| | |
|---|---|
| *Exhibit No.:* | |
| *Issue:* | *Annualized Sales for Energy Efficiency* |
| *Witness:* | *John A. Rogers* |
| *Sponsoring Party:* | *MO PSC Staff* |
| *Type of Exhibit:* | *Surrebuttal Testimony* |
| *Case No.:* | *ER-2016-0285* |
| *Date Testimony Prepared:* | *January 27, 2017* |

# MISSOURI PUBLIC SERVICE COMMISSION

## COMMISSION STAFF DIVISION

## ENERGY RESOURCES DEPARTMENT

## SURREBUTTAL TESTIMONY

## OF

## JOHN A. ROGERS

## KANSAS CITY POWER & LIGHT COMPANY

## CASE NO. ER-2016-0285

***Jefferson City, Missouri***
***January 2017***

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**SURREBUTTAL TESTIMONY OF**

**JOHN A. ROGERS**

**KANSAS CITY POWER & LIGHT COMPANY**

**CASE NO. ER-2016-0285**

**SURREBUTTAL**

**TESTIMONY**

**OF**

**JOHN A. ROGERS**

**KANSAS CITY POWER & LIGHT COMPANY**

**CASE NO. ER-2016-0285**

Q. Please state your name and business address.

A. My name is John A. Rogers, and my business address is Missouri Public Service Commission, P. O. Box 360, Jefferson City, Missouri 65102.

Q. What is your present position at the Missouri Public Service Commission ("Commission")?

A. I am Utility Regulatory Manager in the Energy Resources Department of the Commission Staff Division.

Q. Please state your educational background and experience.

A. These are contained in Schedule JAR-s1.

Q. Please summarize the purpose of your surrebuttal testimony.

A. I discuss certain aspects of the rebuttal testimony of KCPL's witness Tim M. Rush regarding KCPL's adjustment to annualize kWh sales in this general rate case as a result of KCPL's Missouri Energy Efficiency Investment Act ("MEEIA") Cycle 1 demand-side programs. I explain why KCPL's annualization of kWh in this rate case due to its Cycle 1 demand-side programs is prohibited under: 1) the *Non-Unanimous Stipulation and Agreement Resolving Kansas City Power & Light Company's MEEIA Filing*, which was filed on May 27, 2014 in Case No. EO-2014-0095 ("Cycle 1 Stipulation"); 2) the *Non-Unanimous Stipulation*

*and Agreement Resolving MEEIA Filings*, which was filed on November 23, 2015, in Case Nos. EO-2015-0240 and EO-2015-0241 ("Cycle 2 Stipulation"); and 3) KCPL's Cycle 2 DSIM Rider.[1]

**Only Cycle 2 demand-side programs can be used when annualizing kWh sales in accordance with KCPL's Cycle 2 Stipulation and Cycle 2 DSIM Rider.**

Q. Please respond to this statement in Mr. Rush's rebuttal testimony: "The language used in the MEEIA 2 Stipulation, "all active MEEIA programs", was purposefully broad to include MEEIA Cycle 1 and Cycle 2 programs. Nowhere in the stipulation did it exclude Cycle 1 or specify Cycle 2 as the only programs to be reflected in the adjustment."[2]

A. The language "all active MEEIA programs" in the Cycle 2 Stipulation[3] does not express or create an unintended opportunity for KCPL to annualize kWh sales from its Cycle 1 demand-side programs. To the contrary, Cycle 1 demand-side programs are explicitly excluded from the kWh annualization process in the Cycle 2 Stipulation and the Cycle 2 DSIM Rider because:

1. The language "all active MEEIA programs" occurs exactly four (4) times in the Cycle 2 Stipulation and all four (4) occurrences are in paragraph 10: Annualizations of the Cycle 2 Stipulation;

2. Paragraph 10 a.(ii) of the Cycle 2 Stipulation clearly specifies that the various steps to annualize kWh sales for "all active MEEIA programs" is the methodology in KCPL's Tariff Sheets 49K and 49L;

[1] Kansas City Power & Light Company, P.S.C.MO. No. 7, Original Sheet Nos. 49F through 49P.
[2] Rush rebuttal testimony at page 15, lines 12 - 15.
[3] Cycle 2 Stipulation page 13 paragraph 10. Annualizations.

3. KCPL's Tariff Sheets 49K and 49L refer only to "programs", "all programs" or "Cycle 2 programs" and do not use phrases such as "all active programs," "all active MEEIA programs" or "Cycle 1 programs";

4. KCPL's Tariff Sheet 49L explicitly defines "Programs" as Cycle 2 programs and does not include Cycle 1 programs: "Programs–MEEIA Cycle 2 programs listed in Tariff Sheet 1.04C and added in accordance with the Commission's rule 4 CSR 240-20.094(4);" and

5. KCPL Tariff Sheet 1.04C includes only KCPL's MEEIA Cycle 2 demand-side programs and is provided as Schedule JAR-s2.

**Other than Cycle 1's unrecovered balances being recovered through the Cycle 2 DSIM Rider, Cycle 1 and Cycle 2 are mutually exclusive of each other.**

Q. Please respond to this statement in Mr. Rush's rebuttal testimony: "The [Cycle 2] Stipulation addresses both Cycle 1 and Cycle 2 in numerous places throughout the Cycle 2] agreement."[4]

A. The Cycle 2 Stipulation addresses Cycle 1 in only two ways. The first way is that it provides for KCPL to recover Cycle 1 unrecovered balances[5] for Cycle 1 program costs and Cycle 1 throughput disincentive ("TD-NSB Share"), as well as any Commission-approved Cycle 1 performance incentive award, through the methodology in KCPL's Cycle 2 DSIM Rider. KCPL's Cycle 2 DSIM Rider is provided as Schedule JAR-s3 and contains numerous provisions for the collection of unrecovered balances for Cycle 1 to be recovered through the Cycle 2 DSIM Rider. For example, Tariff Sheet 49F provides:

> Charges passed through this DSIM Rider reflect the charges approved to be collected from the implementation of the Missouri Energy Efficiency

[4] Rush rebuttal testimony at page 15 lines 17 – 18.
[5] Cycle 2 Stipulation, page 12(ii) **Recovery Mechanism**.

> Investment Act (MEEIA) Cycle 2 Plan ***& any remaining unrecovered charges from the MEEIA Cycle 1 Plan DSIM***. Those charges include:
>
> > 1) Program Costs, Throughput Disincentive (TD), and Earnings Opportunity Award (if any) for the MEEIA Cycle 2 Plan; ***as well as, Program Costs and TD-NSB Share for commission approved C&I program projects completed by June 30 2016 that will be counted under the MEEIA Cycle 1 Plan, as outlined in S&A found in EO-2015-0240; and any earned Performance Incentive earned (and ordered) attributable to MEEIA Cycle 1 as set out in File No EO-2014-0095.***
> >
> > 2) Reconciliations, with interest, to true-up for differences between the revenues billed under this DSIM Rider and total actual monthly amounts for:
> >
> > > i) Program Costs incurred in Cycle 2 ***and/or remaining unrecovered amounts for MEEIA Cycle 1,***
> > >
> > > ii) TD Share incurred in Cycle 2, ***and/or true-ups or unrecovered amounts for MEEIA Cycle 1, and***
> > >
> > > iii) ***Amortization of any Performance Incentive (PI) Award or Earnings Opportunity ordered by the Missouri Public Service Commission (Commission)*** **[*Emphasis added.*]**

The second way the Cycle 2 Stipulation addresses Cycle 1 is that it provides a transition between Cycle 1 and Cycle 2 to accommodate previously approved Cycle 1 C&I Custom Rebate program projects completed after the time period of Cycle 1. Paragraph 12: <u>Transition Between MEEIA Cycles</u> of the Cycle 2 Stipulation includes in paragraph 12.a. the following schedule for completion of the Cycle 1 C&I Custom Rebate program:

> a. ... ... The last day to submit an application for the Cycle 1 C&I Custom Rebate program is December 15, 2015. The last day for approval of an application for the Cycle 1 C&I Custom Rebate program is January 31, 2016. The last day for completion of customer projects and submission of complete paperwork by customers is June 30, 2016. The final payment by KCP&L/GMO of rebates for all Cycle 1 projects is July 31, 2016.

Finally, the Cycle 2 Stipulation's paragraph 12.d. includes the following condition:

> d. ... ... ***Recovery of all Cycle 1 DSIM costs including all program costs, <u>all throughput disincentive</u> and any performance incentive for Cycle 1 C&I Custom Rebate program projects will be achieved***

> ***through the Cycle 1 DSIM subject to prudence review for Cycle 1 DSIM costs.*** As the result of the agreements in this Stipulation, KCP&L and GMO shall use their respective Cycle 1 2015 DSMore files to calculate the Cycle 1 gross benefits to determine the TD-NSB for projects completed under the C&I Custom Rebate program between January 1, 2016 and June 30, 2016. These projects will be modeled in DSMore with a completion date of December 31, 2015. The Cycle 1 performance incentive amounts will result from full retrospective EM&V. [***Emphasis added.***]

Q. What do you conclude about the provisions of the Cycle 2 Stipulation that you cited in your previous answer?

A. The relationship between KCPL's Cycle 1 demand-side programs and DSIM and KCPL's Cycle 2 demand-side programs and DSIM is very narrowly defined to provide for only the recovery of unrecovered Cycle 1 balances for program costs and for the throughput disincentive and any Commission-approved Cycle 1 performance incentive award through the period of the Cycle 2 DSIM Rider. Other than Cycle 1's unrecovered balances being recovered through the Cycle 2 DSIM, Cycle 1 programs and Cycle 2 programs are mutually exclusive of each other. The Cycle 2 Stipulation and Cycle 2 DSIM Rider contain no provision for the annualization of Cycle 1 demand-side programs in this rate case proceeding.

**KCPL's Cycle 1 Throughput Disincentive Net Shared Benefit (TD-NSB Share) does not and should not allow annualization of kWh sales due to Cycle 1 demand-side programs.**

Q. What is the origin of KCPL's TD-NSB and how does KCPL's Cycle 1 TD-NSB work?

A. KCPL and GMO modeled their Cycle 1 TD-NSB Share mechanisms after Ameren Missouri's Cycle 1 TD-NSB Share mechanism. In fact, GMO received a copy of Ameren Missouri's Cycle 1 TD-NSB electronic work papers and modified those work papers

to construct its own, but similar, Cycle 1 TD-NSB model. Subsequently, KCPL modified the GMO Cycle 1 TD-NSB electronic work papers when developing KCPL's TD-NSB Share mechanism for the Cycle 1 Stipulation. A general description of how the Cycle 1 TD-NSB Share model works is contained in the Ameren Missouri 2013 – 2015 Energy Efficiency Plan[6] and is provided as Schedule JAR-s4. Figure 2.2 on page 4 of Schedule JAR-s4 demonstrates that for Ameren Missouri's 2013 – 2015 Energy Efficiency Plan, with general rate cases assumed to occur every 18 months, it is expected to take many years and several rate cases to properly capture the effects of energy efficiency in rates due to regulatory lag. Page 5 of Schedule JAR-s4 concludes with Ameren Missouri's general description of the TD-NSB model as follows:

> This [regulatory lag] effect dramatically delays the time in which the effects of energy efficiency programs are fully incorporated into rates. It is possible to mitigate this effect by annualizing the test year billing units for the effects of energy efficiency but this is not standard practice in Missouri. ***The analysis for Ameren Missouri's proposed DSIM does not assume the energy efficiency savings have been annualized for the test year.*** [***Emphasis added***]

KCPL's Cycle 1 TD-NSB Share mechanism is described on page 4 of KCPL's Cycle 1 Stipulation and does not provide for the annualization of kWh sales. This is attached as Schedule JAR-s5.

> **TD-NSB Share:** ***The TD-NSB Share is the sum of the net shared benefits over the MEEIA Plan period multiplied by 26.36%.*** The energy and demand savings will be based on actual measures installed and tracked each month, and their associated deemed energy (kWh) savings and deemed demand (kW) savings and deemed lifetimes. For purposes of calculating the actual net shared benefits, a net-to-gross ("NTG") ratio of 1.00 will be used for all programs, with the exception of the Home Appliance Recycling Rebate program (a NTG of 0.52 will be used) and CFL's within the Residential Lighting and the Business Energy Efficiency Rebates- Custom and Business Energy Efficiency

[6] Case No. EO-2012-0142.

