to prudence reviews (a portion of factor R, below); and (iii) all under- or over-recovery balances created through operation of this FAC, as determined in the annual true-up filings provided for herein (a portion of factor R, below). Interest shall be calculated monthly at a rate equal to the weighted average interest rate paid on the Company's short-term debt, applied to the month-end balance of items (i) through (iii) in the preceding sentence.
- R = Under/over recovery (if any) from currently active and prior Recovery Periods as determined for the annual FAC true-up adjustments, and modifications due to adjustments ordered by the Commission (other than the adjustment for Taum Sauk as already reflected in the TS factor), as a result of required prudence reviews or other disallowances and reconciliations, with interest as defined in item I.
- S_{AP} = Supplied kWh during the Accumulation Period that ended prior to the applicable Filing Date, at the generation level.
- S_{RP} = Applicable Recovery Period estimated kWh, at the generation level, subject to the FPA_{RP} to be billed.

* Indicates Addition.

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ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5

CANCELLING MO.P.S.C. SCHEDULE NO.

Original SHEET NO. 98.5

SHEET NO.

APPLYING TO

MISSOURI SERVICE AREA

* <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.)

NBFC = Net Base Fuel Costs are the net costs determined by the Commission's order as the normalized test year value (and reflecting an adjustment for Taum Sauk, consistent with the term TS) for the sum of allowable fuel costs (consistent with the term CF), plus cost of purchased power (consistent with the term CPP), less revenues from off-system sales (consistent with the term OSSR), less an adjustment (consistent with the term "S"), expressed in cents per kWh, at the generation level, as included in the Company's retail rates. The NBFC rate applicable to June through September calendar months ("Summer NBFC Rate") is 1.001 cents per kWh. The NBFC rate applicable to October through May calendar months ("Winter NBFC Rate") is 0.690 cents per kWh.

To determine the FPA rates applicable to the individual Service Classifications, the FPA_c rate determined in accordance with the foregoing will be multiplied by the following voltage level adjustment factors:

| Secondary Voltage Service | 1.0888 |
|------------------------------------|--------|
| Primary Voltage Service | 1.0492 |
| Large Transmission Voltage Service | 1.0147 |

The FPA rates applicable to the individual Service Classifications shall be rounded to the nearest 0.001 cents, to be charged on a cents/kWh basis for each applicable kWh billed.

TRUE-UP OF FAC

After the completion of each true-up year, the Company will make a true-up filing by May 1 of each year (starting by May 1, 2010) with the Commission. Such filings shall be made by May 1 of every subsequent year until all fuel and purchased power costs accumulated during the effective period of the FAC have been recovered and trued-up. Any true-up adjustments or refunds shall be reflected in item R above, and shall include interest calculated as provided for in item I above.

The true-up adjustment shall be the difference between the revenues billed and the revenues authorized for collection during the true-up year.

GENERAL RATE CASE/PRUDENCE REVIEWS

The following shall apply to this Fuel and Purchased Power Adjustment Clause, in accordance with Section 386.266.4, RSMo. and applicable Missouri Public Service Commission Rules governing rate adjustment mechanisms established under Section 386.266, RSMo:

The Company shall file a general rate case with the effective date of new rates to be no later than four years after the effective date of a Missouri Public Service Commission order implementing or continuing this Fuel and **SUPERSEDED**

*Indicates Addition.

June 21, 2010

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ELECTRIC SERVICE

MO.P.S.C. SCHEDULE NO. 5 Original SHEET NO. 98.6

CANCELLING MO.P.S.C. SCHEDULE NO.

SHEET NO.

APPLYING TO

MISSOURI SERVICE AREA

* RIDER FAC

FUEL AND PURCHASED POWER ADJUSTMENT CLAUSE (CONT'D.)

Purchased Power Adjustment Clause. The four-year period referenced above shall not include any periods in which the Company is prohibited from collecting any charges under this Fuel and Purchased Power Adjustment Clause, or any period for which charges hereunder must be fully refunded. In the event a court determines that this Fuel and Purchased Power Adjustment Clause is unlawful and all moneys collected hereunder are fully refunded, the Company shall be relieved of the obligation under this Fuel and Purchased Power Adjustment Clause to file such a rate case.

Prudence reviews of the costs subject to this Fuel and Purchased Power Adjustment Clause shall occur no less frequently than every eighteen months, and any such costs which are determined by the Missouri Public Service Commission to have been imprudently incurred shall be returned to customers with interest at a rate equal to the weighted average interest rate paid on the Company's short-term debt.

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UNION ELECTRIC COMPANY ELECTRIC SERVICE

| MO.P.S.C. SCHEDULE NO. 5 | Original | SHEET NO. | 98.7 |
|--------------------------|----------|-----------|------|
| | | | |

CANCELLING MO.P.S.C. SCHEDULE NO.

SHEET NO.

| APPLYING TO | ANCELLING MO.P.S.C. SCHEDULE NO MISSOURI SERVICE AREA | | SHEET NO. |
|-------------|---|---------------------|----------------|
| | * <u>RIDER FAC</u> FUEL AND PURCHASED POWER ADJUSTMENT CL | AUSE (CONT'D.) | |
| Calcul | ation of Current FPA _c Rate: | | |
| | umulation Period Ending: | | mm/dd/yy |
| 11000 | | | |
| 1. | Total Energy Cost (CF+CPP-OSSR-TS-S) | | \$0 |
| 2. | Base Energy Cost | - | |
| | 2.1 NBFC (\$/kWh) | х | \$0.0000 |
| | 2.2 Accumulation Period Sales kWh (S_{AP}) | | 0 |
| 3. | First Subtotal (12.) | | \$0 |
| 4. | Customer Responsibility | х | 95% |
| 5. | Second Subtotal | | \$0 |
| б. | Adjustment for Under / Over recovery for Prior Periods Plus Interest (I + R) | ± | \$0 |
| 7. | Third Subtotal | | \$0 |
| 7. 8. | Estimated Recovery Period Sales kWh (S_{RP}) | ÷ | Ç 0 |
| 9. | FPA_{RP} | • | \$0.0000 |
| 10. | FPA _{RP-1} | + | \$0.0000 |
| 10. | FPA_{RP-2} | + | \$0.0000 |
| 12. | FPA _C (without Voltage Level Adjustment) | | \$0.0000 |
| 12. | Voltage Level Adjustment Factor | | ÇO:0000 |
| 13. | 13.1 Secondary | x | 1.0888 |
| | 13.2 Primary | x | 1.0492 |
| | 13.3 Large Transmission | x | 1.0147 |
| 14. | FPA _c (with voltage level adjustment) | А | 1.011/ |
| 11. | 14.1 Secondary | | \$0.0000 |
| | 14.2 Primary | | \$0.0000 |
| | 14.3 Large Transmission | | \$0.0000 |
| | 14.5 Large framsmission | | ŞU.UUUU |
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| * Indi | cates Addition. | SUPER: September | - |
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