

S. Morris Hadden
William C. Bovender
William C. Argabrite
Jimmie Carpenter Miller
Mark S. Dessauer
Gregory K. Haden
Michael L. Forrester
Stephen M. Darden
Edward J. Webb, Jr.
James N. L. Humphreys¹
Suzanne Sweet Cook¹
Michael S. Lattier^{5,6}
Scott T. Powers

HUNTER·SMITH·DAVIS

SINCE 1916

LLP

Kingsport Office
1212 North Eastman Road
P.O. Box 3740
Kingsport, TN 37664
Phone (423) 378-8800
Fax (423) 378-8801

Johnson City Office
100 Med Tech Parkway
Suite 110
Johnson City, TN 37604
Phone (423) 283-6300
Fax (423) 283-6301

All Attorneys Licensed in Tennessee
Unless Noted

Additional Bar Memberships:
VA¹, NC², KY³, GA⁴, FL⁵, MT⁶, CA only⁷

Leslie Tentler Ridings
Christopher D. Owens^{1,3}
Jason A. Creech
Meredith Bates Humbert
Joseph B. Harvey⁴
Rachel Ralston Mancil²
Caroline Ross Williams¹
Marcy E. Walker
Sarah Blessing Valk
Sydney B. Gilbert
Joseph A. Matherly
Will A. Ellis
Jordan T. Richardson

Respond to:

Kingsport Office
William C. Bovender
423-378-8858, 423-534-7897 (mobile)
bovender@hdsdlaw.com

Of Counsel:
Jeannette Smith Tysinger
John B. Buda⁷

www.hdsdlaw.com

April 27, 2022

KPOW-10311

Electronically Filed in TPUC Docket
Room on April 27, 2022 at 1:37 p.m.

VIA EMAIL (tpuc.docketroom@tn.gov) & FEDEX

Dr. Kenneth C. Hill, Chairman
c/o Ectory Lawless, Dockets & Records Manager
Tennessee Public Utility Commission
502 Deaderick Street, 4th Floor
Nashville, TN 37243

Re: IN RE: PETITION OF KINGSFORT POWER
COMPANY d/b/a AEP APPALACHIAN POWER
FOR A GENERAL RATE CASE
DOCKET NO.: 21-00107

Dear Chairman Hill:

On behalf of Kingsport Power Company d/b/a AEP Appalachian Power, we transmit for filing
Rebuttal Testimony for the following:

A. Wayne Allen
William K. Castle
Jessica M. Criss
Eleanor K. Keeton
Vanessa Y. Oren
Katharine Walsh
Michael H. Ward

The originals and four copies are being sent by overnight delivery.

Should you have any questions, please do not hesitate to contact the undersigned.

Very sincerely yours,

HUNTER, SMITH & DAVIS, LLP



William C. Bovender

Enclosure: As stated

cc: David Foster (w/enc.)
Monica L. Smith-Ashford, Esq. (w/enc.)
Michael J. Quinan, Esq. (w/enc.)
Vance L. Broemel (w/enc.)
Karen H. Stachowski (w/enc.)
James R. Bacha, Esq. (w/enc.)
Noelle J. Coates, Esq. (w/enc.)
Joseph B. Harvey, Esq. (w/enc.)

Via US Mail and Email: david.foster@tn.gov
Via US Mail and Email: monica.smith-ashford@tn.gov
Via US Mail and Email: mquinan@t-mlaw.com
Via US Mail and Email: vance.broemel@ag.tn.gov
Via US Mail and Email: Karen.Stachowski@ag.tn.gov
Via Email: jrbacha@aep.com
Via Email: njcoates@aep.com
Via Email: jharvey@hsdlaw.com

**REBUTTAL TESTIMONY OF
KATHARINE WALSH
ON BEHALF OF KINGSPORT POWER COMPANY
D/B/A AEP APPALACHIAN POWER
BEFORE THE TENNESSEE PUBLIC UTILITY COMMISSION
DOCKET NO. 21-00107**