> Rebates-Standard programs (a NTG of 0.90 in 2014 and a NTG of 0.70 in 2015 will be used for CFL measures). The net shared benefits is the sum of the 2014 present value of avoided utility costs over the measures' lives less 2014 present value of all programs' costs (including program design, administration, delivery, end-use measures, incentives, evaluation, measurement and verification ("EM&V"), utility market potential studies, and technical resource manual) discounted using the currently approved KCP&L weighted average cost of capital rate (6.961%). ***The total TD-NSB Share during the 18-month planning period is expected to be $8,885,678, or 26.36% of the total estimated annual net shared benefits of $33,702,693.*** Both the TD-NSB share expected dollars and annual net shared benefits referenced herein were discounted utilizing the approved Weighted Average Cost of Capital of 6.961% to reflect the time value of money.
> ***[Emphasis added]***

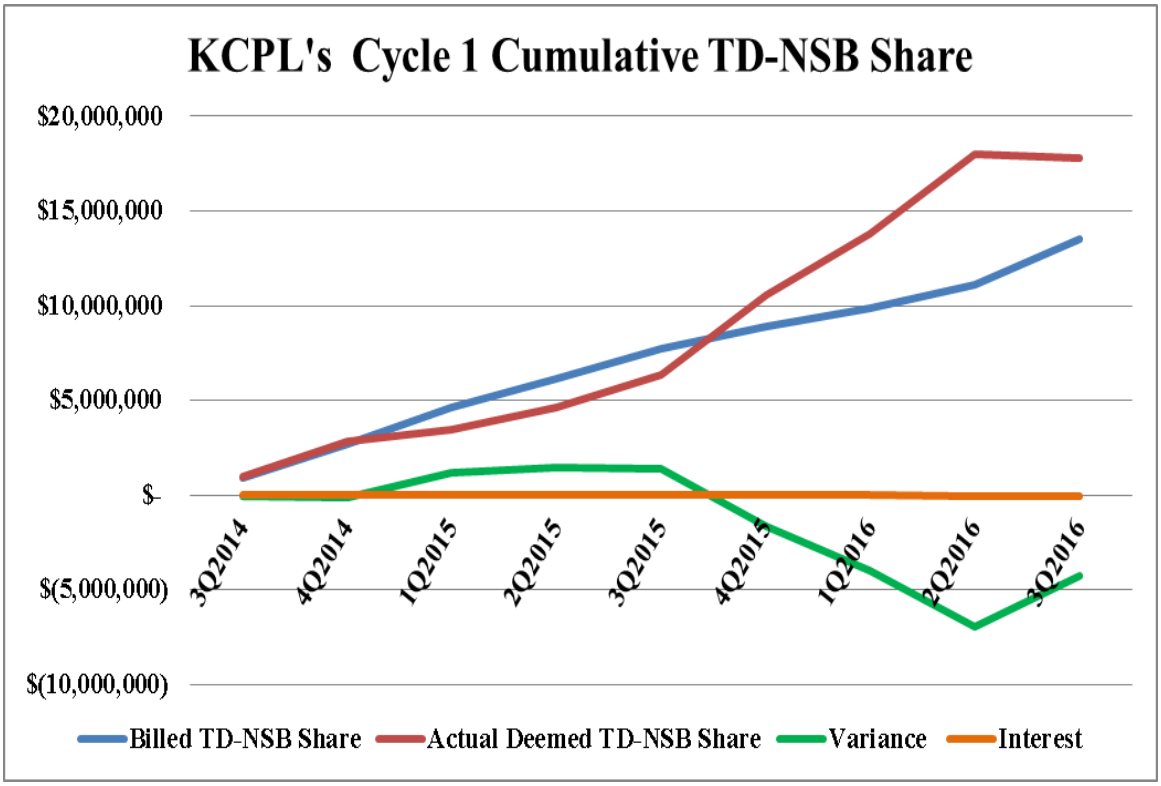
Q. Please compare KCPL's Cycle 1 TD-NSB Share mechanism to Ameren Missouri's Cycle 1 TD-NSB Share mechanism.

A. The Cycle 1 TD-NSB Share mechanisms are both based upon Ameren Missouri's throughput disincentive electronic spreadsheet model (described in Schedule JAR-s4) with assumed rate case frequency of 18 months and no annualization of energy efficiency savings during future rate cases. Ameren Missouri's 36-month Cycle 1 TD-NSB Share was expected to be $95.05 million and **26.34%** of the total planned annual net shared benefits of $360.78 million when using a discount rate of 6.961%.[7] See Schedule JAR-s7. KCPL's total 18-month Cycle 1 TD-NSB Share was expected to be $8,885,678 and **26.36%** of the total planned annual net shared benefits of $33,702,693 when using a discount rate of 6.95%.

Q. Will KCPL recover its entire Cycle 1 throughput disincentive through its Cycle 1 TD-NSB Share mechanism and through the inclusion of any remaining unrecovered Cycle 1 TD-NSB Share balances through KCPL's Cycle 2 DSIM Rider?

[7] Appendix A of *Unanimous Stipulation and Agreement Resolving Ameren Missouri's MEEIA Filing* filed in Case No. EO-2012-0142 on July 7, 2012.

A. Yes. The quarter-by-quarter cumulative history of KCPL's Cycle 1 TD-NSB Share is presented in the following chart developed by Staff from KCPL's work papers for KCPL's Surveillance Monitoring Report for the period ending September 30, 2016. See Schedule JAR-s6.




This chart illustrates that for Cycle 1's nine (9) quarters,[8] (including the first three (3) quarters of 2016 for the Cycle 1 C&I Custom Rebate program's transition between MEEIA cycles[9]) KCPL's Cycle 1 cumulative billed TD-NSB Share through September 30, 2016, is $13,551,514. That amount is $4,263,877 less than KCPL's Cycle 1 actual deemed cumulative TD-NSB Share through September 30, 2016, of $17,815,391. Through September 30, 2016, the cumulative monthly interest due to KCPL's under-recovery of cumulative monthly

[8] KCPL's MEEIA Cycle 1 began on July 6, 2014; measures were installed for the C&I Rebate program through June 30, 2016 and KCPL paid rebates through July 31, 2016 as a result of Paragraph 12 of the Cycle 2 Stipulation.
[9] Paragraph 12.a. of the Cycle 2 Stipulation.

TD-NSB Share is $47,818. KCPL will recover, with interest, KCPL's Cycle 1 September 30, 2016, TD-NSB Share variance of $4,263,877 and the interest variance of $47,818 through KCPL's Cycle 2 DSIM Rider as unrecovered balances from the MEEIA Cycle 1 Plan DSIM. See Schedule JAR-s3.

Q. Please comment on Mr. Rush's pro forma analysis of KCPL's Cycle 1 TD-NSB and his claim that "this analysis is to demonstrate that the TD-NSB in the MEEIA Cycle 1 is only for the past and not ongoing."[10]

A. Mr. Rush's pro forma analysis and his claim represent one final attempt by Mr. Rush to support KCPL's request to annualize its Cycle 1 energy efficiency savings for KCPL's test year sales in this rate case. The pro forma analysis and claim are in no way consistent with or supported by KCPL's Cycle 1 Stipulation, KCPL's Cycle 2 Stipulation, and KCPL's Cycle 2 DSIM Rider.

Q. Does KCPL's Cycle 1 Stipulation explicitly include a provision for the annualization of kWh sales in KCPL's general rate cases to account for the impact of Cycle 1 demand-side programs?

A. No.

Q. Why not?

A. As explained earlier in this testimony, KCPL's Cycle 1 TD-NSB Share was agreed to as a part of the Cycle 1 Stipulation and is designed to compensate KCPL for the entire amount of KCPL's through-put disincentive due to Cycle 1's deemed measures[11] without any annualization of kWh sales in its general rate cases.

[10] Rush rebuttal testimony at page 16 line 14 through page 17 line 2.
[11] For KCPL Cycle 1 TD-NSB Share, deemed values include the following for each installed Cycle 1 measure: annual energy savings, annual demand savings, annual avoided energy costs, annual avoided demand costs, and measure life.

Q. Likewise is Ameren Missouri requesting annualization of kWh sales in its current general rate case (Case No. ER-2016-0179) due to its Cycle 1 demand-side programs?

A. No. Ameren Missouri's Cycle 1 TD-NSB Share mechanism does not assume the energy efficiency savings have been annualized for the test years of future general rate cases.

**Summary and Recommendation**

Q. Please summarize your surrebuttal testimony.

A. Mr. Rush in his rebuttal testimony makes the following claims to support his assertion that KCPL's Cycle 1 energy efficiency savings should be annualized for KCPL's test year sales in this rate case:

1. The language used in the Cycle 2 Stipulation, "all active MEEIA programs", was purposefully broad to include MEEIA Cycle 1 and Cycle 2 programs. Nowhere in the Cycle 2 Stipulation did it exclude Cycle 1 or specify Cycle 2 as the only programs to be reflected in the annualization of energy efficiency savings;[12]

2. The Cycle 2 Stipulation addresses both Cycle 1 and Cycle 2 in numerous places throughout the Cycle 2 agreement;[13] and

3. KCPL's Cycle 1 TD-NSB Share is only for recovery of the past [throughput disincentive] and not ongoing [future throughput disincentive resulting from Cycle 1 energy efficiency savings].[14]

[12] Rush rebuttal testimony at page 15, lines 12 - 15.
[13] Ibid, page 15 lines 17 – 18.
[14] Ibid, page 16 lines 15 – 17.

My surrebuttal testimony explains for the Commission why KCPL's Cycle 1 Stipulation, KCPL's Cycle 2 Stipulation and/or KCPL's Cycle 2 DSIM Rider support none of Mr. Rush's claims in any way.

Q. What is Staff's recommendation concerning KCPL's request to annualize kWh in this rate case due to KCPL's Cycle 1 demand-side programs?

A. Staff recommends that the Commission deny KCPL's request because:

1. Only Cycle 2 demand-side programs can be used when annualizing kWh sales in accordance with KCPL's Cycle 2 Stipulation and Cycle 2 DSIM Rider;

2. Other than Cycle 1's unrecovered balances being recovered through the Cycle 2 DSIM Rider, Cycle 1 and Cycle 2 are mutually exclusive of each other; and

3. KCPL's Cycle 1 TD-NSB Share does not and should not allow annualization of kWh sales due to Cycle 1 demand-side programs.

Annualization of KCPL's Cycle 1 energy efficiency savings in this rate case is prohibited under KCPL's Cycle 1 Stipulation, KCPL's Cycle 2 Stipulation and KCPL's Cycle 2 DSIM Rider.

Q. Does this conclude your surrebuttal testimony?

A. Yes.

**BEFORE THE PUBLIC SERVICE COMMISSION**

**OF THE STATE OF MISSOURI**

| | | |
|---|---|---|
| In the Matter of Kansas City Power & Light Company's Request for Authority to Implement A General Rate Increase for Electric Service | ) ) ) ) | Case No. ER-2016-0285 |

**AFFIDAVIT OF JOHN A. ROGERS**

| | | |
|---|---|---|
| STATE OF MISSOURI | ) | |
| | ) | ss. |
| COUNTY OF COLE | ) | |

**COMES NOW JOHN A. ROGERS** and on his oath declares that he is of sound mind and lawful age; that he contributed to the foregoing Surrebuttal Testimony; and that the same is true and correct according to his best knowledge and belief.

Further the Affiant sayeth not.

John A Rogers

**JOHN A. ROGERS**

**JURAT**

Subscribed and sworn before me, a duly constituted and authorized Notary Public, in and for the County of Cole, State of Missouri, at my office in Jefferson City, on this 26th day of January, 2017.

D. SUZIE MANKIN
Notary Public - Notary Seal
State of Missouri
Commissioned for Cole County
My Commission Expires: December 12, 2020
Commission Number: 12412070

D Suzie Mankin

Notary Public

**Educational Background and Work Experience of John A. Rogers**

I have a Master of Business Administration degree from the University of San Diego and a Bachelor of Science degree in Engineering Science from the University of Notre Dame. My work experience includes 34 years in energy utility engineering, system operations, strategic planning, regulatory affairs, general management and management consulting. From 1974 to 1985, I was employed by San Diego Gas & Electric with responsibilities in gas engineering, gas system planning and gas operations. From 1985 to 2000, I was employed by Citizens Utilities primarily in leadership roles for gas operations in Arizona, Colorado and Louisiana. From 2000 to 2003, I was an executive consultant for Convergent Group (a division of Schlumberger) providing management consulting services to energy utilities. From 2004 to 2008, I was employed by Arkansas Western Gas and was responsible for strategic planning and resource planning. I have provided expert testimony before the California Public Utilities Commission, Arizona Corporation Commission, Arkansas Public Service Commission and Missouri Public Service Commission in general rate cases, applications for special projects, gas resource plan filings, electric resource plan filings, demand-side management programs and demand-side programs investment mechanism cases. I have been employed by the Missouri Public Service Commission since December 2008 and am responsible for the Commission Staff's review of and recommendations concerning electric utility resource planning, demand-side management programs, demand-side programs investment mechanisms, and fuel adjustment clauses.

