BEFORE THE CORPORATION COMMISSION OF THE STATE OF OKLAHOMA

| | |
|---|---|
| IN THE MATTER OF THE APPLICATION OF OKLAHOMA GAS AND ELECTRIC COMPANY FOR AN ORDER OF THE COMMISSION AUTHORIZING APPLICANT TO MODIFY ITS RATES, CHARGES, AND TARIFFS FOR RETAIL ELECTRIC SERVICE IN OKLAHOMA | CAUSE NO. PUD 201700496 |

FILED
MAY 16 2018
COURT CLERK'S OFFICE - OKC
CORPORATION COMMISSION
OF OKLAHOMA

Responsive Testimony and Exhibit of

**Michael P. Gorman**

**Managing Principal**

**Brubaker & Associates, Inc.**

On behalf of

**Federal Executive Agencies**

May 16, 2018

## Table of Contents for the
## Responsive Testimony of Michael P. Gorman


**Page**

I. Revenue Spread ..... 5

II. Class Cost of Service ..... 7

III. Rate LPL TOU Proposed Rate Design ..... 8

Qualifications of Michael P. Gorman ..... 15

Exhibit MPG-1

**BEFORE THE CORPORATION COMMISSION OF THE STATE OF OKLAHOMA**

| | | |
|---|---|---|
| **IN THE MATTER OF THE APPLICATION OF OKLAHOMA GAS AND ELECTRIC COMPANY FOR AN ORDER OF THE COMMISSION AUTHORIZING APPLICANT TO MODIFY ITS RATES, CHARGES, AND TARIFFS FOR RETAIL ELECTRIC SERVICE IN OKLAHOMA** | ) | **CAUSE NO. PUD 201700496** |

## Responsive Testimony of Michael P. Gorman

**Q PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

A Michael P. Gorman. My business address is 16690 Swingley Ridge Road, Suite 140, Chesterfield, MO 63017.

**Q WHAT IS YOUR OCCUPATION?**

A I am a consultant in the field of public utility regulation and a Managing Principal of Brubaker & Associates, Inc. ("BAI"), energy, economic and regulatory consultants.

**Q PLEASE DESCRIBE YOUR EDUCATIONAL BACKGROUND AND EXPERIENCE.**

A This information is provided in Appendix A to this testimony.

**Q ON WHOSE BEHALF ARE YOU APPEARING IN THIS PROCEEDING?**

A I am testifying on behalf of the Federal Executive Agencies ("FEA"), consisting of certain agencies of the United States government which have offices, facilities, and/or

installations in the service area of Oklahoma Gas and Electric Company ("OG&E" or "Company"), from whom they purchase electricity and energy services.

**Q WHAT IS THE SUBJECT OF YOUR TESTIMONY?**

A My testimony addresses the following:

1. The Company's filed jurisdictional and class cost of service study ("COSS") and allocation methods used therein.

2. The spread of revenue over rate classes should move toward cost of service.

3. Opposition to OG&E's proposed changes to the service voltage level subclass demand charges within Rate Large Power and Light Time of Use ("LPL TOU"). OG&E's proposed adjustments to demand charges do not reflect cost of service.

My silence in regard to any other matter raised by the Company does not constitute agreement with same.

**Q PLEASE PROVIDE A SUMMARY OF YOUR RECOMMENDATIONS AND CONCLUSIONS.**

A My recommendations and conclusions are as follows:

1. OG&E's proposed jurisdictional and class COSS allocation methods are reasonable. OG&E's proposed production Average and Excess four coincident peak ("A&E 4CP") method used in both the jurisdictional and class COSS places significant emphasis on the utility's summer coincident peaks. OG&E's proposed transmission 12CP jurisdictional and 4CP retail allocation methods are correctly allocated 100% on a demand basis. Finally, OG&E's proposed retail distribution cost allocation method appropriately recognizes the combined customer and demand components of cost incurrence for distribution assets.