1 **Q. PLEASE STATE YOUR NAME.**

2 A. My name is Katharine Walsh.

3 **Q. ARE YOU THE SAME KATHARINE WALSH WHO SUBMITTED DIRECT**
4 **TESTIMONY IN THIS PROCEEDING?**

5 A. Yes.

6 **Q. WHAT IS THE PURPOSE OF YOUR REBUTTAL TESTIMONY?**

7 A. I respond to the direct testimony of Consumer Advocate Unit (CA) witness Novak's
8 development of billing determinants, attrition year revenue calculation, gross revenue
9 conversion factor (GRCF) calculation, and concerns regarding the prompt pay discount. I
10 also address his Street Lighting rate design and recommend certain changes to the filed
11 lighting proposals.

12 **Q. ARE YOU SPONSORING ANY REBUTTAL EXHIBITS?**

13 A. Yes, I am sponsoring the following exhibit:

- 14 • KgPCo Rebuttal Exhibit No. 1 (KIW) Proposed Lighting Revisions to Tariff

15 **Q. DO YOU AGREE WITH THE BILLING UNITS WITNESS NOVAK**
16 **DEVELOPED?**

17 A. No. Witness Novak used a regression model which utilizes historic averages to develop
18 attrition year billing units. While his model differs from the Company's preferred
19 approach as filed in this proceeding, it results in similar billing units with the exception of
20 three tariffs: 324 Industrial Power Transmission (IP Tran), 208 Electric Heating General

(EHG), and 229 General Service Time-of-Day (GS-TOD). In all three instances, witness Novak's erroneous calculations result in higher billing units.

Q. PLEASE DESCRIBE THE PROBLEM WITH WITNESS NOVAK'S IP TRAN BILLING DEMAND.

A. Witness Novak has overstated IP Tran billing demand by applying a specific customer adjustment to an overstated level of attrition year billing demand. The Commission should rely on the going-level kW demand I calculated for 324 IP Tran, based on current and known operations of the customers, of 759,217 kW which results in \$181,521 lower attrition year revenue than computed by witness Novak. The Company's four largest customers are served on the IP Tran tariff. One customer in particular ceased its normal level of operations and plans to continue operating at a much lower load than it has historically. Witness Novak calculated an adjustment to decrease that customer's billing demand by 210,630 kW. I do not disagree with the adjustment amount, as I have developed a similar adjustment, but have determined that witness Novak applied his adjustment to an historic average usage which significantly overstates the IP Tran attrition year level of demand.

While the Commission should adopt the IP Tran billing demand as filed, at minimum, the Commission should correct witness Novak's calculations. Witness Novak shows attrition year billing demand for the four IP Tran customers in his support R-91-1.00, R-91-2.00, R-91-3.00 and R-91-5.00. The sum of attrition year billing demand from his workpaper, WHN Analysis of KPC 25 Largest Customers -2022, is 793,298 kW, which is 41,239 kW lower than the overstated calculation of 834,537 shown in WHN IP

1 Revenue Calculation. Rectifying this error using witness Novak's own calculation results
2 in \$99,386 less attrition year revenue than proposed by the CA.

3 **Q. PLEASE DESCRIBE THE PROBLEM WITH WITNESS NOVAK'S EHG**
4 **BILLING DEMAND.**

5 A. Tariff code 208 EHG applies a demand charge for each kW of monthly billing demand in
6 excess of 30 kW. Therefore the first 30 kW used in each month is not assessed any base
7 demand charge. When witness Novak developed attrition year revenue, he applied the
8 base demand charge to *all* monthly demand instead of only demand in excess of 30 kW.
9 In doing so, he has overstated EHG billing demand by 85,146 kW compared to my
10 calculation. Rectifying this error, using the filed tariff code 208 base billing demand, as
11 provided in KgPCo Exhibit No. 1 (KIW) Revenue Proof, results in \$298,863 less attrition
12 year revenue than proposed by the CA.