# John A. Rogers
# Testimony, Reports and Rulemakings

## BEFORE THE MISSOURI PUBLIC SERVICE COMMISSION

| File Number | Company | Issues |
|---|---|---|
| ER-2010-0036 | Ameren Missouri | Fuel Adjustment Clause<br>Demand-Side Programs (DSM)<br>DSM Cost Recovery |
| EX-2010-0368<br>EW-2010-0254 | Missouri Public Service Commission | Missouri Energy Efficiency Investment Act Rulemaking |
| EX-2010-0254<br>EW-2009-0412 | Missouri Public Service Commission | Electric Utility Resource Planning Rulemaking |
| EO-2009-0237 | KCP&L Greater Missouri Operations Company | Electric Utility Resource Planning Compliance Filing |
| ER-2009-0090 | KCP&L Greater Missouri Operations Company | Fuel Adjustment Clause |
| ER-2010-0355 | Kansas City Power and Light | DSM Cost Recovery<br>Fuel Switching |
| ER-2010-0356 | KCP&L Greater Missouri Operations Company | Fuel Adjustment Clause<br>DSM Cost Recovery<br>Fuel Switching |
| AO-2011-0035 | All Electric Utilities | DSM Status Report |
| EO-2011-0066 | Empire District Electric Company | Electric Utility Resource Planning Compliance Filing |
| ER-2011-0028 | Ameren Missouri | DSM Cost Recovery |
| EO-2011-0271 | Ameren Missouri | Electric Utility Resource Planning Compliance Filing |
| EO-2012-0009 | KCP&L Greater Missouri Operations Company | Demand-side Programs Investment Mechanism |
| EO-2012-0142 | Ameren Missouri | Demand-side Programs Investment Mechanism |

# John A. Rogers
# Testimony, Reports and Rulemakings

**BEFORE THE MISSOURI PUBLIC SERVICE COMMISSION (cont.)**

| File Number | Company | Issues |
|---|---|---|
| ER-2012-0166 | Ameren Missouri | DSM Cost Recovery<br>Demand-side Programs<br>Investment Mechanism |
| ER-2012-0174 | Kansas City Power & Light | DSM Cost Recovery |
| ER-2012-0175 | KCP&L Greater Missouri Operations Company | DSM Cost Recovery<br>Demand-side Programs<br>Investment Mechanism |
| ER-2012-0345 | Empire District Electric Co. | DSM Cost Recovery |
| EO-2012-0323 | Kansas City Power & Light | Electric Utility Resource Planning Compliance Filing |
| EO-2012-0324 | KCP&L Greater Missouri Operations Company | Electric Utility Resource Planning Compliance Filing |
| EO-2013-0537 | Kansas City Power & Light | Electric Utility Resource Planning Annual Update |
| EO-2013-0538 | KCP&L Greater Missouri Operations Company | Electric Utility Resource Planning Annual Update |
| EO-2013-0547 | Empire District Electric Co. | Electric Utility Resource Planning Compliance Filing |
| EX-2014-0205 | Dogwood Energy, LLC | Rulemaking Petition |
| EO-2014-0095 | Kansas City Power & Light | Demand-side Programs<br>Investment Mechanism |
| EO-2015-0084 | Ameren Missouri | Electric Utility Resource Planning Compliance Filing |
| EO-2015-0254 | Kansas City Power & Light | Electric Utility Resource Planning Compliance Filing |
| EO-2015-0252 | KCP&L Greater Missouri Operations Company | Electric Utility Resource Planning Compliance Filing |

# John A. Rogers
# Testimony, Reports and Rulemakings

| | | |
|---|---|---|
| EO-2015-0055 | Ameren Missouri | Demand-side Programs Investment Mechanism |
| EO-2015-0240 | Kansas City Power & Light | Demand-side Programs Investment Mechanism |
| EO-2015-0241 | KCP&L Greater Missouri Operations Company | Demand-side Programs Investment Mechanism |
| EO-2016-0223 | Empire District Electric Co. | Electric Utility Resource Planning Compliance Filing |
| ER-2016-0156 | KCP&L Greater Missouri Operations Company | Annualized Sales for Energy Efficiency |

**BEFORE THE ARKANSAS PUBLIC SERVICE COMMISSION**

| **Docket Number** | **Company** | **Issues** |
|---|---|---|
| 07-079-TF | Arkansas Western Gas | Arkansas Weatherization Program |
| 07-078-TF | Arkansas Western Gas | Initial Energy Efficiency Programs |
| 07-041-P | Arkansas Western Gas | Special Contract |
| 06-028-R | Arkansas Western Gas | Resource Planning Guidelines for Electric Utilities |
| 05-111-P | Arkansas Western Gas | Gas Conservation Home Weatherization Program |

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# RULES AND REGULATIONS
# ELECTRIC

## DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)
## Schedule DSIM

### APPLICABILITY:

This rider is applicable to all non-lighting kilowatt-hours (kWh) of energy supplied to customers under the Company's retail rate schedules, excluding kWh of energy supplied to "opt-out" customers.

Charges passed through this DSIM Rider reflect the charges approved to be collected from the implementation of the Missouri Energy Efficiency Investment Act (MEEIA) Cycle 2 Plan & any remaining unrecovered balances from the MEEIA Cycle 1 Plan DSIM. Those charges include:

1) Program Costs, Throughput Disincentive (TD), and Earnings Opportunity Award (if any) for the MEEIA Cycle 2 Plan, as well as Program Costs and TD-NSB Share for commission approved C&I program projects completed by June 30 2016 that will be counted under the MEEIA Cycle 1 Plan, as outlined in S&A found in EO-2015-0240; and any earned Performance Incentive earned (and ordered) attributable to MEEIA Cycle 1 as set out in File No EO-2014-0095.

2) Reconciliations, with interest, to true-up for differences between the revenues billed under this DSIM Rider and total actual monthly amounts for:

i) Program Costs incurred in Cycle 2 and/or remaining true-ups or unrecovered amounts for MEEIA Cycle 1,

ii) TD Share incurred in Cycle 2 and/or remaining true-ups or unrecovered amounts for MEEIA Cycle 1,and

iii) Amortization of any Performance Incentive (PI) Award or Earnings Opportunity ordered by the Missouri Public Service Commission (Commission)

2) 3) Any Ordered Adjustments. Charges under this DSIM Rider shall continue after the anticipated 36 month plan period of MEEIA Cycle 2 until such time as the charges described in items 1) and 2) above have been billed.

Charges arising from the MEEIA Cycle 2 Plan that are the subject of this DSIM Rider shall be reflected in one "DSIM Charge" on customers' bills in combination with any charges arising from a rider that is applicable to post-MEEIA Cycle 2 Plan demand-side management programs approved under the MEEIA. This will include any unrecovered amounts for Program Costs, TD-NSB Share from MEEIA Cycle 1, and/or Performance Incentive, etc. earned/remaining from MEEIA Cycle 1 that is expected to begin recovery in January 2017. The Cycle 1 Performance Incentive Award methodology, including Cycle 1 Targets are set out in Sheet Nos. 49 through 49E and can be found in the May 27, 2015 Non-Unanimous Stipulation & Agreement found in EO-2014-0095.

### DEFINITIONS:

As used in this DSIM Rider, the following definitions shall apply:

"Company's TD is meant to represent the utility's lost margins associated with the successful implementation of the MEEIA programs. The detailed methodology for calculating the TD is described beginning in Tariff Sheet No. 49K.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**DEFINITIONS: (Cont'd.)**

"Effective Period" (EP) means the six (6) months beginning with January of 2016, and each six month period there-after.

"Evaluation Measurement & Verification (EM&V) means the performance of studies and activities intended to evaluate the process of the utility's program delivery and oversight and to estimate and/or verify the estimated actual energy and demand savings, utility lost revenue, cost effectiveness, and other effects from demand-side programs.

"Incentive" means any consideration provided by the Company, including, but not limited to buy downs, markdowns, rebates, bill credits, payments to third parties, direct installation, giveaways, and education, which encourages the adoption of program measures.

"MEEIA Cycle 1 Plan" consists of the 12 demand-side programs and the DSIM (including Program Costs, TD-NSB Share, Performance Incentive, etc.) described in the approved MEEIA Cycle 1 filing in Docket No. EO-2014-0095 & corresponding tariffs.

"MEEIA Cycle 2 Plan" consists of the 16 demand-side programs and the DSIM described in the MEEIA Cycle 2 Filing, following Commission approval and order granted under Docket No EO-2015-0240.

"Program Costs" means any prudently incurred program expenditures, including such items as program planning, program design; administration; delivery; end-use measures and incentive payments; advertising expense; evaluation, measurement, and verification; market potential studies; and work on a statewide technical resource manual.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

"Cycle 2 Earnings Opportunity" (EO) means the incentive ordered by the Commission based on actual performance verified through EM&V against planned targets. The Company's EO will be $7.4M if 100% of the planned targets are achieved. EO is capped at $15.5M, which reflects adjustment for TD verified by EM&V. Potential Earnings Opportunity adjustments are described on Sheet No. 49M. The Earnings Opportunity Matrix outlining the payout rates, weightings, and caps can be found in 49P.

Short-Term Borrowing Rate" means (i) the daily one-month USD LIBOR rate, using the last previous actual rate for weekends and holidays or dates without an available LIBOR rate, plus (ii) the Applicable Margin for Eurodollar Advances as defined in the Pricing Schedule of the current KCP&L Revolving Credit Agreement. A simple mathematical average of all the daily rates for the month is then computed.

"AFUDC Rate" means the Allowance for Funds Used During Construction rate computed in accordance with the formula prescribed in the Code of Federal Regulations Title 18 Part 101.

Recovery Period (RP) includes the day the DSIM Rider Tariff becomes effective through July 31, 2016 and each six month period thereafter.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**DETERMINATION OF DSIM RATES:**

The DSIM during each applicable EP is a dollar per kWh rate for each rate schedule calculated as follows:

$$DSIM = [NPC + NTD + NEO + NOA]/PE$$

Where:

NPC = Net Program Costs for the applicable EP as defined below,

$$NPC = PPC + PCR$$

PPC = Projected Program Costs is an amount equal to Program Costs projected by the Company to be incurred during the applicable EP, including any unrecovered Cycle 1 Program Cost that will utilize an amortization period as outlined in Stipulation & Agreement filed in Docket EO-2015-0240 .

PCR = Program Costs Reconciliation is equal to the cumulative difference between the PPC revenues billed resulting from the application of the DSIM through the end of the previous EP and the actual Program Costs incurred through the end of the previous EP (which will reflect projections through the end of the previous EP due to timing of adjustments). Such amounts shall include monthly interest on cumulative over- or under-balances at the Company's monthly Short-Term Borrowing Rate.

NTD = Net Throughput Disincentive for the applicable EP as defined below,

$$NTD = PTD + TDR$$

PTD = Projected Throughput Disincentive is the Company's TD projected by the Company to be incurred during the applicable EP, including any unrecovered TD-NSB that will utilize an amortization period as outlined in Stipulation & Agreement filed in Docket EO-2015-0240. For the detailed methodology for calculating the TD, see Sheet 49K.

TDR = Throughput Disincentive Reconciliation is equal to the cumulative difference, if any, between the PTD revenues billed during the previous EP resulting from the application of the DSIM and the Company's TD through the end of the previous EP calculated pursuant to the MEEIA Cycle 1 or 2 Application, as applicable (which will reflect projections through the end of the previous EP due to timing of adjustments). Such amounts shall include monthly interest on cumulative over- or under-balances at the Company's monthly Short-Term Borrowing Rate.

NEO = Net Earnings Opportunity for the applicable EP as defined below,

$$NEO = EO + EOR$$

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**DETERMINATION OF DSIM RATES: (Cont'd.)**

EO = Earnings Opportunity is equal to the Earnings Opportunity Award monthly amortization multiplied by the number of billing months in the applicable EP. This will also include any Performance Incentive as set out in Cycle 1 and addressed on Sheet No. 49C.

The monthly amortization shall be determined by dividing the Earnings Opportunity Award by the number of billing months from the billing month of the first DSIM after the determination of the Earnings Opportunity Award and 24 calendar months following that first billing month.

EOR =Earnings Opportunity Reconciliation is equal to the cumulative difference, if any, between the EO revenues billed during the previous EP resulting from the application of the DSIM and the monthly amortization of the Earnings Opportunity Award through the end of the previous EP (which will reflect projections through the end of the previous EP due to timing of adjustments). Such amounts shall include monthly interest on cumulative over- or under-balances at the Company's monthly Short-Term Borrowing Rate.

NOA = Net Ordered Adjustment for the applicable EP as defined below,

$$NOA = OA + OAR$$

OA = Ordered Adjustment is the amount of any adjustment to the DSIM ordered by the Commission as a result of prudence reviews and/or corrections under this DSIM Rider. Such amounts shall include monthly interest at the Company's monthly Short-Term Borrowing Rate.

OAR = Ordered Adjustment Reconciliation is equal to the cumulative difference, if any, between the OA revenues billed during the previous EP resulting from the application of the DSIM and the actual OA ordered by the Commission through the end of the previous EP (which will reflect projections through the end of the previous EP due to timing of adjustments). Such amounts shall include monthly interest on cumulative over- or under-balances at the Company's monthly Short-Term Borrowing Rate.

PE = Projected Energy, in kWh, forecasted to be delivered to the customers to which the DSIM Rider applies during the applicable RP.

The DSIM components and total DSIM applicable to the individual rate schedules shall be rounded to the nearest $0.00001.

Allocation of costs for each rate schedule for the MEEIA Cycle 1 and MEEIA Cycle 2 Plans will be made in accordance with the Stipulations in Dockets EO-2014-0095 and EO-2015-0240.

This DSIM Rider shall not be applicable to customers that have satisfied the opt-out provisions contained in Section 393.1075.7, RSMo.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**CALCULATION OF TD:**

Monthly Throughput Disincentive = the sum of the Throughput Disincentive Calculation for all programs applicable to (1) Residential and (2) Non-Residential customers.