2. I recommend OG&E's class COSS be used to make a movement toward cost of service for all rate classes. OG&E's COSS produces reasonable results in this proceeding. Therefore, the Commission should adjust all rates to move each rate class closer to cost of service.

3. In its proposed rate design, OG&E is proposing a reduction in the demand charge spread between the LPL TOU Service Level 1 customers and the LPL TOU Service Level 5 customers. I oppose OG&E's proposed rate design and a contraction of this demand charge spread because it does not follow cost of service. As explained in my testimony, allocation of the demand-related costs to the LPL TOU subclasses, in recognition of the difference in costs for distribution-

related service, suggests that the current demand charge spread between Service Level 1 and Service Level 5 is already too small. Therefore, OG&E's proposal to reduce the Service Level 1 and Service Level 5 demand charge spread is unjust and unreasonable, and does not follow cost causation.

## I. Revenue Spread

**Q DID OG&E PRODUCE A SCHEDULE OR WORKPAPER THAT SHOWS ITS PROPOSED SPREAD OF ITS CLAIMED REVENUE DEFICIENCY IN THIS PROCEEDING?**

A Yes. OG&E witness William Wai included a proposed revenue allocation workpaper in his rate design and COSS workpapers. Major components of those proposed cost of service results and proposed revenue spread are summarized in Table 1 below.

**TABLE 1**

**OG&E's Proposed Revenue Distribution**

| Line | Rate Class | Base Non-Fuel Revenue at Current Rates (1) | Increase / (Decrease) to Reach Cost of Service Amount (2) | Increase / (Decrease) to Reach Cost of Service Percent (3) | OG&E Proposed Increase / (Decrease) Amount (4) | OG&E Proposed Increase / (Decrease) Percent (5) |
|---|---|---|---|---|---|---|
| 1 | RS | $ 580,220,547 | $ 24,818,455 | 4.3% | $ - | 0.0% |
| 2 | GS | 122,615,439 | (5,458,326) | -4.5% | - | 0.0% |
| 3 | OGP | 10,441,351 | (2,426,367) | -23.2% | - | 0.0% |
| 4 | PS-S | 11,377,753 | 1,814,127 | 15.9% | - | 0.0% |
| 5 | PS-L | 7,289,758 | 596,994 | 8.2% | - | 0.0% |
| 6 | PL | 174,680,437 | (9,789,917) | -5.6% | - | 0.0% |
| 7 | PL TOU | 104,511,606 | (2,435,500) | -2.3% | - | 0.0% |
| 8 | LPL TOU | 128,985,686 | (7,103,351) | -5.5% | - | 0.0% |
| 9 | MP | 4,114,374 | (229,494) | -5.6% | - | 0.0% |
| 10 | Lighting | 30,024,526 | 2,073,892 | 6.9% | 1,860,513 | 6.2% |
| 11 | Total Retail | $ 1,174,261,477 | $ 1,860,513 | 0.2% | $ 1,860,513 | 0.2% |

As shown above, OG&E is proposing an increase in the Lighting class but is not proposing increases in any other rate classes. Importantly, however, OG&E's proposed COSS states that the Residential class needs a 4.3% increase to be at cost

of service, the Public Schools – Small (Non-Demand) ("PS-S") class needs an increase of 15.9% to move to cost of service, and the Public Schools – Large (Demand) ("PS-L") class needs an 8.2% increase to move to cost of service.

**Q DO YOU BELIEVE THAT THE COMPANY'S PROPOSED SPREAD OF ITS REVENUE INCREASE IS REASONABLE?**

A No. The Company's proposed spread does move the Lighting class closer to cost of service, but it fails to move the Residential, PS-S and PS-L classes toward cost of service. For these reasons, I believe the Company's proposed spread fails to move all rate classes closer to cost of service.