13 **Q. PLEASE DESCRIBE THE PROBLEM WITH WITNESS NOVAK'S GS-TOD**
14 **ENERGY.**

15 A. Tariff 229 GS-TOD applies energy charges for on and off peak billing periods. When
16 witness Novak developed on and off peak energy, he used *total* metered energy as if it
17 were on-peak energy. This effectively doubled their usage. In doing so, he has overstated
18 GS-TOD on-peak energy by 129,378 kWh. Rectifying this error, using the filed tariff
19 code 229 on-peak energy as provided in KgPCo Exhibit No. 1 (KIW) Revenue Proof,
20 results in \$5,721 less attrition year revenue than proposed by the CA.

1 **Q. DO YOU HAVE ANY OTHER CONCERNS ABOUT WITNESS NOVAK'S**
2 **ATTRITION YEAR REVENUE?**

3 A. Yes, witness Novak has overstated the Company's Street Lighting attrition year revenue
4 by applying a 113% gross-up to that revenue, resulting in an additional \$213,581 of
5 fictitious revenue.

6 **Q. WHAT IS THE BASIS FOR THIS GROSS-UP?**

7 A. Witness Novak asserts that the Commission ordered an approximate \$215,000 increase to
8 the Street Lighting class in Docket No. 16-00001. While the Settlement and Order did
9 impute a revenue increase to the Street Lighting class, it also recognized that the
10 Company was obligated to continue charging Street Lighting customers their contracted
11 rates. Effectively the result was that all other retail customers would not pay \$215,000
12 that was identified as related to Street Lighting.

13 **Q. WHAT IS THE EFFECT OF WITNESS NOVAK'S REVENUE GROSS-UP?**

14 A. Witness Novak has imputed additional revenue to the Company by falsely increasing
15 Street Light lamp rates to reach higher attrition year revenue. In order to reach the
16 proposed level of revenue for the Street Lighting class recommended by Mr. Novak, the
17 communities with Street Lighting would receive an almost 30% increase under CA's
18 proposal instead of the 13.18% increase shown in witness Novak's exhibit CA Exhibits
19 for Revenue Requirement in KPC Rate Case 21-00107.

20 **Q. IS THE STREETLIGHTING CLASS ALREADY EARNING OVER THE**
21 **JURISDICTIONAL RATE OF RETURN?**

22 A. Yes, as discussed by Company witness Ward, the Street Lighting class earned a 2.6%
23 ROR which is higher than the jurisdictional average of -0.83%. Under their current

1 contract rates, they are already paying higher than the jurisdictional average when
2 considering the costs to serve them. It would be totally inappropriate to impose an
3 increase of almost 30% on these customers when the cost of service does not warrant
4 doing so.

5 **Q. WHAT LEVEL OF BASE ATTRITION YEAR REVENUE HAS THE COMPANY**
6 **PROPOSED?**

7 A. As shown in KgPCo Exhibit No. 1 (KIW) Revenue Proof, the Commission should rely on
8 my attrition year SL revenue of \$1,148,264. Accepting my number, results in \$307,039
9 less attrition year revenue than proposed by the CA.

10 **Q. WITNESS NOVAK HAS ASKED THE COMMISSION TO QUESTION THE**
11 **PROMPT PAYMENT DISCOUNT CUSTOMERS RECEIVE FOR PAYING**
12 **THEIR BILL ON TIME. DO YOU AGREE THE PROMPT PAYMENT**
13 **DISCOUNT POSES A PROBLEM?**

14 A. No, I do not. Kingsport customers have long enjoyed a 1.5% prompt payment discount
15 which motivates customers to pay their bill and stay current on their account. Witness
16 Novak is correct that the full prompt payment gross-up is included in base rates while the
17 credit is assessed on the entire bill. However, I disagree that the Commission need open a
18 separate docket to address the prompt pay discount. It would be an unnecessary use of
19 resources and not to customers' benefit. Rather, there are two effectively equivalent
20 options to address witness Novak's concern:

21 1. Retain the full prompt pay gross-up in base rates the way it has been
22 calculated for decades. This will also ensure that there continues to be matching of the
23 full prompt pay gross-up in base rates along with any forfeited discounts in base rates.