For purposes of this tariff, the term "Residential Class" and "Non-Residential Class" shall refer to the rates as outlined in Table of Contents, Sheet No TOC-2. Residential Class includes Residential Service and Residential Other Use and Residential Time of Use (Frozen). Non-Residential Class includes all rates as identified under the category Commercial & Industrial, which includes Small General Service, Medium General Service, Large General Service and Large Power Service, Real Time Pricing and Two Part- Time of Use.

Throughput Disincentive Calculation
The Throughput Disincentive Calculation for each program shall be determined by the formula:

$$TD\$ = MS \times NMR \times NTGF$$

Where:

TD$ = Throughput Disincentive Dollars to be collected for a given calendar month, for a given class.

RB = Rebasing Adjustment. The Rebasing Adjustment shall equal the CAS applicable as of the date used for the MEEIA normalization in any general rate case resulting in new rates becoming effective during the accrual and collection of TD$ pursuant to this MEEIA Cycle 2. In the event more than one general rate case resulting in new rates becoming effective during the accrual and collection of TD$ pursuant to this MEEIA Cycle 2, the Rebasing Adjustment shall include each and every prior Rebasing Adjustment calculation..

LS = Load Shape. The Load Shape is the monthly load shape percent for each program, (attached as Appendix G to the Stipulation found in EO-2015-0240).

NMR = Net Margin Revenue. Net Margin revenue values for each class are provided on Tariff Sheet 49P.

NTGF = Net to Gross Factor. The Net to Gross Factor is 0.85.

MS = The sum of all Programs' Monthly Savings in kWh, for a given month, for a given class. The Monthly Savings in kWh for each Program shall be determined by the formula:

$$MS = (MAS_{CM} + CAS_{PM} - RB) \times LS + HER$$

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**CALCULATION OF TD (Cont.):**

Where:

MC = Measure Count. Measure Count, for a given month, for a given class, for each measure is the number of each measure installed in the current calendar month.

ME = Measure Energy. Measure Energy will be determined is given as follows, for each Measure:

a. Prior to finalization of EM&V for Cycle 2, Year 1 programs, for Measures not listed under those programs listed in (c) below, the ME is the annual total of normalized savings for each measure at customer meter per measure defined in the TRM (attached as Appendix F to the Stipulation filed in EO-2015-0240).

b. After finalization of EM&V for Cycle 2, Year 1 programs, for Measures not under the programs as listed in (c) below, the ME is the annual total of normalized savings for each measure at customer meter per measure defined in the updated TRM (which will be updated based on EM&V ex-post gross adjustments determined for Year 1 no later than 24 months after the commencement of Cycle 2).

c. For Measures Business Energy Efficiency Rebate – Custom, Strategic Energy Management, Block Bidding , Whole House Efficiency, Income-Eligible Multi-Family and Income Eligible Weatherization (2016 only), the ME will be the annual value attributable to the installations reported monthly by the program implementer.

MAS = The sum of MC multiplied by ME for all measures in a program in the current calendar month.

CAS = Cumulative sum of MAS for each program for MEEIA Cycle 2

CM = Current calendar month

PM = Prior calendar month

HER = Monthly kWh savings for the Home Energy Reports and Income-Eligible Home Energy Reports programs measured and reported monthly by the program implementer.

Measure – Energy efficiency measures described for each program attached as Appendix A.

Programs – MEEIA Cycle 2 programs listed in Tariff Sheet No. 1.04C and added in accordance with the Commission's rule 4 CSR 240-20.094(4).

TRM – Company Technical Resource Manual (attached as Appendix F) and updated based on EM&V ex-post gross adjustments determined for Year 1 no later than 24 months after the commencement of Cycle 2.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

Earnings Opportunity Determination
The EO shall be calculated using the matrix in tariff Sheet No. 49P. The EO will not go below $0. The EO target at 100% is $7.4 million. Before adjustments reflecting TD EM&V including NTG, the EO cannot go above $10.5 million. The EO including adjustments reflecting TD EM&V including NTG cannot go above $15.5 million. The cap is based on current program levels. If Commission-approved new programs are added in the years 2017 and 2018, the Company may seek Commission approval to have the targets for the cap of the EO scale proportionately to the increase in savings targets.

The Earnings Opportunity shall be adjusted for the difference, with carrying costs at the KCP&L monthly Allowance for Funds Used During Construction (AFUDC) rate compounded semi-annually, between the TD$ billed and what the TD$ billed would have been if:

(1) The ME used in the calculation were the normalized savings for each measure at customer meter per measure determined through EM&V ex-post gross analysis for each program year, and,

(2) The NTGF used in the calculation was the net-to-gross values determined through EM&V, except that if the NTG value determined through EM&V is less than 0.80, the recalculation shall use 0.80 and if the NTG value determined through EM&V is greater than 1.0, the recalculation shall use 1.0.

Other DSIM Provisions
The Company shall file an update to the NMR rates by Class by month contemporaneous with filing any compliance tariff sheets in any general rate case reflecting the rates set in that case, and the billing determinants used in setting rates in that case.

Annual kWh savings per measure will be updated prospectively in KCP&L/GMO's TRM no later than 24 months after the commencement of the Plan based on EM&V ex-post gross adjustments determined for Year 1.

KCP&L/GMO shall each file a general rate case at some point before the end of year 5 of the Cycle 2 period to address the TD through the rebasing of revenues used to establish base rates, and if KCP&L/GMO fails to do so, the accrual and collection of the TD terminates beginning in year 6 of the Cycle 2 period. The Signatories agree that the filing of a rate case by each company utilizing an update or true-up period that ends between 30 months and 60 months after the effective date of the tariffs implementing MEEIA Cycle 2 satisfies this requirement.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (CYCLE 2)**
**Schedule DSIM (Continued)**

**FILING:**

After the initial DSIM Rider rate adjustment filing, the Company shall make a DSIM Rider rate adjustment filing to take effect each August and February under the Term of this MEEIA Rider. DSIM Rider rate adjustment filings shall be made at least sixty (60) days prior to their effective dates.

**PRUDENCE REVIEWS:**

A prudence review shall be conducted no less frequently than at twenty-four (24) month intervals in accordance with 4 CSR 240-20.093(10). Any costs, which are determined by the Commission to have been imprudently incurred or incurred in violation of the terms of this DSIM Rider, shall be returned to customers through an adjustment in the next DSIM Rider rate adjustment filing and reflected in factor OA above.

**Discontinuing the DSIM:**

The Company reserves the right to discontinue the entire MEEIA Cycle 2 portfolio, if the Company determines that implementation of such programs is no longer reasonable due to changed factors or circumstances that have materially and negatively impacted the economic viability of such programs as determined by the Company, upon no less than thirty days' notice to the Commission. As a result of these changes, the Company may file to discontinue this DSIM. Similar to Program discontinuance, the Company would file a notice indicating that it is discontinuing the DSIM Rider. This notice would include a methodology for recovery any unrecovered Program Costs and TD.

**DEMAND SIDE INVESTMENT MECHANISM RIDER (Cycle 2)**
**Schedule DSIM (Continued)**

**DEMAND SIDE INVESTMENT MECHANISM CHARGE:**

Effective upon Commission approval in Case No. EO-2015-0240 of MEEIA Cycle 2 Filing.

DSIM Components and Total DSIM

| Rate Schedule | NPC/PE ($/kWh) | NTD/PE ($/kWh) | NPEO/PE ($/kWh) | NOA/PE ($/kWh) | Total DSIM ($/kWh) |
|---|---|---|---|---|---|
| Residential Service | $0.00242 | $0.00090 | $0.00000 | $0.00000 | $0.00332 |
| Non- Residential Service | $0.00776 | $0.00234 | $0.00000 | $0.00000 | $0.01010 |

**OPT-OUT PROVISIONS (Non-Residential Customers):**

Pursuant to Missouri Rule 4 CSR 240-20.094(6)(A): Any customer meeting one (1) or more of the following criteria shall be eligible to opt-out of participation in utility-offered demand side programs:

1. The customer has one (1) or more accounts within the service territory of the electric utility that has a demand of the individual accounts of five thousand (5,000) kW or more in the previous twelve (12) months;
2. The customer operates an interstate pipeline pumping station, regardless of size; or
3. The customer has accounts within the service territory of the electric utility that have, in aggregate across its accounts, a coincident demand of two thousand five hundred (2,500) kW or more in the previous twelve (12) months, and the customer has a comprehensive demand side or energy efficiency program and can demonstrate an achievement of savings at least equal to those expected from utility-provided programs.
    A. For utilities with automated meter reading and or advanced metering infrastructure capability, the measure of demand is the customer coincident highest billing demand of the individual accounts during the twelve (12) months preceding the opt-out notification.

A customer electing to opt-out under requirements 1 and 2 above must provide written notice to the electric utility no earlier than September 1 and not later than October 30 to be effective for the following calendar year. Customers electing to opt-out under requirement 3 above must provide notice to the utility and the manager of the energy resource analysis section of the commission during the stated timeframe. Customers electing to opt-out shall still be allowed to participate in interruptible or curtailable rate schedules or tariffs offered by the electric utility.

Customers who have satisfied the opt-out provisions of 4 CSR 240-20.094(6) to opt-out of both the DSIM Charge and the Non-MEEIA rate will not be charged the DSIM Charge and receive an offset of the Non- MEEIA rate amount on the same bill, based on their actual usage. The current Non-MEEIA rate is found in Section 8.09 of the Rules and Regulations, Sheet 1.28.

# KANSAS CITY POWER & LIGHT COMPANY

P.S.C. MO. No. 7 ☒ Original Sheet No. 49P
☐ Revised

Cancelling P.S.C. MO. No. ____ ☐ Original Sheet No. ____
☐ Revised

For Missouri Retail Service Area

## DEMAND SIDE INVESTMENT MECHANISM RIDER (Cycle 2)
## Schedule DSIM (Continued)

**Net Margin Revenue Rates by Rate Class by Month & Earnings Opportunity Matrix:**

| RATE CLASS | January | February | March | April | May | June | July | August | September | October | November | December |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| RES | $0.07062 | $0.07308 | $0.07667 | $0.08083 | $0.08276 | $0.12058 | $0.12058 | $0.12058 | $0.12058 | $0.07631 | $0.08232 | $0.07140 |
| MGS | $0.04518 | $0.04541 | $0.04680 | $0.04931 | $0.05156 | $0.08167 | $0.07832 | $0.07870 | $0.07770 | $0.04933 | $0.04962 | $0.04576 |
| SGS | $0.07582 | $0.07688 | $0.07911 | $0.04931 | $0.08660 | $0.11700 | $0.11087 | $0.11100 | $0.10926 | $0.08410 | $0.08391 | $0.07720 |
| LGS | $0.03305 | $0.03223 | $0.03377 | $0.03588 | $0.03749 | $0.05662 | $0.05497 | $0.05463 | $0.05364 | $0.03574 | $0.03529 | $0.03259 |
| LPS | $0.01924 | $0.01843 | $0.01843 | $0.01831 | $0.01831 | $0.01938 | $0.02053 | $0.01938 | $0.01938 | $0.01831 | $0.02024 | $0.01916 |

| | KCPL-Missouri | | | | | | |
|---|---|---|---|---|---|---|---|
| Proposed Metric | Payout rate | Payout unit | % of Target EO | KCPL 100% payout | KCPL Cap | Cap/100% Multiplier | Target @ 100% |
| Opower: criteria will be effective, prudent spend of budget | *N/A* | | 5.05% | **$375,000** | $375,000 | | |
| EE & Tstat MWh (Excl. Opower, DRI, & IEMF): criteria will be the cumulative of the 1st yr incremental MWh during the 3 year plan | $8.31 | $/MWh | 19.24% | **$1,429,121** | $1,857,857 | 130% | 171,976.043 |
| EE Coincident MW (Excl. Opower,DRI, Tstat, & IEMF): criteria will be cumulative of the 1st year MW reduction during the 3 year plan, coincident with system peak | $114,741.01 | $/MW | 52.83% | **$3,925,175** | $5,887,763 | 150% | 34.209 |
| Thermostat MW impact: criteria will be cumulative of the MW reduction during 3 year plan, coincident with system peak | $91,941.81 | $/MW | 15.14% | **$1,125,000** | $1,687,500 | 150% | 12.236 |
| DR Incentive (DRI) MW of Ramping (growth from year 1 planned to year 3 actual) (year 1 is 10 MW - KCP&L-MO and 20 MW in GMO) | $75,000.00 | $/MW | 5.05% | **$375,000** | $487,500 | 130% | 5.000 |
| Income Eligible Multi-Family (IEMF): criteria will be effective, prudent spend of budget | *N/A* | | 2.69% | **$200,000** | $200,000 | | |
| | | | 100% | **$7,429,296** | **$10,495,620** | | |
| Total Cap Including TD Adjustments | | | | | **$15,500,000** | | |

Note:
1. Targets based on cumulative savings at the meter
2. The payout rate will be multiplied by the payout unit up to the maximum
3. MWh & MW targets are rounded to the nearest kWh & kW
4. Payout rate rounded to the nearest $0.01

April 1, 2016

DATE OF ISSUE: March 16, 2016 DATE EFFECTIVE: ~~April 15, 2016~~
ISSUED BY: Darrin R. Ives, Vice President 1200 Main, Kansas City, MO 64105

distinguish between the legitimate benefits of energy efficiency that reduce the revenue requirement and the regulatory lag "savings" associated with the ratemaking process. Those regulatory lag "savings" represent a windfall to customers since energy efficiency does not reduce fixed costs between rate cases. Those extra "savings" are a major economic barrier to the implementation of energy efficiency which, unless removed, will ultimately prevent the customers from realizing the benefits associated with energy efficiency. Notice that even after providing fixed cost recovery to the utility, customers still benefit compared to the No DSM case. In fact, the TRC analysis of energy efficiency programs demonstrates that energy efficiency programs provide benefits of more than twice the costs when correctly excluding the extra regulatory lag "savings". Therefore, the mitigation of the throughput disincentive in no way diminishes the benefits of energy efficiency since those benefits are solely based on the legitimate reduction in ongoing revenue requirements. The unintentional effect that regulatory lag has on fixed cost recovery is not a legitimate benefit of energy efficiency but is a very real barrier to implementation of energy efficiency.