**Q DO YOU BELIEVE THAT THE COMMISSION SHOULD MAKE AN EFFORT TO MOVE RATES CLOSER TO COST OF SERVICE IN THIS PROCEEDING?**

A Yes. I recommend a movement toward cost of service for all rate classes. A nominal increase of approximately 3.0% for classes priced below cost of service can allow for a moderate increase in these rate classes, and allow for reductions and movement toward cost of service, for the rate classes that are priced above cost of service. As such, I recommend a 3.0% increase to the Residential, PS-S and PS-L classes. This increased revenue then can be used to reduce rates across the other rate classes that are currently priced above cost of service. My recommended revenue spread of the Company's claimed revenue deficiency is shown below in Table 2.

**TABLE 2**

**FEA Proposed Revenue Distribution**

| Line | Rate Class | Base Non-Fuel Revenue at Current Rates (1) | Increase / (Decrease) to Reach OGE's Cost of Service Amount (2) | Increase / (Decrease) to Reach OGE's Cost of Service Percent (3) | FEA Proposed Increase / (Decrease) Amount (4) | FEA Proposed Increase / (Decrease) Percent (5) |
|---|---|---|---|---|---|---|
| 1 | RS | $ 580,220,547 | $ 24,818,455 | 4.3% | $ 17,406,616 | 3.0% |
| 2 | GS | 122,615,439 | (5,458,326) | -4.5% | (4,319,865) | -3.5% |
| 3 | OGP | 10,441,351 | (2,426,367) | -23.2% | (367,859) | -3.5% |
| 4 | PS-S | 11,377,753 | 1,814,127 | 15.9% | 341,333 | 3.0% |
| 5 | PS-L | 7,289,758 | 596,994 | 8.2% | 218,693 | 3.0% |
| 6 | PL | 174,680,437 | (9,789,917) | -5.6% | (6,154,168) | -3.5% |
| 7 | PL TOU | 104,511,606 | (2,435,500) | -2.3% | (2,435,500) | -2.3% |
| 8 | LPL TOU | 128,985,686 | (7,103,351) | -5.5% | (4,544,296) | -3.5% |
| 9 | MP | 4,114,374 | (229,494) | -5.6% | (144,954) | -3.5% |
| 10 | Lighting | 30,024,526 | 2,073,892 | 6.9% | 1,860,513 | 6.2% |
| 11 | Total Retail | $ 1,174,261,477 | $ 1,860,513 | 0.2% | $ 1,860,513 | 0.2% |

While this proposed spread is based on the Company's claimed revenue deficiency, it should be adjusted to reflect the Commission's final determination of the appropriate revenue requirement in this proceeding. If the Commission determines that a revenue decrease is appropriate, then a continued movement toward cost of service would be appropriate even if that means increases to the Residential, PS-S and PS-L classes in order to accomplish the objective of gradually moving customer classes toward cost of service.

## II. Class Cost of Service

**Q DO YOU HAVE ANY CONCERNS WITH THE COMPANY'S COSS?**

A No. I generally believe the Company's class COSS is reasonable and accurately allocates OG&E's costs across its customer rate classes.

## III. Rate LPL TOU Proposed Rate Design

**Q PLEASE SUMMARIZE YOUR CONCERN WITH OG&E'S PROPOSED LPL TOU DEMAND CHARGES.**

A I am concerned with the Company's proposed design of the LPL TOU rate subclasses because it is proposing a contraction in the difference between demand charges for LPL TOU Service Level 1 customers, compared to Service Level 5 customers. I do not believe that this proposed change is cost justified. I show the current and proposed LPL TOU demand charges in Table 3 below.

**TABLE 3**

**LPL TOU**
**Demand Charges**
**($/kW-month)**

| Service Level | Current Amount (1) | Current Spread (2) | Proposed Amount (3) | Proposed Spread (4) |
|---|---|---|---|---|
| 1 | $6.74 | | $6.75 | |
| 2 | $7.13 | $0.39 | $7.14 | $0.39 |
| 3 | $8.12 | $1.38 | $8.14 | $1.39 |
| 4 | $8.15 | $1.41 | $8.15 | $1.40 |
| 5 | $11.15 | $4.41 | $10.36 | $3.61 |

Source: Direct Testimony of William H. Wai at 17-19.

