

RECEIVED

Mr. Jeff DeRouen Executive Director Kentucky Public Service Commission 211 Sower Boulevard Frankfort, Kentucky 40601

FEB 1 0 2012 PUBLIC SERVICE COMMISSION

#### Louisville Gas and Electric Company

State Regulation and Rates 220 West Main Street PO Box 32010 Louisville, Kentucky 40232 www.lge-ku.com

Rick E. Lovekamp Manager Regulatory Affairs T 502-627-3780 F 502-627-3213 rick.lovekamp@lge-ku.com

February 10, 2012

## **RE:** Request of Louisville Gas and Electric Company to Cancel and Withdraw the Tariffs for Its Responsive Pricing and Smart Metering Pilot Program - Case No. 2011-00440

Dear Mr. DeRouen:

As discussed in the informal conference held in the above-captioned proceeding on January 17, 2012, enclosed please find Louisville Gas and Electric Company's summary of the results of the sub-pilot involving employees of General Electric. In addition, attached is the Transition Plan and draft communications to customers describing the transition process to conclude its three-year Responsive Pricing and Smart Meter Pilot. Following your review of this information, the Company respectfully requests the Commission to issue an Order at its earliest convenience terminating the pilot. Of course, if the Commission has any questions or needs additional information, please feel free to contact me directly.

Should you have any questions regarding the enclosed, please do not hesitate to contact me.

Sincerely,

ich E Konekamp

Rick E. Lovekamp

### **COMMONWEALTH OF KENTUCKY**

### BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

REQUEST OF LOUISVILLE GAS AND ELECTRIC	)
COMPANY TO CANCEL AND WITHDRAW THE	) CASE NO. 2011-00440
TARIFFS FOR ITS RESPONSIVE PRICING AND	)
SMART METERING PILOT PROGRAM	)

### LOUISVILLE GAS AND ELECTRIC COMPANY

# RESPONSE TO THE COMMISSION STAFF'S INFORMAL CONFERENCE

## DATED JANUARY 17, 2012

GE SUMMARY REPORT

FILED: FEBRUARY 10, 2012

By Order dated July 12, 2007, the Kentucky Public Service Commission ("Commission") approved a three-year Responsive Pricing and Smart Meter pilot program ("Pilot") for an initial term of three years that would serve up to two thousand customers. Louisville Gas and Electric Company ("LG&E") filed a motion on September 15, 2008 to amend the July 12, 2007 Order to incorporate up to an additional fifteen customers to the approved tariff. The additional customers were to be employees of General Electric Company ("GE") located on the same routes as the other Pilot customers. The request was made to cooperate with GE's effort to promote and test demand side management-ready appliances in the employees' homes. The smart equipment provided by LG&E to the GE employees was identical to the other customers participating in the Pilot. The Commission's Order dated October 7, 2008 granted authority to include the additional GE employees.

GE equipped the participants with a suite of first generation GE "smart" appliances to replace their standard appliances. In most cases, this included a refrigerator, range, microwave, dishwasher and a laundry pair. Moreover, LG&E installed a programmable communicating thermostat and an in-home energy usage display in the participants' homes, as well as a smart meter.

In-home devices and "smart" appliances received a signal from the smart meter which alerted the participants when high and critical peak pricing periods were in effect. The appliances were programmed to avoid energy usage during that time or operate on a lower wattage.

GE identified only eleven employees as residing on the six routes utilizing the Pilot's smart metering and communications infrastructure. These eleven participants were enrolled in the program before the end of 2008. Currently, only six customers remain on the Responsive Pricing rate; others elected to return to the standard rate due to the following reasons: one customer reported no longer being employed by GE; one customer installed a new suite of home appliances; three customers reported lack of expected bill savings and did not want to continue participating.

Because the GE customers were added at the end of 2008, the only opportunity to evaluate their meter data was during 2009 and 2010 summer analysis.

The GE group showed the largest reductions during the CPP periods during the summer of 2010 with the maximum average load reduction of 1.83 kW recorded at hour 15:00. On average the GE group demonstrated load reductions of 0.85 kW more than the Responsive Pricing customer group. The combination of smart appliances with the Responsive Pricing program allowed the customers to reduce demand on the LG&E system; however GE customers demonstrated an average increase in load ranging from 1.5 kW to 2.0 kW following the end of the critical peak pricing period. Therefore, the bounce-back effect for GE customers was more pronounced than for Responsive Pricing customers. This is believed to be attributed to all appliances coming back online instantaneously after the last hour of a CPP event. It should be noted that the appliances

which GE customers used in the Pilot were first generation GE smart appliances. GE has indicated that the latest generation of smart appliances being developed incorporates methods designed to mitigate the bounce-back effect.

Analysis of the billing cycles of June and September for the GE customers on the Responsive Pricing rate and the typical residential customer on the standard rate demonstrated an average difference of approximately \$4 per month in favor of GE customers.