Finally, to illustrate the point further it is constructive to imagine a case where all fixed costs are collected in the customer charge. This is typically referred to as Straight-Fixed Variable rate design and is more common for natural gas utilities. In the context of Figure 2.1, the fixed system costs (blue bars) would be zero and the customer charge (green bars) would increase sustainably to include all fixed system costs. As a hypothetical situation, it is apparent that when fixed costs are not being collected in kWh related charges the economic disincentive to reducing sales through energy efficiency is eliminated. So whatever the form of the mitigating mechanism, the outcome is the same; that is, customers retain the true benefits of energy efficiency and the utility recovers its fixed system costs.

## 2.2 Throughput Disincentive

The throughput disincentive is a result of the traditional regulated utility business model in which the utility's revenues are linked to its sales or "throughput," creating a financial disincentive for the utility to engage in any activity that could reduce sales, such as promoting energy efficiency programs.

Traditional ratemaking is intended to allow utilities to recover both their fixed and variable costs and earn a fair return on their investments. Variable costs are those that vary with the production of energy, such as the cost of fuel and purchased power, while fixed costs are associated with activities that do not vary with energy production, like the cost of a plant, plant addition, environmental upgrades and new substations or extending distribution or transmission lines. The Fuel Adjustment Clause ("FAC") governs the over- or under-collection of the Company's variable costs, while the fixed costs are largely collected using a variable rate, expressed as ¢/kWh or a combination

of ¢/kWh and $/kW, applied to weather normalized and "static" test year sales. The rates developed based on this snapshot of the relationship between the revenue requirement and sales will remain unchanged until the utility's next rate case.

Ignoring the customer charge, for the sake of illustration, it is important to understand that outside of a rate case, in a future period, the utility's actual revenue will be determined by the variable rate (developed based on the snapshot of test year sales), multiplied by the actual amount of electricity sales. Under traditional ratemaking, if retail electricity sales increase beyond the level used to develop the utility's rates, the utility keeps the additional revenue. This creates an incentive for the utility to maximize the "throughput," or sales. Typically, the additional revenues are not simply a bonus to the utility but rather an offset to the rising costs of service, like wages and general material costs, between rate cases. Thus, a traditional ratemaking framework does not align the utility's financial incentives with helping customers use energy more efficiently, because cost recovery and fair returns on investment are achieved by selling volumes of electricity.

The implementation of energy efficiency programs causes a decrease in electricity sales, which causes the utility to lose revenue that it would have otherwise collected. But even more importantly, it prevents the utility from recovering a portion of its fixed costs. Any increase in regulatory lag and/or time between rate cases amplifies the disincentive for a utility to support a reduction in sales volume It is also important to recognize that utility sponsored programs are only one source of fixed cost recovery erosion. To fully align utility incentives such that the utility can partner with third party energy efficiency or conservation efforts, the throughput disincentive must be adequately addressed.

Energy efficiency is unique as a source of sales variation because it is only associated with downward pressure on electricity sales. Other causes of sales variation, like weather and the economy, can cause both increases and decreases to sales volumes. Another unique aspect of energy efficiency is that although it can happen naturally, there are ways to induce it. In this case we are discussing the impacts of utility-run programs, but other sources that can induce energy efficiency include programs run by government agencies, building efficiency codes, and appliance efficiency standards. This is in contrast to other sources of variation, like the weather and the economy, which are clearly outside the control of the utility and any other single party.

Having defined the throughput disincentive above, there are three main factors that drive the magnitude of the throughput disincentive. First is rate design. Designing rates to recover fixed costs through volumetric charges is the origin of the throughput disincentive. As the percentage of revenues collected through volumetric charges decreases, so does the throughput disincentive. The duration of time between rate

cases is another driver of the throughput disincentive, since the negative financial impact of reduced kWh sales due to energy efficiency savings compounds quickly between rate cases. The third main factor that drives the throughput disincentive is the expansion rate of energy efficiency programs. As energy efficiency programs and their resultant energy savings grow rapidly, the effects between rate cases compound rapidly, creating greater financial disincentive.

As mentioned previously, rate design is a main component to the throughput disincentive. Ameren Missouri's current rate design collects a vast majority of its fixed costs through volumetric rates. For example, 90% of residential fixed costs are collected in volumetric rates. The percentages for the other rate classes are similar. This heightens the sensitivity of utility earnings to sales volumes and amplifies the challenge of sustainable energy efficiency program implementation.

Figure 2.2 illustrates how the throughput disincentive is manifested through the ratemaking process. The analysis assumes rate cases are filed every 18 months, although the actual rate case timing will be determined as necessary. The solid lines represent rate effective dates and the dotted lines represent the test year end dates with each rate case represented by a different color. The shaded area represents the magnitude of throughput disincentive. The chart also includes the quantification of the throughput disincentive, which is experienced between rate cases. If Ameren Missouri were to implement the proposed Realistic Achievable Potential portfolio of programs over 2013-2015, absent a mechanism to address the throughput disincentive, it would collect approximately $105 million less fixed cost revenue from 2013 through 2018 than without its energy efficiency programs. The choppiness of the throughput disincentive is a reflection of seasonal rates and energy savings. This clearly is a severe impediment to the opportunity for the Company to earn its allowed return on equity. Again, the additional revenues are not a bonus to the utility but rather an offset to the rising costs of service, like costs associated with the Company's continued substantial capital investments in its system, and wages and general material costs, between rate cases. Furthermore, the plain and simple economic signal associated with the current rate design and regulatory mechanisms is to minimize spending on energy efficiency[9].

[9] Case No. ER-2011-0028, *Report and Order*, p. 37

**Figure 2.2 Depiction of Throughput Disincentive**

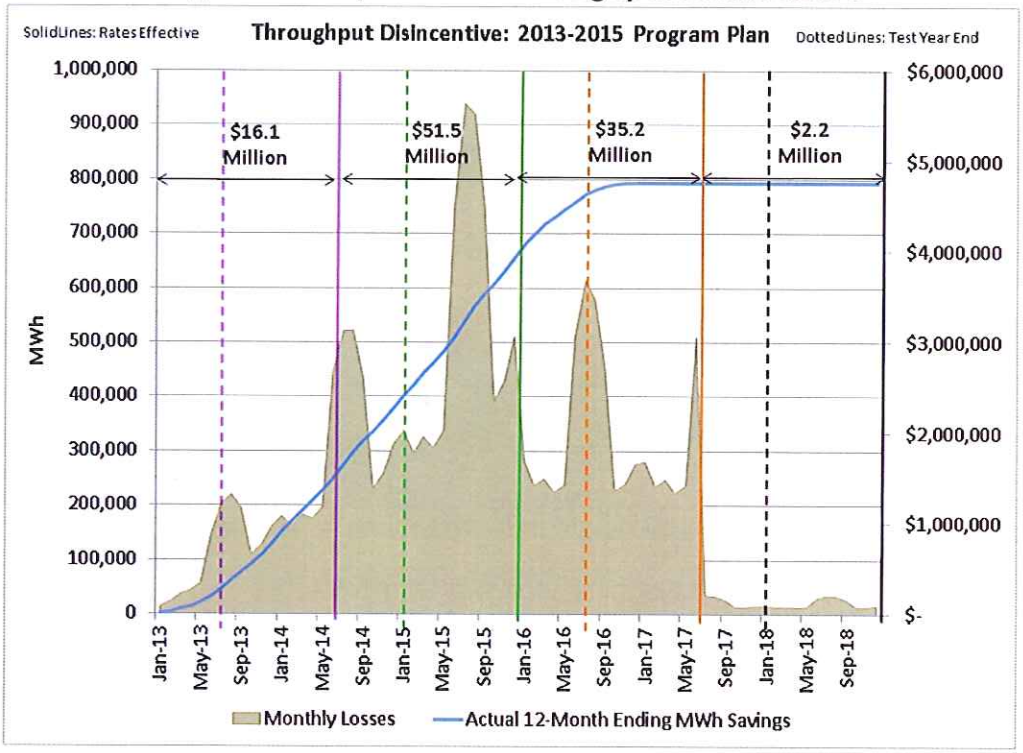
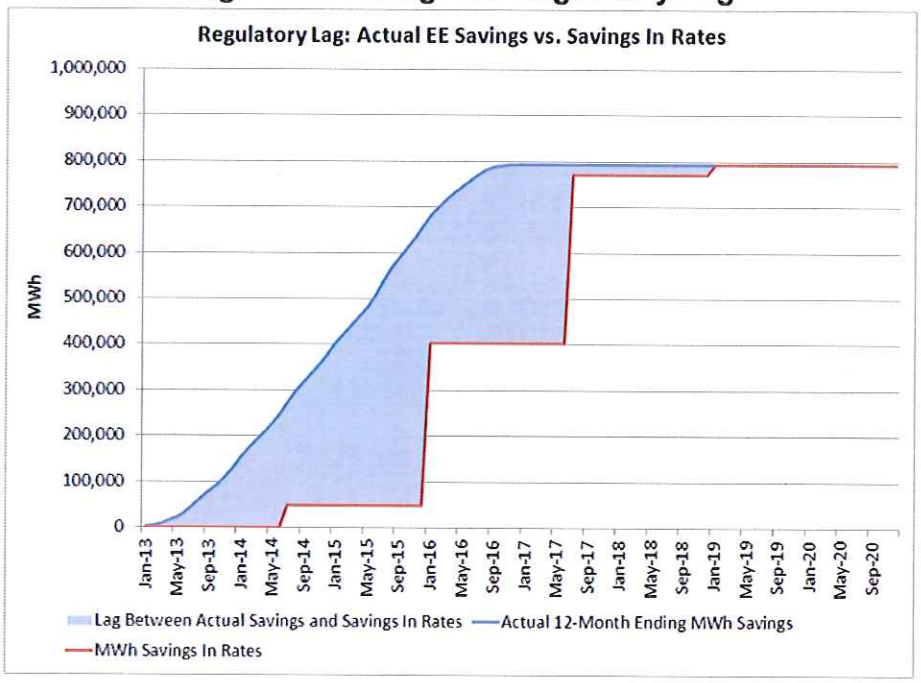



Figure 2.3 further illustrates the issue. The crux of the figure is to demonstrate that it takes many years and several rate cases to properly capture the effects of energy efficiency in rates. Although the effects of energy efficiency are eventually included in rates, the losses between rate cases are permanent and unrecoverable. The historical test year lag introduces a disconnect between the amount of savings being achieved and the amount included in the calculation of the existing rates. The red line represents the energy efficiency savings included in rates while the blue line represents the actual energy efficiency savings. The large "steps" in the red line are a reflection of an increase in the savings included in rates associated with rate cases. The shaded blue area highlights the significant differences between the energy savings actually occurring and the energy savings embedded in rates at any given time. Even when new rates go into effect, they do not incorporate all of the savings achieved up to that point, which reflects the regulatory lag of a historical test year. Eventually, over the course of many years and multiple rate cases, all energy savings are reflected in rates. If the red line were directly on top of the blue line then the throughput disincentive would be eliminated. The distance between the two lines in any given month is an indication of the magnitude of the utility's financial losses. For example, in May 2015, there would be approximately 50,000 MWh of energy efficiency savings in rates but there would be 500,000 MWh of actual energy efficiency savings. The utility would permanently lose revenues on the 450,000 MWh difference between the actual savings and the savings included in rates.

**Figure 2.3 Billing Unit Regulatory Lag**




The regulatory lag effect illustrated in Figure 2.3 is important to the accurate analysis of energy efficiency and the proper alignment of utility incentives and customer interests. When rates are set they are based on the revenue requirement and billing units from a historical test year. Using a historical test year introduces one layer of regulatory lag but there is another layer associated with the effects of energy efficiency. For example, consider a test year that is simply a calendar year from January 1st to December 31st. During implementation of energy efficiency programs there are efforts throughout the year to engage customers in energy efficient behaviors. So in each month there are new customers installing new energy efficient measures. If a customer installs a measure on January 1st then the test year includes twelve months of savings but if a customer installs a measure on December 1st then the test year only includes one month of savings. Here is the extra layer of regulatory lag; for the period in which rates will be effective there will be twelve months of actual energy savings for that measure installed on December 1st while only one month was included in rates. This effect dramatically delays the time in which the effects of energy efficiency programs are fully incorporated into rates. It is possible to mitigate this effect by annualizing the test year billing units for the effects of energy efficiency but this is not standard practice in Missouri. The analysis for Ameren Missouri's proposed DSIM does not assume the energy efficiency savings have been annualized for the test year.