**Q WHY DO YOU BELIEVE THE COMPANY'S OWN COSS SHOWS THAT THE DEMAND SPREAD BETWEEN SERVICE LEVEL 1 AND SERVICE LEVEL 5 SHOULD NOT BE REDUCED IN THE PROPOSED RATES?**

A The current spread between Service Level 1 and Service Level 5 is $4.41/kW-month. This existing spread is already too small to reflect only the difference in distribution

charges between these two service levels. That is, OG&E's own data indicates that the distribution charge cost difference between Service Level 1 and Service Level 5 is $4.60/kW-month. Mr. Wai's proposal to reduce the Service Level 5 spread to $3.61/kW-month is in direct contradiction to his cost of service.

Service Level 1 takes service directly from the transmission system, with no distribution charges. In contrast, Service Level 5 takes service at a secondary delivery voltage, which requires service under all of the Company's distribution subsystem including subtransmission, primary, and secondary voltage delivery components. Hence, the cost differential for distribution service alone supports a demand spread between Service Level 1 and Service Level 5 of $4.60/kW-month.

The existing demand spread between Service Level 1 and Service Level 5 is too small to capture this difference in distribution delivery costs alone. However, the full cost of demand charge difference between Service Level 1 and Service Level 5 includes this distribution cost distinction but also differences in production and transmission losses which also equate to a material cost to OG&E to serve LPL TOU customers across its five service levels.

**Q HOW DID YOU CALCULATE THE DISTRIBUTION COST DIFFERENTIAL THAT SHOULD EXIST BETWEEN EACH OF THE LPL TOU SERVICE VOLTAGE LEVEL SUBCLASSES?**

A I used the Company's distribution cost allocation across service levels for the LPL TOU class included within its Schedule K COSS.

As shown on my Exhibit MPG-1, lines 7-12, I divide the total distribution COSS revenue amounts allocated to each LPL TOU subclass in OG&E's Schedule K COSS by the subclass distribution billing demands at the meter. Column C shows the calculated class distribution demand charge. Column D then shows the

distribution charge adder for each LPL TOU service voltage subclass from the transmission level distribution charge.

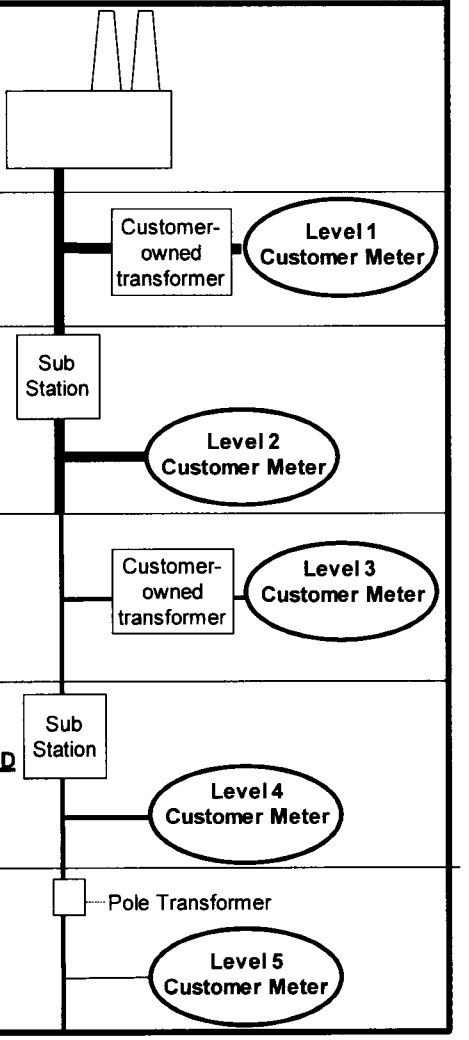
**Q PLEASE DESCRIBE THE ADDITIONAL DEMAND COST DIFFERENTIALS FOR LPL TOU SERVICE LEVELS RELATED TO LOSS FACTORS.**