2. Gross-up the individual rate components (base and riders) for the prompt pay discount. This would require changes to the current FPPAR and TRP&MS rates in order to capture the total prompt pay discount across base and rider rates.

Q. WITNESS NOVAK HAS CALCULATED A LOWER GRCF THAN THE COMPANY. DO YOU AGREE WITH HIS GRCF?

A. No, I do not. There are a number of differences between the Company's calculation and CA's calculation. Company witness Criss addresses witness Novak's inappropriate removal of the TN PUC Inspection Fee component from the gross-up. Additionally, I find fault with his calculation of the forfeited discount ratio applied to the gross-up.

Q. PLEASE EXPLAIN THE FORFEITED DISCOUNT DIFFERENCE.

A. It is proper to first gross-up operating revenue by a representative level of forfeited discounts otherwise known as the forfeited discount ratio. The forfeited discount ratio includes a test year level of forfeited discounts divided by total test year revenue to reach a forfeited discount ratio. Witness Novak used a similar level of forfeited discount revenue but divided by base revenue instead of total revenue. This results in a much higher forfeited discount ratio in his GRCF calculation. As previously discussed, forfeited discounts are reflective of total bills and it is incorrect to calculate the forfeited discount ratio using only base revenue as the denominator.

Q. IS HIS APPROACH CONSISTENT WITH HIS CALCULATION OF THE UNCOLLECTIBLE RATIO?

A. No. While he used only base revenue in the forfeited discount ratio, he used total revenue to compute the uncollectible ratio. This inconsistency should be corrected and both ratios should utilize total revenue as the denominator.

1 **Q. DO YOU AGREE WITH WITNESS NOVAK'S RECOMMENDATION TO**
2 **APPLY THE ENTIRE REVENUE INCREASE TO ONLY THE FIXED**
3 **PORTIONS OF CUSTOMER RATES?**

4 A. Yes, I do. The base rates reflect the distribution cost-of-service and ought to be recovered
5 in fixed charges. Therefore, I agree that customer and demand charges, not energy
6 charges, ought to be increased to collect the increase granted by the TPUC in this case.

7 **Q. DO YOU HAVE ANY OTHER GENERAL CONCERNS WITH THE RATE**
8 **DESIGN PROPOSED BY WITNESS NOVAK.**

9 A. Yes, I believe one minor rate design issue should be considered regarding Street Lighting
10 lamp rates. Witness Novak simply spread the increase to all existing street light lamp
11 rates. In contrast, the Company has proposed to first consolidate the lamp rates by
12 wattage, similar to the current Outdoor Lighting rates, then apply the revenue increase.
13 This consolidation reduces the number of Street Light lamp rates by 39, significantly
14 simplifies Street Light customer bills and tariff administration, and should be approved.

15 **Q. DO YOU HAVE ANY FURTHER COMMENTS REGARDING THE LIGHTING**
16 **PROPOSALS IN THIS PROCEEDING?**

17 A. Yes. Through the course of discovery and additional review, the Company has
18 determined there are some necessary changes to the proposed lighting tariffs.
19 Additionally, Witness Novak is expected to offer supplemental testimony regarding the
20 new LED lighting proposals and the Company would like to respond accordingly at that
21 time if necessary.

1 **Q. WHAT CHANGES TO THE FILED LIGHTING PROPOSALS HAVE YOU**
2 **IDENTIFIED?**

3 A. I have included revisions to the Company's proposed tariff in red-line format for OL, SL
4 and the lighting section of the FPPAR relative to those originally filed in
5 MFR_5b_Attachment_1. This is provided as KgPCo Rebuttal Exhibit No. 1 (KIW)
6 Proposed Lighting Revisions to Tariff. These revisions have no dollar effect on the
7 Company's original filing or customer bills. The revisions are summarized below:

8 1. Correct OL conversion charge from \$31 to \$30.