## 2.3 Savings vs. Benefits

Although all energy reductions are eventually included in the test year and rates, the periods between rate cases cause a distortion in the economics of energy efficiency. In

**BEFORE THE PUBLIC SERVICE COMMISSION**
**OF THE STATE OF MISSOURI**

| | | |
|---|---|---|
| In the Matter of Kansas City Power & Light Company's Application for Approval of Demand-Side Programs and for Authority to Establish a Demand-Side Programs Investment Mechanism | ) ) ) ) ) | Case No. EO-2014-0095 |

**NON-UNANIMOUS STIPULATION AND AGREEMENT RESOLVING KANSAS CITY POWER & LIGHT COMPANY'S MEEIA FILING**

COME NOW Missouri Public Service Commission Staff ("Staff"), Kansas City Power & Light Company ("KCP&L" or "Company"), KCP&L Greater Missouri Operations Company ("GMO"), Missouri Division of Energy, Natural Resources Defense Council, Sierra Club, and Earth Island Institute d/b/a Renew Missouri (together, the "Signatories") and present this Non-Unanimous[1] Stipulation and Agreement ("Stipulation") to the Missouri Public Service Commission ("Commission") for the Commission's approval, and in support thereof respectfully state as follows:

## I. BACKGROUND

1. On January 7, 2014, KCP&L filed in Case No. EO-2014-0095 an application ("Application") under the Missouri Energy Efficiency Investment Act ("MEEIA") and the Commission's MEEIA rules, along with its direct testimony, requesting Commission approval of demand-side programs and for authority to establish a demand-side programs investment mechanism ("DSIM"). Rebuttal testimony was filed on March 28, 2014. Surrebuttal testimony was filed on April 14, 2014.

[1] Without taking any position regarding the propriety of its terms, The Empire District Electric Company, Union Electric Company d/b/a Ameren Missouri, Midwest Energy Consumers Group, and Brightergy, LLC have indicated they will not oppose this Stipulation. KCP&L and Staff have attempted to reach the Missouri Industrial Energy Consumers ("MIEC") to determine its position on this Stipulation. MIEC's position is unknown, but it has not objected over the last four weeks of settlement discussions.

## II. SPECIFIC TERMS AND CONDITIONS

2. Complete Settlement of Case. As a result of extensive settlement discussions among all of the Signatories, the Signatories have agreed upon the terms[2] and conditions set forth below in full and final resolution of all issues in this case. This Stipulation is solely the result of compromise in the settlement process and does not serve as precedent beyond this Stipulation.

3. Approval of Plan. The Signatories agree for purposes of this Stipulation, the Commission should approve for KCP&L to implement 12 demand-side programs ("MEEIA Programs") and the DSIM described in this Stipulation (the "Plan"). The 12 MEEIA Programs are: Business Energy Efficiency Rebates-Custom; Business Energy Efficiency Rebates-Standard; Building Operator Certification; Income-Eligible Weatherization; Home Lighting Rebate; Air Conditioning Upgrade Rebate; Home Appliance Recycling Rebate; Income-Eligible Home Energy Report Program - Pilot; Home Energy Report Program - Pilot; Programmable Thermostat; Business Energy Analyzer; and, Home Energy Analyzer.

4. MEEIA Programs and MEEIA Programs' Cost. KCP&L agrees to make its best effort to begin implementation of its 12 MEEIA Programs on July 6, 2014, or on the effective date of the tariff sheets for the MEEIA Programs, if the effective date is other than July 6, 2014. The Plan period[3] will end December 31, 2015. The Plan includes a total budget of $19,175,842 for the 12 MEEIA Programs. The Plan's budgets for each of the individual MEEIA programs are found in Appendix A.

5. Annual Energy and Demand Savings Targets. The Plan has the following annual energy and demand savings targets:

[2] Unless specifically defined herein, the terms used in the Stipulation are defined in the Commission's rules, 4 CSR 240-20.093(1) and 4 CSR 240-20.094(1).

[3] The Plan period is July 6, 2014 through December 31, 2015, which is approximately 18 months.

| | Targeted Annual Energy Savings (kWh) | Programmable Thermostat Annual Demand Savings (kW) | All Other MEEIA Programs' Annual Demand Savings (kW) | Targeted Annual Demand Savings (kW) |
|---|---|---|---|---|
| 2014 (July 6 – Dec. 31) | 33,872,024 | 17,590 | 6,751 | 24,341 |
| 2015 (Jan. – Dec.) | 68,716,971 | 2,371 | 16,383 | 18,754 |
| The Sum of the Incremental Annual Targets in 2014 and 2015 | 102,588,995 | 19,961 | 23,134 | 43,095 |

The incremental annual energy savings targets amount to 0.74% and 0.77% of KCP&L's estimated weather normalized retail sales for July 6, 2014 through December 31, 2014 and calendar year 2015, respectively. The incremental annual demand savings targets amount to 1.23% and 0.95% of KCP&L's estimated weather normalized peak demand for July 6, 2014 through December 31, 2014 and calendar year 2015, respectively. The sum of the incremental annual energy and demand savings targets will be adjusted based on actual customer opt-outs as described in paragraph 6.

The annual energy and demand savings targets for each of the individual MEEIA Programs are included in the program tariff sheets attached as Appendix B.

The total resource cost test ("TRC") for the portfolio of MEEIA Programs is 1.88 and the TRCs for individual MEEIA Programs are included in Appendix A. The Business Energy Analyzer and Home Energy Analyzer are education programs and do not have TRC values.

6. DSIM. The Signatories agree to the DSIM described in this Stipulation. The DSIM addresses recovery of MEEIA Programs' costs, KCP&L's Throughput Disincentive Net Shared Benefits ("TD-NSB") Share that is intended to recover lost margin revenues, and any earned Performance Incentive Award. The Company will begin recovery through a DSIM Rider in the August 2014 billing or as soon as practical thereafter.

**Program Costs:** The Plan includes MEEIA Programs' costs of $19,175,842, which are based on the planned budgets for the 12 MEEIA Programs to be delivered over approximately 18 months beginning July 6, 2014 and ending December 31, 2015.

**TD-NSB Share:** The TD-NSB Share is the sum of the net shared benefits over the MEEIA Plan period multiplied by 26.36%. The energy and demand savings will be based on actual measures installed and tracked each month, and their associated deemed energy (kWh) savings and deemed demand (kW) savings and deemed lifetimes. For purposes of calculating the actual net shared benefits, a net-to-gross ("NTG") ratio of 1.00 will be used for all programs, with the exception of the Home Appliance Recycling Rebate program (a NTG of 0.52 will be used) and CFL's within the Residential Lighting and the Business Energy Efficiency Rebates-Custom and Business Energy Efficiency Rebates-Standard programs (a NTG of 0.90 in 2014 and a NTG of 0.70 in 2015 will be used for CFL measures). The net shared benefits is the sum of the 2014 present value of avoided utility costs over the measures' lives less 2014 present value of all programs' costs (including program design, administration, delivery, end-use measures, incentives, evaluation, measurement and verification ("EM&V"), utility market potential studies, and technical resource manual) discounted using the currently approved KCP&L weighted average cost of capital rate (6.961%). The total TD-NSB Share during the 18-month planning period is expected to be $8,885,678, or 26.36% of the total estimated annual net shared benefits of $33,702,693. Both the TD-NSB share expected dollars and annual net shared benefits referenced herein were discounted utilizing the approved Weighted Average Cost of Capital of 6.961% to reflect the time value of money.

**Performance Incentive Award:** After the MEEIA Programs are completed on December 31, 2015, EM&V will be performed by an independent consultant to include full retrospective

application of NTG ratios at the program level for all MEEIA Programs for the determination of the sum of the incremental annual energy and demand savings for July 6, 2014 through December 31, 2015 of the MEEIA Programs. Dividing the sum of the incremental annual energy savings for July 6, 2014 through December 31, 2015 by the Commission approved energy savings target determines the kWh performance achievement level (expressed as a percentage). Dividing the sum of the incremental annual demand savings for July 6, 2014 through December 31, 2014 and for calendar year 2015 by the Commission-approved demand savings target determines the kW performance achievement level (expressed as a percentage).

The kWh performance achievement level (expressed as a percentage) will be weighted 90% and the kW performance achievement level (expressed as a percentage) will be weighted 10% to determine the overall level of achievement for the Plan when determining the Performance Incentive Award amount as illustrated in Appendix C.

In order to determine actual performance against the cumulative energy and demand savings targets, the cumulative energy and demand savings targets will be adjusted downward at the end of the 18 month Plan by accounting for the actual kWh retail sales of the opt-out customers over the portion of the Plan period for which they were opted out, divided by the kWh retail sales for commercial and industrial/non-residential classes less Lighting over the same Plan period. An example of the opt-out customers' adjustment to cumulative annual energy and demand savings targets calculations is attached as Appendix D.

The following is the Performance Incentive Award table.

| Percent of kWh/kW Target (90%/10%) | Percent of EM&V Net Shared Benefits |
|---|---|
| Less than 70 | 0.00% |
| 70 | 4.61% |
| 80 | 5.47% |
| 90 | 6.33% |
| 100 | 7.20% |
| 110 | 8.64% |
| 120 | 10.07% |
| 130 | 11.51% |
| > 130 | 11.51% |

**Recovery Mechanism:** It is the intent of the Signatories that KCP&L shall ultimately bill customers for an amount as close as reasonably practicable to the actual MEEIA Programs' costs incurred, the KCP&L TD-NSB Share, and any earned KCP&L's Performance Incentive Award as provided for herein.

The initial DSIM Rider illustrative tariff sheets are attached as Appendix E and reflect the recovery of MEEIA Program costs, TD-NSB Share and Performance Incentive Award, including interest. The rate to be charged to residential and non-residential classes will initially be determined by dividing the total of the program costs plus 100% of the TD-NSB Share for each customer class for the period July 6, 2014 through December 31, 2014 by the projected energy (kWh) sales for each customer class, excluding opt-outs, over the period August 1, 2014 through January 30, 2015.

Throughout the Plan period, KCP&L will monthly determine the annual energy (kWh) savings and annual demand (kW) savings achieved through the demand-side programs in the more specific manner described below to determine KCP&L's TD-NSB Share. KCP&L shall monthly track the differences (separately for the residential and non-residential customer classes) between the amount billed and the dollar amount that equates to KCP&L's

TD-NSB Share. EM&V shall not be utilized to calculate the net shared benefits for the purposes of determining the amount of the KCP&L TD-NSB Share.

Monthly interest will be calculated for the monthly cumulative over- and under- monthly balances for MEEIA Programs' costs, KCP&L TD-NSB Share and any earned Performance Incentive Award. The monthly interest rate will be KCP&L's monthly short-term borrowing rate at that particular time. The DSIM Charge is applicable to all KCP&L Missouri Retail Rate Schedules with the exception of Lighting Schedules and customers who opt out of participation under the current MEEIA rules.

**Separate Item on the Bill**: Charges from the MEEIA Plan shall be reflected as "DSIM Charge" on a separate line item on customers' bills.

7. Determining KCP&L's TD-NSB Share. KCP&L's TD-NSB Share for a given month is 26.36% of the monthly TD-NSB. The monthly TD-NSB is the 2014 net present value of the gross benefits of all measures installed in that month, less the 2014 net present value of all programs' costs in that month.

a. KCP&L will use DSMore® XLS Version 6.0.1, GCG Version 6.0.6 and the applicable DSMore® electronic spreadsheets, provided as electronic workpapers (4 CDs labeled, "KCPL-MEEIA Disc [1-4] of 4 05/14/2014") to calculate the gross benefits of all measures installed in a month. For measures installed between July 6, 2014 and December 31, 2014, KCP&L will use the appropriate DSMore® Aggregate Tools and measure files ending with a suffix of "1". For measures installed in calendar year 2015, KCP&L will use the appropriate DSMore® Aggregate Tools and measure files ending with a suffix of "2". The input values in the DSMore® electronic spreadsheets shall not be changed except as discussed in the following:

(i) Cells C34 and D34 of the Program Input tab of the measure files, as appropriate, to reflect the actual number of energy efficiency measures (by type)[4] installed in each month up to that point.

(ii) KCP&L will update cells of the DSMore® electronic spreadsheets with the implementation contractor's best independent estimate of the impact savings data as necessary for Business Energy Efficiency Rebates – Custom measures, for which the potential study does not provide a deemed value savings.

(iii) **Income-Eligible Weatherization –** The agencies managing Income-Eligible Weatherization ("IEW") programs as of the date of this Stipulation are:

United Services;
West Central Missouri Community Action Agency;
Green Hills Community Action Agency;
Missouri Valley Community Action Agency; and,
Central Missouri Community Action.

