COMMONWEALTH OF KENTUCKY

BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

ELECTRONIC JOINT APPLICATION OF	**)**	
LOUISVILLE GAS AND ELECTRIC	**)**	
COMPANY AND KENTUCKY UTILITIES	**)**	
COMPANY FOR REVIEW, MODIFICATION,	**)**	**CASE NO. 2017-00441**
AND CONTINUATION OF CERTAIN	**)**	
EXISTING DEMAND-SIDE MANAGEMENT	**)**	
AND ENERGY EFFICIENCY PROGRAMS	**)**	

RESPONSE OF
LOUISVILLE GAS AND ELECTRIC COMPANY
AND KENTUCKY UTILITIES COMPANY
TO THE ATTORNEY GENERAL'S INITIAL DATA REQUESTS
DATED JANUARY 24, 2018

FILED: FEBRUARY 7, 2018

VERIFICATION

COMMONWEALTH OF KENTUCKY)
) SS:
COUNTY OF JEFFERSON)

The undersigned, **David E. Huff**, being duly sworn, deposes and says that he is Director of Customer Energy Efficiency & Emerging Technologies for LG&E and KU Services Company, and that he has personal knowledge of the matters set forth in the responses for which he is identified as the witness, and that the answers contained therein are true and correct to the best of his information, knowledge and belief.

David E. Huff

David E. Huff

Subscribed and sworn to before me, a Notary Public in and before said County and State, this 5th day of February 2018.

Judy Schooler (SEAL)

Notary Public

My Commission Expires:

JUDY SCHOOLER
Notary Public, State at Large, KY
~~My commission expires July 11, 2018~~
Notary ID # 512743

VERIFICATION

COMMONWEALTH OF KENTUCKY)
) SS:
COUNTY OF JEFFERSON)

The undersigned, **Gregory S. Lawson**, being duly sworn, deposes and says that he is Manager Energy Efficiency Planning and Development for Louisville Gas and Electric Company and Kentucky Utilities Company, an employee of LG&E and KU Services Company, and that he has personal knowledge of the matters set forth in the responses for which he is identified as the witness, and that the answers contained therein are true and correct to the best of his information, knowledge and belief.

Gregory S. Lawson

Subscribed and sworn to before me, a Notary Public in and before said County and State, this 6th day of February 2018.

Judy Schooler (SEAL)
Notary Public

My Commission Expires:
JUDY SCHOOLER
Notary Public, State at Large, KY
My commission expires July 11, 2018
Notary ID # 512743

VERIFICATION

COMMONWEALTH OF KENTUCKY)
) SS:
COUNTY OF JEFFERSON)

The undersigned, **Rick E. Lovekamp**, being duly sworn, deposes and says that he is Manager – Regulatory Strategy/Policy for Louisville Gas and Electric Company and Kentucky Utilities Company, an employee of LG&E and KU Services Company, and that he has personal knowledge of the matters set forth in the responses for which he is identified as the witness, and the answers contained therein are true and correct to the best of his information, knowledge and belief.

Rick E. Lovekamp

Rick E. Lovekamp

Subscribed and sworn to before me, a Notary Public in and before said County and State, this 6th day of February 2018.

Judy Schooler (SEAL)

Notary Public

My Commission Expires:

JUDY SCHOOLER
Notary Public, State at Large, KY
~~My commission expires July 11, 2018~~
Notary ID # 512743

VERIFICATION

COMMONWEALTH OF KENTUCKY)
) **SS:**
COUNTY OF JEFFERSON)

The undersigned, **Stuart A. Wilson**, being duly sworn, deposes and says that he is Director, Energy Planning, Analysis & Forecasting for LG&E and KU Services Company, and that he has personal knowledge of the matters set forth in the responses for which he is identified as the witness, and the answers contained therein are true and correct to the best of his information, knowledge and belief.

Stuart A. Wilson

Stuart A. Wilson

Subscribed and sworn to before me, a Notary Public in and before said County and State, this 2nd day of February 2018.