9 2. Revise SL FPPAR rate to a single per kWh rate instead of separate per lamp
10 charges. It was determined the Company's billing system cannot charge separate rider
11 lamp rates for a single Street Light Tariff code, 523. Since the lamp rates were originally
12 designed based on a uniform per kWh rate, this has no impact.

13 3. Correct name of Tariff code OL 173 from UG to OH

14 4. Remove OL lamps that are no longer offered or used: Tariff codes 99, 104, 121
15 and 125

16 5. Include a rate for 200 watt HPS SL UG lamps. It was determined that some of
17 the 200 watt HPS SL lamps are fed via underground circuit; therefore a separate rate
18 should be shown for them.

19 6. Add a new OL and SL LED option for 480 watt Flood lamp.

20 **Q. DOES THIS CONCLUDE YOUR REBUTTAL TESTIMONY?**

21 A. Yes.

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 2-15
T.P.U.C. Tariff Number 3

FUEL AND PURCHASED POWER ADJUSTMENT RIDER

Kingsport Power is authorized under the terms of this rider to apply a charge to all customer bills rendered by the Company to recover the total cost of fuel and purchased power from the Company's wholesale power supplier under the Federal Energy Regulatory Commission implemented rate schedules, including, but not limited to, all demand charges, energy charges and fuel charges which are paid by the Company to its wholesale power supplier in connection with the electric service provided to the Company.

1. Updates to Fuel and Purchased Power Expense

Fuel and Purchased Power Adjustment Rider rates shall remain in effect until such time as new Rider rates are approved by the Tennessee Public Utility Commission. At least annually, the Company will file information regarding actual fuel and purchased power expenses and revenues collected under this Rider as well as any proposed adjustment to the Rider rates. The Fuel and Purchased Power Adjustment Rider rates will be designed to collect the approved level of fuel and purchased power expense including any prior period over/under recovery balance and any refunds from the Company's wholesale power supplier. Prior period over/under recovery balances result from differences between the Company's actual total costs from its wholesale supplier and actual billing under the Rider.

2. Determination of Adjustments to Surcharges by Tariff

Adjustments to the level of recovery under the Fuel and Purchased Power Adjustment Rider shall be applied proportionally to all Fuel and Purchased Power Adjustment Rider rate components for all tariffs and special contracts.

3. Notification of Change in Charge by the Company

The Company will provide no less than a 30-day notice of the proposed effective date in any change in the purchased power charge to its customers. The Company will also provide the calculations and other information supporting the proposed purchased power charges to the Staff of the Tennessee Public Utility Commission 30 days prior to the effective date of such charge.

4. Charge

Pursuant to the provisions of this Rider, a Fuel and Purchased Power Adjustment Rider charge will be applied to each kilowatt-hour, kilowatt or lamp as billed under the Company's filed tariffs.

The Fuel and Purchased Power Adjustment Rider charge applicable to each tariff is set below:

<u>Tariff</u>	<u>Energy Rate</u>	<u>Demand Rate</u>	<u>Lamp Rate</u>
	(¢) / kWh	(\$)/ KW	(\$)/ Lamp
<u>Residential</u>			
All kWh	8.332		
Storage Water Heating	6.394		
<u>Residential Employee</u>			
All kWh	8.332		
Storage Water Heating	6.394		
<u>Residential Smart Time-of-Use</u>			
Critical On-peak kWh	17.500		
On-peak kWh	9.895		
Off-peak kWh	6.394		

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AMERICAN ELECTRIC POWER
Kingsport, Tennessee