Other community action agencies that decide to offer IEW programs within KCP&L's service territory may be included in the future.

KCP&L will develop the energy savings from the National Energy Assessment Tool ("NEAT"), which was developed by the Oak Ridge National Laboratory. KCP&L shall enter the kWh listed on the NEAT report for the actual measure(s) installed as follows: KCP&L incentive payment / total cost on the agency payment sheet x NEAT kWh. KCP&L shall input the kWh information developed above into the DSMore® spreadsheet for the Income-Eligible Weatherization program in cell B21 of the Program Input tab and DSMore® will calculate the kW savings.

The gross benefits for the month are the sum of the dollar values in cell D22 of the "Test Results" tab of the applicable DSMore® Aggregate Tool files.

[4] Or block of measures as annotated in cells C34 and D34 (e.g. Residential Lighting CFLs is per 10 CFLs).

b. Programs monthly cost information (administration, implementation/participation, incentives and other miscellaneous costs, including EM&V) will come from KCP&L's general ledger accounting system and be adjusted using the Weighted Average Cost Of Capital to reflect the 2014 net present value.

8. Business Energy Efficiency Rebates. Appendix F reflects that the baseline used for claiming savings for the early retirement ("retrofit") of existing T-12 linear fluorescent lighting systems to premium T-8 linear fluorescent lighting fixtures (or any equally or more efficient lighting technology) will only be allowed for program year 2014. In program year 2015, and for the remaining measure lifetime, for the purpose of calculating NSBs, lost margins, and the performance incentive, the baseline for the program year 2014 T-12 retrofits will be increased to a standard T-8 linear fluorescent lighting system. For program years beyond 2014, the energy and capacity savings from retrofits of T-12 systems to higher efficiency systems will reflect a minimum baseline of a standard T-8 system. If the replaced system is known and is more efficient than a standard T-8 system then actual replaced technology will be used as a baseline. KCP&L will not offer any rebates or promotions in any program for T-12 or standard T-8 systems as outlined in the chart below.

| Program Year | Actual Existing Lighting System To Be Retrofitted | Assumed Baseline used in 2014 | Assumed Baseline used in 2015 and beyond for purposes of TD-NSB and Performance Incentive |
|---|---|---|---|
| 2014 | T-12 System | Existing system efficiency (T-12) | Standard T-8 System |
| 2014 | Standard T-8 System | Existing Standard T-8 system | Standard T-8 System |

| | | | |
|---|---|---|---|
| 2014 | Existing system more efficient than Standard T-8 System | Existing actual system baseline (if done prescriptively, and no data on existing system, then assumption is Standard T8) | Existing actual system baseline (if done prescriptively, and no data on existing system, then assumption is Standard T8) |
| 2015 | T-12 System | N/A | Standard T-8 System |
| 2015 | Standard T-8 System | N/A | Standard T-8 System |
| 2015 | Existing system more efficient than Standard T-8 System | N/A | Existing actual system baseline (if done prescriptively, and no data on existing system, then assumption is Standard T8) |

9. Residential Lighting. KCP&L will target the sales points which reflect a close proximity to customers' residences in KCP&L-MO territory. GMO has informed the advisory group of its intent to file the same lighting program in GMO. GMO will file by July 1, 2014, or sooner, under 4 CSR 240-20.094(4) to modify its MEEIA programs and file a tariff to adopt the same residential lighting rebate program as KCP&L to terminate December 2015. This filing will require modification of the savings target of the GMO DSIM to reflect a net increase of 25,161 MWh and 2.7 MW to the savings targets for purposes of the performance incentive award, but will not modify any other GMO MEEIA programs, or modify the percentage used to calculate GMO's TD-NSB share. KCP&L and GMO will use a NTG value of "0.9" for 2014 CFL measures, and "0.7" for 2015 CFL measures. KCP&L and GMO will use a NTG value of 1.0 for all LED measures in 2014 and 2015. KCP&L and GMO will not offer any rebates or buy-downs for incandescent lamps. The measure life for the GMO residential lighting program will have the same measure life as the KCP&L residential lighting program.

10. MPower. KCP&L will not include MPower in the KCP&L Plan and will continue to defer MPower costs so they can be reviewed and verified for future recovery in rates as currently treated. Customers who opt-out of the demand-side programs will be permitted to participate fully in the Programmable Thermostat and/or MPower programs. Notwithstanding

the provision contained in paragraph 2, KCP&L also agrees that it will not assert in future proceedings that customers who opt out of the demand-side programs should not be permitted to participate fully in the Programmable Thermostat and MPower program as long as the Section 393.1075.10, RSMo Cum. Supp. 2010 is not amended.

11. Home Energy Reports. KCP&L will implement two Home Energy Reports: Income-Eligible Home Energy Report Program – Pilot and Home Energy Report Program - Pilot. The Income-Eligible program reports will be sent to 20,000 low-income customers and the other program reports will be sent to 90,000 customers. Customers who have previously been a Low Income Home Energy Assistance Program or Economic Relief Pilot Program customer between January 1, 2012, through May 2, 2014, or those customers with an annual household income of less than $30,000 will be considered for the Income-Eligible program. Each pilot program will utilize Opower deemed savings.

12. Programmable Thermostat. KCP&L will not separate the Electric Power Research Institute project out as a pilot.

13. Taxes. If applicable, KCP&L will reflect any impact of income taxes in the calculation of its MEEIA rider.

14. Home & Business Energy Analyzers. KCP&L will evaluate other similar industry offerings to increase participation in the online energy tool.

15. Home Energy Improvements Rebate program. KCP&L agrees to continue to work with its demand-side management advisory group ("DSMAG") to develop a Home Energy Improvements Rebate program for its next MEEIA cycle. KCP&L agrees to analyze the achievable potential for Home Energy Improvements Rebate program and review best practice programs with its DSMAG with an intent to offer a cost-effective Home Improvements Rebate

program.

16. Combined Heat & Power. KCP&L will not include Combined Heat & Power ("CHP") in its C&I custom rebate program without Commission approval of an application to modify its demand-side programs pursuant to 4 CSR 240-20.094(4). Nothing prevents any party from challenging such future application.

17. Other Tariff Related Matters. Changes in measures and/or incentive amounts being offered at a given time will be made in accordance with the change process provided for in the tariff sheets for the "umbrella" residential and C&I energy efficiency programs. KCP&L will file a notice in this case no less than five (5) business days prior to making any change in its measure and/or incentive amount offerings; this notice requirement includes notice of the discontinuance of any measure and/or incentive amount. As provided for in the change process, the revised web page(s) reflecting the change(s) in measure or incentive amount will be filed in this case before the change is disclosed publicly on www.KCPL.com. If a measure or incentive amount shown on the website accessed as www.KCPL.com differs from the measure or incentive amount included in the currently effective notice filed in this case for the measure or incentive amount, the stated measure or incentive amount included in the currently effective notice shall govern. When a program participant has already received a reservation for a specified measure and incentive amount, future changes in measures or incentive amounts will not effect that reservation, so long as the program participant fulfills their obligation within any relevant time limits.

18. EM&V. KCP&L's independent EM&V contractor(s) will perform impact EM&V for each program, excluding IEW and Home & Business Energy Analyzers. Approximately five percent (5%) of the 18-month MEEIA Programs' costs budget

will be spent for EM&V. KCP&L will work with its DSMAG to develop an evaluation plan to determine how best to allocate and utilize the EM&V budget. The Signatories agree that the EM&V process for KCP&L, which will occur at the end of the Plan period, will be the same as the EM&V process for GMO contained in paragraph 10.b. on pages 22 through 25 of the Non-Unanimous Stipulation and Agreement Resolving KCP&L Greater Missouri Operations Company's MEEIA Filing (in Case No. EO-2012-0009) which was approved by the Commission on November 15, 2012. EM&V results will be utilized in determining the performance incentive and should allow for recovery, if any, of the performance incentive to begin approximately in January 2017. KCP&L will provide the details and results of the socket saturation study that was included in the market potential study, to the Signatories within 30 days of Commission approval of the Stipulation. KCP&L will follow international EM&V protocols consistent with GMO. The EM&V impact evaluation will not include market effects[5] for purposes of determining KCP&L's NTG calculation and resulting Performance Incentive Award for the Plan period ending December 31, 2015.

19. DSIM Components/Timing. KCP&L will file tariff sheets for a DSIM Rider to be effective on the same date as the MEEIA program tariff sheets, with charges pursuant to the DSIM Rider to be effective for the August 2014 billing month, or as soon as possible thereafter.

20. Technical Resource Manual. KCP&L will continue to collaborate on a statewide technical resource manual ("TRM").

21. Rider. Staff and KCP&L have contacted all signatories to the Stipulation and Agreement ("CEP") in Case No. EO-2005-0329 ("CEP Signatories"), explained the rider that Staff and KCP&L have agreed to as part of this settlement, and inquired of the CEP Signatories

[5] The Signatories agree to use the definitions of market changes, market effects and market transformation found within 2009 study "Market Effects and Market Transformation: Their Role in Energy Efficiency Program Design and Evaluation" at http://uc-ciee.org/planning-evaluation/7/334/105/nested.

as to their position to allow for the DSIM Rider to begin before June 1, 2015. The following CEP Signatories[6] not parties to this case, have indicated they are not opposed to a DSIM Rider that begins before June 1, 2015: Praxair, City of Kansas City, Missouri, and, Missouri Joint Municipal Electric Utility Commission.

22. Multifamily. KCP&L will continue to work with its DSMAG to address multifamily dwellings in its next MEEIA cycle filing. At a minimum KCP&L agrees to analyze the achievable efficiency potential in the multifamily sector and review best practice programs, with an intent to offer a multifamily program if it is expected to be cost-effective.

23. Rebate Tracking. KCP&L will track its total amount of rebates approved and rebates paid for its Business Energy Efficiency Rebates-Custom and Business Energy Efficiency Rebates-Standard programs. This information will be presented as a table or graph comparing total approved/paid rebates for both programs as a percent of total incentive budget posted weekly on www.KCPL.com in the Business Rebates portal.

24. Other Items.

a. Customer Notice – The Company agrees to work with parties on the form of a notice that will be sent to customers that specifically describes the rider. The notice will be mailed in the billing cycle beginning 30 days following the effective date of the Commission's order approving the Stipulation.

b. Customer FAQ's – KCP&L and GMO will work with OPC and Staff to develop a FAQ page about programs, costs and incentives that KCP&L and GMO will

[6] The Department of Natural Resources was signatory to the Stipulation and Agreement in EO-2005-0329. On August 29, 2013, Executive Order 13-03 transferred "all authority, powers, duties, functions, records, personnel, property, contracts, budgets, matters pending, and other pertinent vestiges of the Division of Energy from the Missouri Department of Natural Resources to the Missouri Department of Economic Development…" To the extent the present Stipulation requires a waiver of rights under a prior Stipulation and Agreement, the Missouri Division of Energy agrees to such waiver.

make available on their website. The FAQ page will be available on the website within 30 days of a Commission order approving the Stipulation in this case. The FAQ page or a comparable page will remain available on the website throughout the program.

c. Programmable Thermostat Program Customer Participation Agreement – KCP&L will work with Staff and OPC to modify the existing agreement to reflect the current proposed Programmable Thermostat Program, concurrent with its implementation.

d. Programmable Thermostat Program Web Page Information – Concurrent with the implementation of the Programmable Thermostat Program, KCP&L will modify its current web page information to be in agreement with the current proposed program.

25. Variances. The Signatories agree that the terms and conditions in this Stipulation may be inconsistent with the following Commission rules, and that good cause exists by the agreements made within this entire Stipulation to grant KCP&L variances from those rules:[7]

*Variances related to the TD-NSB incentive to be implemented and based on prospective analysis rather than achieved performance verified by EM&V:*

3.163(1)(A); 3.163(1)(E)5; 20.093(1)(C); 20.093(1)(M)5; 20.093(1)(EE); 20.093(2)(H); 20.093(2)(H)3; 20.094(1)(C); 20.094(1)(J)5; 20.094(1)(Z).

*Variances related allowing adjustments to DSIM rates for the TD-NSB DSIM utility incentive revenue requirement as well as the DSIM cost recovery revenue requirement:*

20.093(4); 20.093(4)(B).

*Variances related to allow the TD-NSB incentive to be based on net shared benefits rather than annual net shared benefits, energy savings targets, and demand savings targets:*

3.163(1)(J); 20.093(1)(A); 20.093(1)(B); 20.093(1)(Q); 20.093(2)(H);

[7] All rule references are to 4 CSR Division 240.

20.094(1)(A); 20.094(1)(B); 20.094(1)(Z).

*Variances related to combining non-residential customers into one class:*

20.093(2)(C); 20.093(2)(K).

*Variances related to allowing flexibility in setting the incentives and changing measures within a program:*

14.030.

*Variances related to allow the annual report to be filed 90 days rather than 60 days, of the end of the calendar year:*

20.093(8).