Based on the overall assessment, LG&E found a considerably encouraging effect of smart appliances paired with the Responsive Pricing program. Nevertheless, LG&E recognizes that the true overall impact of such demand response structure on the system was not substantiated given the very small sample size of GE group used in the Pilot analysis.

### COMMONWEALTH OF KENTUCKY

## BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

<b>REQUEST OF LOUISVILLE GAS AND ELECTRIC</b>	)
COMPANY TO CANCEL AND WITHDRAW THE	) CASE NO. 2011-00440
TARIFFS FOR ITS RESPONSIVE PRICING AND	)
SMART METERING PILOT PROGRAM	)

### LOUISVILLE GAS AND ELECTRIC COMPANY

# RESPONSE TO THE COMMISSION STAFF'S INFORMAL CONFERENCE

## DATED JANUARY 17, 2012

TRANSITION PLAN

FILED: FEBRUARY 10, 2012

## 1 Overview

Louisville Gas and Electric Company ("LG&E") has completed a three-year Responsive Pricing and Smart Meter pilot program ("Pilot"). Pending Commission approval, LG&E plans to communicate the end of the Pilot with the remaining Responsive Pricing customers and reinstate these customers on standard rate schedule.

# 2 Scope

The purpose of this customer transition plan is to lay out the tasks and activities that need to take place to (1) move existing Pilot program participants from the Responsive Pricing tariff to the standard tariff and (2) inform the customers of the impact on their in-home devices.

LG&E plans to notify remaining Responsive Pricing customers of the conversion to the standard tariff through letter mail, e-mail and automated phone calls to ensure all program participants are informed. LG&E will then transition customers' accounts to standard rate schedule in accordance with their respective billing cycle.

In-home devices obtained by customers participating on the pilot program will continue to operate until LG&E replaces smart meters through regular operational procedures or required maintenance measures. Once the meter is replaced, in-home display device and load control switch will lose their core functionality, while the smart thermostat will maintain the functionality and features of a standard programmable thermostat only. Hence, LG&E plans to notify all affected customers that it will accept device returns but will not seek to retrieve these devices.

# 3 Transition Schedule, Tasks and Activities

Pending the Kentucky Public Service Commission order to terminate the Pilot by the end of February 2012, LG&E would initiate the transition process as described below.

On March 1, 2012, LG&E will mail a letter of communication to sixty-eight Responsive Pricing participants and two hundred customers equipped with in-home devices, but not participating on the Responsive Pricing rate. Simultaneously, LG&E will route the same messaging to the aforementioned customers via e-mail and telephone to ensure completeness of communication. A copy of proposed messaging can be found in Exhibit 1.

On April 1, 2012, LG&E will initiate the transition of customer accounts from Responsive Pricing rate schedule to the standard rate schedule. LG&E will first verify scheduled periodic meter reading for each of the Responsive Pricing customers' accounts and then perform a register and a rate code change within the customer information enterprise system. Following this change, LG&E will verify customers' next bill on the standard rate to ensure successful rate

change-over. LG&E estimates that the rate conversion for all sixty-eight customers may take up to 5 days.

Throughout the efforts described above, LG&E will address all customer requests through a dedicated telephone line and an e-mail address, which will be provided to all customers as part of the planned messaging. In addition, customers who choose to return in-home devices will be supplied instructions with an appropriate drop-off address. LG&E will plan to finalize the transition process by May 1, 2012.

The meters used in the pilot program maintain the same recording and measurement capabilities of a typical electric service meter. LG&E has already started collecting meter reads through normal meter reading operations and will continue to do so. LG&E will replace the meters through regular meter exchanges.

## 4 Transition Impact

Given the very concise nature of the transition period and its minimal complexity, LG&E expects the transition implementation to have no operational, technological or organizational impact.

## 5 Review Process

LG&E will conduct an in-process review (i.e., verification and validation or peer review) to identify and remove any defects from the transition plan before it is initiated and during the process. This review will be conducted by the appropriate members of the LG&E team. Subsequent changes will be tracked to ensure that the configuration of the transition plan information is known at all times.

### LETTER TO 68 SMART METER PILOT PROGRAM CUSTOMERS (ON SMART RATE WITH IN-HOME DEVICES)

March 2012

Dear Smart Meter Pilot Program Participant:

Last July, we notified you about the conclusion of the three-year Smart Meter Pilot program and that we had filed our final report with the Kentucky Public Service Commission (KPSC). Our report included a summary of our program findings and a recommendation to discontinue the program. We gained valuable information during the past three years and sincerely appreciate your participation in the pilot program.

On <INSERT DATE>, we received an Order from the KPSC indicating their acceptance of our report and approving our request to discontinue the program.