Original Sheet Number 2-15
T.P.U.C. Tariff Number 3

FUEL AND PURCHASED POWER ADJUSTMENT RIDER

<u>Tariff</u>	<u>Energy Rate</u>	<u>Demand Rate</u>	<u>Lamp Rate</u>
	(¢) / kWh	(\$)/ KW	(\$)/ Lamp
<u>Residential Time-of-Day</u>			
On-peak kWh	9.539		
Off-peak kWh	6.394		
<u>Small General Service (SGS)</u>			
First 600 kWh	6.750		
Over 600 kWh	6.750		
<u>Medium General Service (MGS) Secondary</u>			
First 200 kWh per kW	7.512		
Over 200 kWh per kW	7.245		
<u>General Service Time-of-Day (GS-TOD)</u>			
On-peak kWh	8.042		
Off-peak kWh	6.236		
<u>Medium General Service (MGS) Primary</u>			
First 200 kWh per kW	7.513		
Over 200 kWh per kW	6.804		
<u>Large General Service (LGS) Secondary</u>			
Demand - kVA		\$4.98	
All kWh	5.212		
<u>Large General Service (LGS) Primary</u>			
Demand - kVA		\$4.98	
All kWh	4.637		
<u>LGS Subtransmission/Transmission</u>			
Demand - kVA		\$ 4.88	
All kWh	4.550		
<u>Industrial Power (IP) Secondary</u>			
Demand - On-Peak kW		\$10.95	
All kWh	4.310		
<u>Industrial Power (IP) Primary</u>			
Demand - On-Peak kW		\$ 10.63	
All kWh	4.174		
<u>Industrial Power (IP) Subtransmission/Transmission</u>			
Demand - On-Peak kW		\$11.51	
All kWh	4.108		

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AMERICAN ELECTRIC POWER
Kingsport, Tennessee

Original Sheet Number 2-16
T.P.U.C. Tariff Number 3

FUEL AND PURCHASED POWER ADJUSTMENT RIDER

<u>Tariff</u>	<u>Energy Rate</u> (¢) / kWh	<u>Demand Rate</u> (\$)/ KW	<u>Lamp Rate</u> (\$)/ Lamp
<u>Church Service</u>			
All kWh	7.672		
<u>Public Schools (PS)</u>			
Block 1 kWh Standard	8.417		
Block 2 kWh Electric Heating	8.417		
<u>Electric Heating General (EHG)</u>			
All kWh	7.498		
<u>Outdoor Lighting (OL)</u>			
Overhead Lighting Service			
High Pressure Sodium			
100 watts, 9,500 Lumens (094)			\$1.30
200 watts, 22,000 Lumens (097)			\$2.91
Flood Lighting Service			
High Pressure Sodium - Floodlight			
100 watts, 9,500 Lumens (115)			\$1.30
200 watts, 22,000 Lumens (107)			\$2.91
400 watts, 50,000 Lumens (109)			\$5.75
High Pressure Sodium - Shoebox			
400 watts, 50,000 Lumens (120)			\$5.75
Metal Halide - Floodlight			
250 watts, 17,000 Lumens (110)			\$3.46
400 watts, 28,800 Lumens (116)			\$5.47
Mercury Vapor			
175 watts, 7,000 Lumens (093)			\$2.49
400 watts, 20,000 Lumens (095)			\$5.47
Post Top Lighting Service			
High Pressure Sodium - PT			
100 watts, 9,500 Lumens (111)			\$1.30
70 watts, 6,300 Lumens (121)			\$0.98
150 watts, 16,000 Lumens (122)			\$2.02
250 watts, 27,500 Lumens (103)			\$3.56
400 watts, 50,000 Lumens (104))			\$5.75
Flood Lighting Service – PT			
High Pressure Sodium – Floodlight			
200 watts, 22,000 Lumens (123)			\$2.91
400 watts, 50,000 Lumens (124)			\$5.75
Metal Halide – PT			
400 watts, 36,000 Lumens (125) –			\$5.47
Metal Halide - Floodlight – PT			
400 watts, 36,000 Lumens (126)			\$5.47
Mercury Vapor – PT			
175 watts, 7,000 Lumens (099)			\$2.49