Judy Schooler (SEAL)
Notary Public

My Commission Expires:
JUDY SCHOOLER
Notary Public, State at Large, KY
My commission expires July 11, 2018
Notary ID # 512743

LOUISVILLE GAS AND ELECTRIC COMPANY
AND KENTUCKY UTILITIES COMPANY

Response to the Attorney General's Initial Data Requests
Dated January 24, 2018

Case No. 2017-00441

Question No. 1

Witness: Stuart A. Wilson

Q-1. Refer to the Company's IRP in Case No. 2014-00131. The Company stated that its target minimum reserve margin was 16 percent.

a. Has this planning reserve margin changed since the Company's 2014 IRP?

b. What is the actual reserve margin by year from 2014–2017 and the expected reserve margin for years 2018–2021?

c. What is LG&E/KU's current target reserve margin?

A-1.

a. No. The target reserve margin range established in the Companies' 2014 IRP is 16 to 21 percent. The Companies will update their target reserve margin range in their 2018 IRP, which will be filed in November 2018.

b. The following table shows actual planning reserve margins under normal weather conditions for 2014-2017 and forecasted reserve margins for 2018-2021. As compared to the forecasted reserve margins filed in the Companies' 2016 base rate cases, the forecasted reserve margin figures in the table below reflect the lower peak loads in the Companies' most recent load forecast, the reduced impact expected from the Companies' modified demand conservation programs, and the planned retirement of E.W. Brown Units 1 and 2 in 2019.

Actual Planning Reserve Margins				Forecasted Reserve Margins			
2014	2015	2016	2017	2018	2019	2020	2021
17.4%	21.0%	18.9%	21.6%	24.3%	22.5%	22.4%	22.8%

c. See the response to part (a).

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Response to the Attorney General's Initial Data Requests
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Case No. 2017-00441

Question No. 2

Witness: Stuart A. Wilson

Q-2. Provide the total amount of off-system sales by LG&E/KU for each year since 2013, in terms of both energy and dollar amounts. Provide these amounts by total annual off-system sales and by off-systems sales net off-system purchases. Explain, in complete detail, any increase or decrease of these amounts of 50% or more as compared to the prior year.

A-2. See the table below.

	Off-System Sales		Off-System Sales net Off-System Purchases	
Year	Energy (GWh)	$ Millions	Energy (GWh)	$ Millions
2013	503	21.6	398	18.3
2014	481	32.0	375	27.1
2015	386	20.1	355	19.3
2016	301	12.1	278	11.8
2017	329	12.6	303	11.8

None of these amounts increase or decrease 50% or more as compared to the prior year.

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Question No. 3

Witness: Rick E. Lovekamp

Q-3. For any off-system sales that LG&E/KU makes, is any portion of those sales returned to customers?

a. If so: (i) quantify the portion of the sales returned to customers versus the portion of the sales that the Company keeps; and (ii) specify how the portion of off-system sales is returned to customers.

b. If LG&E/KU has an existing formula to allocate these portions of sales and provides such formula in response to subsection (a), also provide the basis for that formula and explain whether the Company has requested or plans to request Commission approval to alter that formula.

c. If not, explain in detail why not.

A-3. Yes, a portion of off-system sales made by LG&E and KU is returned to customers.

a. Off-system sales margins are shared 75 percent with customers and 25 percent with the Companies. The 75 percent portion of the off-system sales margins is credited to the customers via the Fuel Adjustment Clause ("FAC").

b. LG&E and KU each have an approved tariff, Sheet No. 88, Off-System Sales Adjustment Clause ("OSS"). The OSS tariff sheets were approved in Case Nos. 2014-00371 and 2014-00372. The Companies do not have any current plans to request a change to the formula.

c. Not applicable.

LOUISVILLE GAS AND ELECTRIC COMPANY
AND KENTUCKY UTILITIES COMPANY

Response to the Attorney General's Initial Data Requests
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Case No. 2017-00441

Question No. 4

Witness: Gregory S. Lawson / Rick E. Lovekamp

Q-4. Provide the total and average amount residential electric customers paid through the DSM surcharge in the past reporting period, the projected amount for calendar year 2018, and the actual amount for years 2010-2017. For the same time periods, provide the average total residential electric bill, including base rates, all surcharges, and riders. This information should reasonably lead to the ability to calculate the percentage of the total residential electric bill that DSM charges represent for the average LG&E/KU customer. Accordingly, please provide such percentage and the calculations which produced same in native electronic format with all formulas intact and unprotected, with all cells accessible.