A The demand spread and prices should also reflect OG&E's costs created by losses as production and transmission ("P&T") capacity is produced at the generator, and delivered to the service level meter. These P&T cost adjustments are referred to as delivery losses. Losses occur between the generator and customer meter for both demand and energy because electrical energy is lost in transmission and distribution delivery of demand/energy and caused by voltage transformations, and the heating of conductor wire. Both of these factors consume electricity in the transmission and distribution process and are described as losses.

This loss factor structure is illustrated below in Figure 1.

## Figure 1
## Oklahoma Gas & Electric
## Demand and Energy Losses

| METERED DEMAND | METERED ENERGY | FUNCTION |
|---|---|---|
| 100 kW | 100 kWh | **GENERATION** |
| 97.73 kW | 97.90 kWh | **SERVICE LEVEL 1**<br>**TRANSMISSION**<br>50,000 Volts<br>and greater |
| 95.17 kW | 97.23 kWh | **SERVICE LEVEL 2**<br>**SUBTRANSMISSION**<br>Greater than 2,000 Volts<br>Less than 50,000 Volts |
| 92.31 kW | 96.11 kWh | **SERVICE LEVEL 3**<br>**DIRECT DISTRIBUTION**<br>Greater than 2,000 Volts<br>Less than 50,000 Volts |
| 91.03 kW | 94.05 kWh | **SERVICE LEVEL 4**<br>**DISTRIBUTION TRANSFORMED**<br>Greater than 2,000 Volts<br>Less than 50,000 Volts |
| 92.10 kW | 92.78 kWh | **SERVICE LEVEL 5**<br>**SECONDARY**<br>Less than<br>2,000 Volts |




Sources: OG&E Present Tariff Sheet No. 18.04,
OG&E W/P L-7.0

As shown in Figure 1 above, in order to deliver 1 kW of demand to a Service Level 1 meter, OG&E will have to produce about 1.023 kW[1] at the generation level. Similarly, in order to deliver 1 kW of demand at the Service Level 5 secondary meter

[1] 100 kW ÷ 97.73 kW = 1.023 kW.

level, OG&E will have to produce 1.0858 kW[2] at the generation level. These additional costs for losses must be reflected in the demand pricing levels for Service Levels 1 through 5.

**Q HOW SHOULD DEMAND CHARGES BETWEEN ALL LPL TOU SERVICE LEVELS REFLECT THE LOSS DIFFERENCES?**

A The differences, as noted above, relate to delivery of P&T costs from the cost source to the actual customer meter.

The differences in P&T demand for each service level can be estimated by first identifying the amount of allocated P&T cost of the LPL TOU class. The second step would be converting each of the metered demands by losses up to the demand at generation level then estimating the amount of P&T cost on a kW-month basis for the class at generation level. The final step would simply be taking this generation level P&T demand allocated to the LPL TOU rate and convert it to a metered price reflecting losses between generation and the meter.

OG&E's allocated P&T cost to the LPL TOU class is approximately $113.2 million. All the demand billing units for Service Levels 1-5, adjusted by losses to the generation level, produce an LPL TOU demand at generation level of approximately 13 million kW per year. This is developed on my Exhibit MPG-1, lines 1-6. The resulting cost for the LPL TOU class for P&T service is $8.70/kW-month.

Next, the LPL TOU class P&T cost at generation level to a cost at the delivery meter requires an adjustment for each of the delivery voltage losses. As shown on my Exhibit MPG-1 and Table 4 below, using OG&E's demand loss factors by delivery voltage produces a P&T cost for each LPL TOU Service Level 1 through Service Level 5.

[2] 100 kW ÷ 9.2.10 kW = 1.0858 kW.