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AMERICAN ELECTRIC POWER
Kingsport, Tennessee

Original Sheet Number 2-17
T.P.U.C. Tariff Number 3

Outdoor Lighting (OL) – cont'd			
LED Overhead Lighting Service			
50 watts, 5,000 Lumens OH (163)			\$0.56
100 watts, 9,800 Lumens OH (152)			\$1.11
200 watts, 23,000 Lumens OH (165)			\$2.22
150 watts, 20,400 Lumens Flood OH (167)			\$1.67
300 watts, 38,700 Lumens Flood OH (172)			\$3.35
<u>480 watts, 73,000 Lumens Flood OH (174)</u>			<u>\$5.34</u>
LED Underground Lighting Service			
50 watts, 5,000 Lumens UG (164)			\$0.56
100 watts, 9,800 Lumens UG (153)			\$1.11
115 watts, 15,700 Lumens Shoebox UG (169)			\$1.28
200 watts, 23,000 Lumens UG (166)			\$2.22
40 watts, 4,300 Lumens Postop UG (171)			\$0.44
65 watts, 6,300 Lumens Postop UG (158)			\$0.72
150 watts, 20,400 Lumens Flood UG (168)			\$1.67
300 watts, 38,700 Lumens Flood UG (173)			\$3.35
<u>480 watts, 73,000 Lumens Flood UG (175)</u>			<u>\$5.34</u>
Street Lighting (SL) tariff code (523)			
<u>All kWh</u>	<u>3.379</u>		

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AMERICAN ELECTRIC POWER
Kingsport, Tennessee

Original Sheet Number 2-18
T.P.U.C. Tariff Number 3

FUEL AND PURCHASED POWER ADJUSTMENT RIDER

<u>Tariff</u>	<u>Energy Rate</u>	<u>Demand Rate</u>	<u>Lamp Rate</u>
	(¢) / kWh	(\$)/ KW	(\$)/ Lamp
<u>Backup Service</u>			
Service Reliability Level A			
Secondary		\$ 0.47	
Primary		\$ 0.46	
Sub/Transmission		\$ 0.44	
Service Reliability Level B			
Secondary		\$ 0.93	
Primary		\$ 0.91	
Sub/Transmission		\$ 0.89	
Service Reliability Level C			
Secondary		\$ 1.42	
Primary		\$ 1.39	
Sub/Transmission		\$ 1.35	
Service Reliability Level D			
Secondary		\$ 1.88	
Primary		\$ 1.83	
Sub/Transmission		\$ 1.80	
Service Reliability Level E			
Secondary		\$ 2.36	
Primary		\$ 2.30	
Sub/Transmission		\$ 2.25	
Service Reliability Level F			
Secondary		\$ 2.82	
Primary		\$ 2.74	
Sub/Transmission		\$ 2.69	
<u>Maintenance Service</u>			
Secondary	4.537		
Primary	4.397		
Sub/Transmission	4.326		

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 16-1
T.P.U.C. Tariff Number 3

TARIFF O. L.
(Outdoor Lighting)

AVAILABILITY OF SERVICE

Available for outdoor lighting distribution service to individual customers, provided the lighting location designated by the customer is reasonably accessible to the Company's service vehicles without causing damage to the customer's or other's property. No light shall be installed on streets covered by municipal street lighting systems or at a location which might interfere with such system. LED Equivalent options will be utilized for all new installations. Mercury vapor lamps will no longer be available for new installations or for repair or replacement of existing units.