A-4. The following table shows the actual residential DSM surcharge for 2010-2017 and the projected 2018 cost compared to the total residential electric bill including all surcharges and riders. The percentage of the bill that is from the DSM surcharge is calculated for each company.

($ thousands)

	Projected	**Actual**							
LG&E	2018	2017	2016	2015	2014	2013	2012	2011	2010
Residential DSM Revenues ($000)	$ 10,256	$ 16,056	$ 15,650	$ 15,388	$ 19,036	$ 16,806	$ 14,947	$ 12,374	$ 14,277
Total Residential Revenues ($000)	$ 435,562	$436,551	$438,833	$425,948	$419,063	$405,962	$383,160	$366,262	$366,497
Percent DSM of Total Bill	2.35%	3.68%	3.57%	3.61%	4.54%	4.14%	3.90%	3.38%	3.90%
	Projected	**Actual**							
KU	2018	2017	2016	2015	2014	2013	2012	2011	2010
Residential DSM Revenues ($000)	$ 13,809	$ 19,347	$ 18,385	$ 17,522	$ 18,644	$ 22,014	$ 14,900	$ 14,923	$ 13,856
Total Residential Revenues ($000)	$ 594,648	$586,588	$596,756	$576,217	$591,243	$556,660	$488,371	$493,167	$507,150
Percent DSM of Total Bill	2.32%	3.30%	3.08%	3.04%	3.15%	3.95%	3.05%	3.03%	2.73%

The average total residential electric bill for 2018 was calculated using the average kWh usage for 2017 and base rates and adjustment clause rates and percentages that were effective January 1, 2018. The average total residential electric bill for years 2010-2017 are based on actual annual revenue for base rates and adjustment clauses. See attached Excel document.

The attachment is being provided in a separate file in Excel format.

LOUISVILLE GAS AND ELECTRIC COMPANY
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Response to the Attorney General's Initial Data Requests
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Case No. 2017-00441

Question No. 5

Witness: Gregory S. Lawson

Q-5. Refer to Commission Staff's Initial Data Requests, question 13 and the Application pgs. 11–12. Provide the last three (3) calendar years of the earned percentage and total amount of the return-on-equity portion of the DSM Capital Cost Recovery component, and the projected return-on-equity percentage and total for the next two (2) years.

a. Explain how much annual profit the Company expects to receive from this component for each of the past three calendar (3) years, this year, and the next two (2) years.

b. Explain the statement that "the projected incentive component of the DSM Mechanism for calendar year 2019 is zero, though a non-zero incentive component could eventuate if DSM-EE programs' costs or savings change in the future."

c. Further, explain in detail what changes to costs and/or savings would lead to an incentive component eventuating, and what current projections the Company has regarding any future changes to costs or savings.

A-5.

a. The table below summarizes the return-on-equity rate and the equity component of the return on the DSM Rate Base in the DSM Capital Cost Recovery ("DCCR") component by year and by company for the last three calendar years, this year and the projected amounts for the next two years:

Return on Equity %	2015	2016	2017	2018	2019	2020
KU Electric	10.5%	10.5%	10.5%	10.5%	10.2%	10.2%
LG&E Electric	10.5%	10.5%	10.5%	10.5%	10.2%	10.2%
LG&E Gas	10.5%	10.5%	10.5%	10.5%	10.2%	10.2%

Return on Equity	2015	2016	2017	2018	2019	2020
KU Electric	$ 195,206	$ 353,533	$ 361,503	$ 281,757	$ 253,195	$ 221,390
LG&E Electric	$ 185,086	$ 301,816	$ 321,617	$ 222,744	$ 180,454	$ 133,222
LG&E Gas	$ -	$ -	$ -	$ -	$ -	$ -
Total	$ 380,292	$ 655,349	$ 683,120	$ 504,502	$ 433,649	$ 354,612

b. The current projected incentive for the DSM Incentive (DSMI) component of the DSM mechanism for calendar year 2019 is zero due to the Net Resource Savings of the proposed programs being negative. A non-zero incentive amount could occur if future avoided energy costs or future avoided capacity costs were to rise significantly enough so that the Net Resource Savings of a program becomes positive. Per Tariff sheet No. 86.2, the "Net Resource Savings are defined as program benefits less utility program costs and participant costs where program benefits will be calculated on the basis of the present value of Company's avoided costs over the expected life of the program, and will include both capacity and energy savings."