## III. GENERAL PROVISIONS

26. This Stipulation is being entered into for the purpose of disposing of the issues that are specifically addressed herein. In presenting this Stipulation, none of the Signatories 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 Signatories shall be prejudiced or bound in any manner by the terms of this Stipulation (whether it is approved or not) in this or any other proceeding, other than a proceeding limited to enforce the terms of this Stipulation, except as otherwise expressly specified herein. Without limiting the foregoing, it is agreed that this Stipulation does not serve as a precedent for future MEEIA plans, and does not preclude a party from arguing whether the Plan has or does not have an impact on KCP&L's business risk in any pending or future proceeding.

27. This Stipulation has resulted from extensive negotiations and the terms hereof are interdependent. If the Commission does not unconditionally approve this Stipulation, or approves it with modifications or conditions to which a party objects, then this Stipulation

shall be void and no signatory shall be bound by any of its provisions.

28. If the Commission does not unconditionally approve this Stipulation without modification, or approves it with modifications or conditions to which a party objects, and notwithstanding its provision that it shall become void, neither this Stipulation, nor any matters associated with its consideration by the Commission, shall be considered or argued to be a waiver of the rights that any Signatory has for a decision in accordance with Section 536.080 RSMo 2000 or Article V, Section 18 of the Missouri Constitution, and the Signatories shall retain all procedural and due process rights as fully as though this Stipulation 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 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.

29. If the Commission unconditionally accepts the specific terms of this Stipulation without modification, the Signatories 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 Supp. 2012. These waivers apply only to a Commission order respecting this Stipulation 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.

30. This Stipulation contains the entire agreement of the Signatories concerning the issues addressed herein.

31. This Stipulation does not constitute a contract with the Commission. Acceptance of this Stipulation by the Commission shall not be deemed as constituting an agreement on the part of the Commission to forego the use of any discovery, investigative or other power which the Commission presently has. Thus, nothing in this Stipulation is intended to impinge or restrict in any manner the exercise by the Commission of any statutory right, including the right to access information, or any statutory obligation.

32. The Signatories agree that this Stipulation resolves all issues raised in this case, and that the testimonies of all witnesses whose testimony was pre-filed in this case should be received into evidence without the necessity of the witnesses taking the witness stand.

Respectfully submitted,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**CERTIFICATE OF SERVICE**

I do hereby certify that a true and correct copy of the foregoing document has been hand-delivered, transmitted by e-mail, or mailed, First Class, postage prepaid, this 27th day of May, 2014, to counsel for all parties on the Commission's service list in this case.

*/s/ Roger W. Steiner*

Roger W. Steiner

Kansas City Power & Light Company
Quarter Ended, Year to Date and Cumulative Total Ended September 30, 2016
SURVEILLANCE MONITORING REPORT
Missouri Energy Efficiency Investment Act of 2009 (MEEIA)
Status of Demand-Side Programs and Demand-Side Programs Investment Mechanism

| DSM Program Name | Start Date | Planned End Date | Actual End Date |
|---|---|---|---|
| Air Conditioning Upgrade Rebate | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Building Operator Certification | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Business Energy Analyzer | 07/06/2014 | 12/31/2015 | 12/31/2015 (9) |
| Business Energy Efficiency Rebates - Custom | 07/06/2014 | 12/31/2015 | 06/30/2016 |
| Business Energy Efficiency Rebates - Standard | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Home Lighting Rebate | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Home Appliance Recycling Rebate | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Home Energy Analyzer | 07/06/2014 | 12/31/2015 | 12/31/2015 (9) |
| Home Energy Report | 07/06/2014 | 12/31/2015 | 12/31/2015 (9) |
| Home Energy Report Income Eligible | 07/06/2014 | 12/31/2015 | 12/31/2015 (9) |
| Income-Eligible Weatherization | 07/06/2014 | 12/31/2015 | 12/31/2015 |
| Programmable Thermostat | 07/06/2014 | 12/31/2015 | 12/31/2015 (9) |

| Category | Descriptor | | Quarter Ended September 30, 2016 | YTD September 30, 2016 | Cumulative Total Ended |
|---|---|---|---|---|---|
| Total Programs' Costs ($) | Planned | (1) | $ - | $ - | $ 19,175,843 |
| Total Programs' Costs ($) | Actual | (6) | $ (114,192) | $ 21,618,742 | $ 48,458,882 |
| Total Programs' Costs ($) | Variance | | $ 114,192 | $ (21,618,742) | $ (29,283,039) |
| Total Programs' Costs ($) | Billed | | $ 6,921,758 | $ 15,616,870 | $ 36,892,123 |
| Total Programs' Costs ($) | Actual | (6) | $ (114,192) | $ 21,618,742 | $ 48,458,882 |
| Total Programs' Costs ($) | Variance | | $ 7,035,950 | $ (6,001,872) | $ (11,566,759) |
| Total Programs' Costs ($) | Interest | | $ (67,944) | $ (144,815) | $ (193,752) |
| Energy Savings (kWh) | Planned | (2) | 0 | 0 | 102,588,995 |
| Energy Savings (kWh) | Actual | (7) | 0 | 57,897,554 | 184,024,240 |
| Energy Savings (kWh) | Variance | | 0 | (57,897,554) | (81,435,245) |
| Demand Savings (kW) | Planned | (3) | 0 | 0 | 43,094 |
| Demand Savings (kW) | Actual | (7) | 0 | 11,689 | 54,346 |
| Demand Savings (kW) | Variance | | 0 | (11,689) | (11,253) |
| Net Benefits ($) | Planned | (4) | $ - | $ - | $ 33,702,693 |
| Net Benefits ($) | Estimated | (10) | $ (747,502) | $ 27,528,579 | $ 67,584,945 |
| Net Benefits ($) | Variance | | $ 747,502 | $ (27,528,579) | $ (33,882,251) |
| Company TD-NSB Share ($) | Planned | (5) | $ - | $ - | $ 9,833,456 |
| Company TD-NSB Share ($) | Disincentive | (8)(10) | $ (197,042) | $ 7,256,533 | $ 17,815,391 |
| Company TD-NSB Share ($) | Variance | | $ 197,042 | $ (7,256,533) | $ (7,981,936) |
| Company TD-NSB Share ($) | Billed | | $ 2,462,204 | $ 4,611,157 | $ 13,551,514 |
| Company TD-NSB Share ($) | Disincentive | (8) | $ (197,042) | $ 7,256,533 | $ 17,815,391 |
| Company TD-NSB Share ($) | Variance | | $ 2,659,245 | $ (2,645,376) | $ (4,263,877) |
| Company TD-NSB Share ($) | Interest | (10) | $ (25,688) | $ (59,117) | $ (47,818) |

**Footnotes:**
(1) Total planned program costs.
(2) Total planned energy savings (kWh).
(3) Total planned demand savings (kW).
(4) Total planned net benefits.
(5) Total Company TD-NSB Share ($).
(7) Actual demand and energy savings are reported at the meter.
(8) Disincentive amounts reflect the 26.36% share applied to the Net Shared Benefits @ 100%.
(9) Program ended 12/31/15 except for maintenance program costs to sustain the program until MEEIA Cycle 2 programs become effective April 1, 2016.

(10) In connection with the MPSC Staff 2016 MEEIA Prudence Audit, Case No. EO-2016-0183, it was determined that the Company had not discounted program costs to 2014 in the calculation of Net Benefits and TD-NSB Share as required in the Non-Unanimous Stipulation and Agreement approved by the Commission in Case No. EO-2014-0095. The effect of correcting this error was an increase in Net Benefits of $1,402,998.93, TD-NSB Share of $369,830.54 and Interest of $2,280.26. This correction is reflected in the quarter ended March 31, 2016.

**Notes for Descriptors:**
1. **Planned = amounts which are consistent with and included in the Company's Commission-approved MEEIA Plan**
2. **Billed = amounts billed to customers for recovery of Programs' Costs or Company TD-NSB Share**
3. **Actual = amounts (prior to evaluation, measurement and verification (EM&V)) used to determine Estimated Net Benefits**
4. **Estimated = net benefits amounts calculated monthly using DSMore model and prior to EM&V**
5. **Disincentive = Commission-approved percentage of pre-tax Estimated Net Benefits calculated using a combined federal/state tax rate specified in the utility's Commission-approved DSIM**
6. **Variance = Planned less Actual, Billed less Actual, Planned less Estimated, Planned less Disincentive, or Billed less Disincentive**
7. **Interest = amounts of interest determined through the methodology specified in the utility's Commission-approved DSIM**

## Calculation of Ninety Percent of Ameren Missouri TD-NSB Share

From DSMore

| | |
|---|---|
| NPV Program Costs | $136,204,652 |
| NPV Benefits | $496,985,976 |
| NPV Net Benefits | $360,781,324 |

NPV Throughput Disincentive ($8 RES Cust. Charge, $MM) $95.05

Sharing Percentage 26.34%

| Net Benefit (PV) | $360.78 | | | |
|---|---|---|---|---|
| Initial Sharing Percent | 26.34% | | | |
| Initial Sharing Amount (PV) | $95.05 | | | |
| Class | RES | BUS | Low Inc. | Total |
| MWh (3-Year Cum.) | 491,803 | 287,633 | 13,666 | 793,102 |
| Percent Allocation | 62.0% | 36.3% | 1.7% | 100.0% |
| Before-Tax Rev. Req. (PV) | $58.94 | $34.47 | $1.64 | $95.05 |
| Revenue Requirement (3-Year Annuity) | $20.98 | $12.27 | $0.58 | $33.83 |
| Percent in Rates | 90.0% | 90.0% | 90.0% | |
| Final Revenue Requirement (ER-2012-0166) | $18.88 | $11.04 | $0.52 | $30.45 |

Throughput Disincentive Check

| | Total | 100% TD |
|---|---|---|
| 2013 | $8.39 | $33.83 |
| 2014 | $22.69 | $33.83 |
| 2015 | $39.38 | $33.83 |
| 2016 | $25.77 | 0 |
| Total | $109.34 | $101.50 |
| NPV | $95.045 | $95.045 |
| check | - | - |

Discount Rate 6.95%

## Sample Calculation of Year 1 Ameren Missouri TD-NSB Share

From DSMore

| | | |
|---|---|---|
| NPV Program Costs | $36,116,713 | |
| NPV Benefits | $149,095,793 | 0.3 |
| NPV Net Benefits | $112,979,080 | |

NPV Throughput Disincentive ($8 RES Cust. Charge, $MM)

Sharing Percentage

| Net Benefit (PV) | $112.98 | | | |
|---|---|---|---|---|
| Initial Sharing Percent | 26.34% | | | |
| Initial Sharing Amount (PV) | $29.76 | | | |
| Class | RES | BUS | Low Inc. | Total |
| MWh (3-Year Cum.) | 159,478 | 75,122 | 5,797 | 240,397 |
| Percent Allocation | 66.3% | 31.2% | 2.4% | 100.0% |
| Before-Tax Rev. Req (PV) | $19.74 | $9.30 | $0.72 | $29.76 |

Discount Rate 6.95%

## Sample Calculation of Year 2 Ameren Missouri TD-NSB Share

From DSMore

| | | |
|---|---|---|
| NPV Program Costs | $80,175,300 | |
| NPV Benefits | $323,040,885 | 0.65 |
| NPV Net Benefits | $242,865,584 | |

NPV Throughput Disincentive ($8 RES Cust. Charge, $MM)

Sharing Percentage

| | | | | | |
|---|---|---|---|---|---|
| Net Benefit (PV) | $242.87 | | | | |
| Initial Sharing Percent | 26.34% | | | | |
| Initial Sharing Amount (PV) | $63.98 | | | | |
| Class | RES | BUS | Low Inc. | Total | |
| MWh (3-Year Cum.) | 323,186 | 162,330 | 10,326 | 495,842 | |
| Percent Allocation | 65.2% | 32.7% | 2.1% | 100.0% | |
| Before-Tax Rev. Req (PV) | $41.70 | $20.95 | $1.33 | $63.98 | $34.22 Year 2 amount (PV) |
| | | | | | $36.60 Year 2 nominal amount |

Discount Rate 6.95%

## Sample Calculation of Year 3 Ameren Missouri TD-NSB Share

From DSMore

| | |
|---|---|
| NPV Program Costs | $136,204,317 |
| NPV Benefits | $496,985,976.26 |
| NPV Net Benefits | $360,781,659.08 |

NPV Throughput Disincentive ($8 RES Cust. Charge, $MM)

Sharing Percentage

| | | | | | |
|---|---|---|---|---|---|
| Net Benefit (PV) | $360.78 | | | | |
| Initial Sharing Percent | 26.34% | | | | |
| Initial Sharing Amount (PV) | $95.05 | | | | |
| Class | RES | BUS | Low Inc. | Total | |
| MWh (3-Year Cum.) | 491,803 | 287,633 | 13,666 | 793,102 | |
| Percent Allocation | 62.0% | 36.3% | 1.7% | 100.0% | |
| Before-Tax Rev. Req (PV) | $58.94 | $34.47 | $1.64 | $95.05 | $31.06 Year 3 amount (PV) |
| | | | | | $35.53 Year 3 nominal amount |

Discount Rate 6.95%

CHECK

| | 2013 | 2014 | 2015 | NPV |
|---|---|---|---|---|
| EXAMPLE | $29.76 | $36.60 | $35.53 | $95.05 |
| In Rates | $33.83 | $33.83 | $33.83 | $95.05 |