**TABLE 4**

**Development of Loss Adjusted**
**Fixed Production & Transmission Demand Charge Component**

| SL | Delivery Voltage | P&T Demand Charge at Generation[1] (A) | Demand Loss Factor[2] (B) | Loss Adjusted Demand at Meter (C) = (A) / [1-(B)] | Difference from Transm. Voltage (D) |
|---|---|---|---|---|---|
| 1 | Transmission | $8.70 | 2.27% | $8.90 | |
| 2 | Subtrans. | $8.70 | 4.83% | $9.14 | $0.24 |
| 3 | Direct Dist. | $8.70 | 7.69% | $9.42 | $0.52 |
| 4 | Dist. Transfmd | $8.70 | 8.97% | $9.55 | $0.65 |
| 5 | Secondary | $8.70 | 7.90% | $9.44 | $0.54 |

Sources:
1. Exhibit MPG-1, col. E, ln 6
2. W/P L-7.0

As illustrated in the table above, simply reflecting a uniform demand cost at generation for the LPL TOU subclasses but adjusting that demand charge for losses across the five service levels produces a different cost at the customer meter for P&T demand allocated to the LPL TOU class. The spread between Service Level 1 and Service Level 5 is around $0.54/kW-month. That would be in the addition to the $4.60/kW-month differential for differences in distribution service.

**Q PLEASE SUMMARIZE YOUR PROPOSALS AS THEY RELATE TO RATE DESIGN FOR LPL TOU RATES.**

A I recommend that OG&E's proposal to spread the cost of service increase allocated to LPL TOU Service Levels 1 through 5 be denied. OG&E pricing changes are not cost based, and in fact move in opposition to cost of service. The proposed price changes do not reflect differences in distribution costs, or differences in delivery voltage losses.

I recommend that the Commission simply maintain the existing spread in demand charges between Service Level 1 and Service Level 5 as well as the spread between energy charges for these service levels. Should the Commission decide to either leave rates alone or to decrease them depending on its revenue requirement findings, I recommend a uniform percent change to all service level demand and non-fuel energy rates be made to adjust LPL TOU rates to the assignment of this class's cost of service.

**Q DOES THIS CONCLUDE YOUR RESPONSIVE TESTIMONY?**

A Yes, it does.

## Qualifications of Michael P. Gorman

**Q PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

A Michael P. Gorman. My business address is 16690 Swingley Ridge Road, Suite 140, Chesterfield, MO 63017.

**Q PLEASE STATE YOUR OCCUPATION.**

A I am a consultant in the field of public utility regulation and a Managing Principal with the firm of Brubaker & Associates, Inc. ("BAI"), energy, economic and regulatory consultants.

**Q PLEASE SUMMARIZE YOUR EDUCATIONAL BACKGROUND AND WORK EXPERIENCE.**

A In 1983 I received a Bachelor of Science Degree in Electrical Engineering from Southern Illinois University, and in 1986, I received a Master's Degree in Business Administration with a concentration in Finance from the University of Illinois at Springfield. I have also completed several graduate level economics courses.

In August of 1983, I accepted an analyst position with the Illinois Commerce Commission ("ICC"). In this position, I performed a variety of analyses for both formal and informal investigations before the ICC, including: marginal cost of energy, central dispatch, avoided cost of energy, annual system production costs, and working capital. In October of 1986, I was promoted to the position of Senior Analyst. In this position, I assumed the additional responsibilities of technical leader on projects, and my areas of responsibility were expanded to include utility financial modeling and financial analyses.

In 1987, I was promoted to Director of the Financial Analysis Department. In this position, I was responsible for all financial analyses conducted by the Staff. Among other things, I conducted analyses and sponsored testimony before the ICC on rate of return, financial integrity, financial modeling and related issues. I also supervised the development of all Staff analyses and testimony on these same issues. In addition, I supervised the Staff's review and recommendations to the Commission concerning utility plans to issue debt and equity securities.

In August of 1989, I accepted a position with Merrill-Lynch as a financial consultant. After receiving all required securities licenses, I worked with individual investors and small businesses in evaluating and selecting investments suitable to their requirements.