c. For net resource savings to become positive, program benefits (both for capacity and energy) must be greater than both utility costs and participant costs. Given the fairly static nature of utility and participant costs for the seven year portfolio period, there is little expectation that these would decrease. Thus, program benefits would have to increase, which would mean that either avoided energy or capacity costs (or both) would have to rise. The Companies do not expect either to rise significantly within the seven-year portfolio period.

LOUISVILLE GAS AND ELECTRIC COMPANY
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Response to the Attorney General's Initial Data Requests
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Question No. 6

Witness: David E. Huff

Q-6. Explain whether the DSM Advisory Group had any voting or veto power in regards to the contents of the Company's current DSM Application.

a. Besides providing input to the Company regarding the DSM program at periodic meetings, did the DSM Advisory Group have any other involvement in the DSM process?

b. State whether the Company has convened any other advisory groups or collaboratives in the past three (3) years.

c. If so, identify the same and describe the extent of the group's involvement. Explain whether these groups had any voting or veto power on what was eventually filed at the Commission.

d. If not, explain why not.

A-6. In 2000, the Companies established the DSM Advisory Group, which provides a forum for open communication and sharing of information to benefit the customers served by the Companies' DSM-EE programs. The DSM Advisory Group does not have any voting or veto power in regards to the contents of the Companies' current DSM Application.

The Commission has explained:

> KRS 278.285, under which the Companies' application was filed, does not require that a utility's DSM programs be developed through a collaborative process. Rather, the Commission must only consider the extent to which customer representatives were involved in the development of such programs and their support for the programs. Whether DSM programs are developed through a

collaborative process or with input from an advisory group is an issue to be resolved by the Companies and the interested parties.[1]

a. The DSM Advisory Group provided input and feedback related to the DSM application. They did not have any other involvement prior to filing.

b. Yes, the Companies have voluntarily convened a number of collaborative groups in the past three years.

c. The three collaborative groups (AMS, LED Lighting, and Electric Bus) that were the outcome of the settlement in the last rate case were established to discuss issues and concerns among the parties regarding those topics. As such, they were not developed to have voting or veto power, but to provide input and have discussions for consideration by the Companies when developing filings and determining policy. The preceding list contains the most recent collaborative groups and is not meant to be an exhaustive list of all groups which may have been formed over the past three years; however, any groups formed would not have been developed to have voting or veto power. Instead, they would have been formed to provide input and discussions for the Companies' consideration when developing filings and determining policy.

d. The Companies believe the role of their advisory and collaborative groups is to share information and views with the Companies. The Companies are ultimately responsible for their filings and for providing safe, reliable, and reasonable-cost service to their customers, subject to regulation by the Commission. Therefore, the Companies cannot delegate decision-making responsibility to advisory or collaborative group participants.

[1] *See In the Matter of the Joint Application of the Louisville Gas and Electric Company and Kentucky Utilities Company for the Review, Modification, and Continuation of DSM Programs and Cost Recovery Mechanisms*, Case No. 2000-00459, Order at 8 (May 11, 2001).

**LOUISVILLE GAS AND ELECTRIC COMPANY
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**Response to the Attorney General's Initial Data Requests
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Question No. 7

Witness: Stuart A. Wilson

Q-7. Explain the avoided capacity costs and avoided energy costs that the Company used in calculating and conducting the California cost efficiency tests.

A-7. The Companies' avoided capacity cost is zero dollars because the Companies will not have a need for new generating capacity for at least 30 years, absent unit retirements and based on current load projections and the reserve margin range established in their 2014 IRP (i.e., 16% to 21%).

The avoided energy costs are hourly marginal costs from the Companies' current business planning model. The 20-year average of the hourly marginal costs is $0.028/kWh, as described on page 9 of Exhibit GSL-1.