What does this mean for you as a Smart Meter Pilot Program participant? It means that effective <April 1, 2012>, we will no longer offer the Smart Rate. On April 1, we will transition your account from the Smart Rate plan to our standard Residential Service rate. If you're looking for ways to replace the savings you may have realized on your bill as a result of the Smart Rate, we invite you to consider signing up for our Demand Conservation program. With Demand Conservation, you will receive bill credits totaling \$20 or more each summer for each central air conditioning unit, electric water heater and/or pool pump switch we install.

What about your equipment? You do not need to return any of the equipment you received as a Smart Meter pilot program participant. If you choose, you may continue to use the programmable thermostat we installed when you signed up for the Smart Meter pilot program. Because we are ending the Smart Meter program, we will no longer be able to offer support or service for the thermostat.

Your other equipment (in-home display and load control switch(es) on your water heater and/or pool pump) will continue to operate until we need to replace your meter under our standard operating and maintenance practices. You can dispose of these pieces, including the thermostat if you choose to replace it. Many recycling centers accept electronic devices; you can visit <u>www.earth911.org</u> for a location near you. Ultimately, these devices are yours to dispose of as you wish or you may return them to us for disposal.

We also want you to know we're expanding and enhancing our energy efficiency programs. If saving energy is important to you, visit our website at <u>www.lge-ku.com/savingenergy</u> to learn more about the programs we offer.

Please contact us at 627-4252 or by email at <u>smart.rate@lge-ku.com</u> if you have any questions.

We cannot thank you enough for participating in the LG&E Smart Meter pilot program. The information we gained by offering this pilot program will help us evaluate other options we can offer in the future.

Sincerely,

Mah JE. Humany

Michael E. Hornung Manager, Energy Efficiency Planning and Development

### LETTER TO 200 SMART METER PILOT PROGRAM CUSTOMERS (WITH IN-HOME DEVICES)

March 2012

Dear Smart Meter Pilot Program Participant:

Last July, we notified you about the conclusion of the three-year Smart Meter Pilot program and that we had filed our final report with the Kentucky Public Service Commission (KPSC). Our report included a summary of our program findings and a recommendation to discontinue the program. We gained valuable information during the past three years and sincerely appreciate your participation in the pilot program.

On <INSERT DATE>, we received an Order from the KPSC indicating their acceptance of our report and approving our request to discontinue the program.

What does this mean for you as a Smart Meter Pilot Program participant? It means that effective <April 1, 2012>, we will no longer offer the Smart Meter pilot program.

What about your equipment? You do not need to return any of the equipment you received as a Smart Meter pilot program participant. If you choose, you may continue to use the programmable thermostat we installed when you signed up for the Smart Meter pilot program. Because we are ending the Smart Meter program, we will no longer be able to offer support or service for the thermostat.

Your other equipment (in-home display and load control switch(es) on your water heater and/or pool pump) will continue to operate until we need to replace your meter under our standard operating and maintenance practices. You can dispose of these pieces, including the thermostat if you choose to replace it. Many recycling centers accept electronic devices; you can visit <u>www.earth911.org</u> for a location near you. Ultimately, these devices are yours to dispose of as you wish or you may return them to us for disposal.

We also want you to know we're expanding and enhancing our energy efficiency programs. If saving energy is important to you, visit our website at <u>www.lge-ku.com/savingenergy</u> to learn more about the programs we offer.

Please contact us at 627-4252 or by email at <u>smart.rate@lge-ku.com</u> if you have any questions.

We cannot thank you enough for participating in the LG&E Smart Meter pilot program. The information we gained by offering this pilot program will help us evaluate other options we can offer in the future.

Sincerely,

Mah Je. Humany

Michael E. Hornung

Manager, Energy Efficiency Planning and Development



Smart Meter Pilot Program Ending – Automated Outbound Call (Before Letter)

This is the LG&E Smart Meter Pilot Program calling with some important information. We are mailing you a letter, which you should receive in the next couple of days. Please watch for the letter as it contains important details about the steps we will take to end the program and what you should do with your Smart Meter equipment. Please call us at 627-4252 if you have any questions. Again, that's 627-4252. You can also email the Smart Meter pilot program mailbox at smart <dot> rate at lge <dash> ku <dot> com. Again, that's smart <dot> rate at lge <dash> ku <dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku <dot> com. Again, that's smart <dot> rate at lge <dash> ku <dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> rate at lge <dash> ku </dot> com. Again, that's smart <dot> com. Again, that's smart <dot>

Smart Meter Pilot Program Ending – Automated Outbound Call (After Letter)

This is the LG&E Smart Meter Pilot Program calling with some important information. By now you should have received a letter from us. In the letter we provided important details about the steps we will take to end the program and what you should do with your Smart Meter equipment. Please call us at 627-4252 if you have any questions. Again, that's 627-4252. You can also email the Smart Meter pilot program mailbox at smart <dot> rate at lge <dash> ku <dot> com. Again, that's smart <dot> com. Again, that's smart <dot> rate at lge <dash> ku <dot> com. Smart Meter pilot program.