In September of 1990, I accepted a position with Drazen-Brubaker & Associates, Inc. ("DBA"). In April 1995, the firm of Brubaker & Associates, Inc. was formed. It includes most of the former DBA principals and Staff. Since 1990, I have performed various analyses and sponsored testimony on cost of capital, cost/benefits of utility mergers and acquisitions, utility reorganizations, level of operating expenses and rate base, COSS, and analyses relating to industrial jobs and economic development. I also participated in a study used to revise the financial policy for the municipal utility in Kansas City, Kansas.

At BAI, I also have extensive experience working with large energy users to distribute and critically evaluate responses to requests for proposals ("RFPs") for electric, steam, and gas energy supply from competitive energy suppliers. These analyses include the evaluation of gas supply and delivery charges, cogeneration and/or combined cycle unit feasibility studies, and the evaluation of third-party asset/supply management agreements. I have participated in rate cases on rate design and class cost of service for electric, natural gas, water and wastewater

utilities. I have also analyzed commodity pricing indices and forward pricing methods for third party supply agreements, and have also conducted regional electric market price forecasts.

In addition to our main office in St. Louis, the firm also has branch offices in Phoenix, Arizona and Corpus Christi, Texas.

**Q HAVE YOU EVER TESTIFIED BEFORE A REGULATORY BODY?**

A Yes. I have sponsored testimony on cost of capital, revenue requirements, cost of service and other issues before the Federal Energy Regulatory Commission and numerous state regulatory commissions including: Arkansas, Arizona, California, Colorado, Delaware, Florida, Georgia, Idaho, Illinois, Indiana, Iowa, Kansas, Louisiana, Michigan, Mississippi, Missouri, Montana, New Jersey, New Mexico, New York, North Carolina, Ohio, Oklahoma, Oregon, South Carolina, Tennessee, Texas, Utah, Vermont, Virginia, Washington, West Virginia, Wisconsin, Wyoming, and before the provincial regulatory boards in Alberta and Nova Scotia, Canada. I have also sponsored testimony before the Board of Public Utilities in Kansas City, Kansas; presented rate setting position reports to the regulatory board of the municipal utility in Austin, Texas, and Salt River Project, Arizona, on behalf of industrial customers; and negotiated rate disputes for industrial customers of the Municipal Electric Authority of Georgia in the LaGrange, Georgia district.

**Q PLEASE DESCRIBE ANY PROFESSIONAL REGISTRATIONS OR ORGANIZATIONS TO WHICH YOU BELONG.**

A I earned the designation of Chartered Financial Analyst ("CFA") from the CFA Institute. The CFA charter was awarded after successfully completing three examinations which covered the subject areas of financial accounting, economics,

fixed income and equity valuation and professional and ethical conduct. I am a member of the CFA Institute's Financial Analyst Society.

# OKLAHOMA GAS AND ELECTRIC
## Calculation of LPL TOU Demand Charge Differential

***I. PRODUCTION & TRANSMISSION COST DIFFERENTIAL***

| Line | Rate LPL TOU Service Voltage | Billed Max Demand Annual kW[1] (A) | Demand Loss Factor[2] (B) | Billed Max Demand kW at Generation (C) = A / (1-B) | Total Prod. & Trans. Demand COS Revenue[3] (D) | P&T Demand Charge at Generation (E) = D / C | Class Loss Adjusted Demand Charge (F) = E / (1-B) | Demand Charge Difference from Transm. Voltage (G) | |
|---|---|---|---|---|---|---|---|---|---|
| 1 | Transmission - Level 1 | 1,147,890 | 2.27% | 1,174,552 | | | $8.90 | | |
| 2 | Subtransmission - Level 2 | 8,547,573 | 4.83% | 8,981,374 | | | $9.14 | $0.24 | |
| 3 | Direct Distribution - Level 3 | 1,555,692 | 7.69% | 1,685,291 | | | $9.42 | $0.52 | X |
| 4 | Distribution Transformed - Level 4 | 420,347 | 8.97% | 461,768 | | | $9.55 | $0.65 | |
| 5 | Secondary - Level 5 | 659,938 | 7.90% | 716,545 | | | $9.44 | $0.54 | |
| 6 | Total | 12,331,440 | | 13,019,529 | $ 113,215,947 | $8.70 | | | |

***II. DISTRIBUTION COST DIFFERENTIAL***

| Line | Rate LPL TOU Service Voltage | Total Distribution COS Revenue[3] (A) | Billed Max Demand Annual kW[1] (B) | Calculated Class Distribution Demand Charge (C) = A / B | Distribution Charge Difference from Transm. Voltage (D) | |
|---|---|---|---|---|---|---|
| 7 | Transmission - Level 1 | $ - | 1,147,890 | $0.00 | | |
| 8 | Subtransmission - Level 2 | $ 8,258,228 | 8,547,573 | $0.97 | $0.97 | |
| 9 | Direct Distribution - Level 3 | $ 4,277,872 | 1,555,692 | $2.75 | $2.75 | |
| 10 | Distribution Transformed - Level 4 | $ 1,366,770 | 420,347 | $3.25 | $3.25 | Y |
| 11 | Secondary - Level 5 | $ 3,035,416 | 659,938 | $4.60 | $4.60 | |
| 12 | Total | $ 16,938,286 | 12,331,440 | | | |

***III. TOTAL COMBINED COST DIFFERENTIAL***

| Line | Rate LPL TOU Service Voltage | Combined Demand Charge Difference from Transm. Voltage (A) = X + Y | OG&E Proposed Demand Charge (B) | OG&E Proposed Demand Charge Difference from Transm. Voltage (C) |
|---|---|---|---|---|
| 13 | Transmission - Level 1 | | $6.75 | |
| 14 | Subtransmission - Level 2 | $1.21 | $7.14 | $0.39 |
| 15 | Direct Distribution - Level 3 | $3.27 | $8.14 | $1.39 |
| 16 | Distribution Transformed - Level 4 | $3.91 | $8.15 | $1.40 |
| 17 | Secondary - Level 5 | $5.14 | $10.36 | $3.61 |

Sources:
1. W/P M-4-1
2. W/P L-7.0
3. W/P L-8.3

**BEFORE THE CORPORATION COMMISSION OF OKLAHOMA**

| | | |
|---|---|---|
| **IN THE MATTER OF THE APPLICATION OF OKLAHOMA GAS AND ELECTRIC COMPANY FOR AN ORDER OF THE COMMISSION AUTHORIZING APPLICANT TO MODIFY ITS RATES, CHARGES, AND TARIFFS FOR RETAIL ELECTRIC SERVICE IN OKLAHOMA** | ) | **CAUSE NO. PUD 201700496** |

**STATE OF MISSOURI** )
) **SS**
**COUNTY OF ST. LOUIS** )

**Affidavit of Michael P. Gorman**

Michael P. Gorman, being first duly sworn, on his oath states:

1. My name is Michael P. Gorman. I am a consultant with Brubaker & Associates, Inc., having its principal place of business at 16690 Swingley Ridge Road, Suite 140, Chesterfield, Missouri 63017. We have been retained by Federal Executive Agencies in this proceeding on their behalf.

2. Attached hereto and made a part hereof for all purposes are my responsive testimony and exhibit which were prepared in written form for introduction into evidence in the Corporation Commission of Oklahoma, Cause No. PUD 201700496.

3. I hereby swear and affirm that the testimony and exhibit are true and correct and that they show the matters and things that they purport to show.

Michael P. Gorman

Subscribed and sworn to before me this 14th day of May, 2018.

MARIA E. DECKER
Notary Public - Notary Seal
STATE OF MISSOURI
St. Louis City
My Commission Expires: May 5, 2021
Commission # 13706793

Notary Public