MONTHLY RATE

OVERHEAD LIGHTING SERVICE

- A. For each of the following, the Company will provide lamp, photo-electric relay control equipment, luminaire and an upsweep arm not over 6 feet in length, an shall mount same on an existing wood distribution pole which is connected to secondary facilities of the Company:

Tariff Code	Size of Lamp In Lumens (Approximate)	Nominal Lamp Wattage (Approximate)	Lamp Type	Rate Per Lamp Per Month
094	9,500	100	High Pressure Sodium	\$8.47
097	22,000	200	High Pressure Sodium	\$12.07
115	9,500	100	High Pressure Sodium Floodlight	\$11.05
107	22,000	200	High Pressure Sodium Floodlight	\$12.86
109	50,000	400	High Pressure Sodium Floodlight	\$16.65
120	50,000	400	High Pressure Sodium Shoebox Fixture	\$20.55
110	17,000	250	Metal Halide Floodlight	\$14.86
116	28,000	400	Metal Halide Floodlight	\$17.11
163	5,000	50	LED OH	\$4.90
152	9,800	100	LED OH	\$5.48
165	23,000	200	LED OH	\$7.99
167	20,400	150	LED Flood OH	\$7.99
172	38,700	300	LED Flood OH	\$10.23
174	73,000	480	LED Flood OH	\$30.08

I
I
I
I
I
I
I
I
I
P
P
P
P
P

Each kilowatt-hour of energy consumed is subject to all applicable riders and surcharges.

When other additional overhead facilities are to be installed by the Company, the customer will, in addition to the above monthly charge, pay a CIAC in advance representing the installation cost of such additional overhead facilities extending from the nearest or most suitable pole of the Company to the point designated by the customer for the installation of said fixture, provided the location designated by the customer is reasonably accessible to the Company's service vehicles without causing damage to the customer's or other's property. In lieu of paying in advance for the installation of additional facilities, the customer may, for the following facilities only, pay the following:

For each additional pole and overhead wire span not over 150 feet:
Wood Pole \$ 7.95 per month (35 foot/5)

When service cannot be supplied from an existing pole of the Company carrying a secondary circuit, the Company will install one pole and one span of secondary circuit of not over 150 feet for an additional charge of \$7.95 per month or one span of secondary circuit only of not over 150 feet for an additional charge of \$1.40 per month.

- B. After January 1, 1983 Mercury Vapor outdoor lighting service will be available only to customers then being served at the rates set out herein and at the present service location.

Tariff Code	Size of Lamp in Lumens	Nominal Lamp Wattage	Lamp Type	Rate Per Lamp Per Month
093	7,000	175	Mercury Vapor	\$10.57
095	20,000	400	Mercury Vapor	\$17.38

I
I

Issued:
By: Christian T. Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 16-2
T.P.U.C. Tariff Number 3

TARIFF O. L.
(Outdoor Lighting)

UNDERGROUND LIGHTING SERVICE

- A. For each of the following, the Company will provide lamp, photo-electric relay control, post-top luminaire, post, and installation, (the type and height of which will be consistent with the Company's construction standards) including underground wiring, for a distance of 30 feet from the Company's existing secondary facilities.

Tariff Code	Size of Lamp In Lumens (Approximate)	Nominal Lamp Wattage (Approximate)	Lamp Type	Rate Per Lamp Per Month
121	6,300	70	High Pressure Sodium	\$13.54
111	9,500	100	High Pressure Sodium	\$14.42
122	16,000	150	High Pressure Sodium	\$44.17
103	27,500	250	High Pressure Sodium	\$46.37
104	50,000	400	High Pressure Sodium	\$49.54
123	22,000	200	High Pressure Sodium Floodlight	\$41.48
124	50,000	400	High Pressure Sodium Floodlight	\$48.90
125	36,000	400	Metal Halide	\$49.66
126	36,000	400	Metal Halide Floodlight	\$49.17
164	5,000	50	LED UG	\$13.33
153	9,800	100	LED UG	\$13.91
169	15,700	115	LED SHOEBOX UG	\$16.99
166	23,000	200	LED UG	\$16.41
171	4,300	40	LED Postop UG	\$14.45
158	6,300	65	LED Postop UG	\$14.63
168	20,400	150	LED Flood UG	\$16.75
173	38,700	300	LED Flood UG UGOH	\$18.99
175	73,000	480	LED Flood UG	\$38.84

- B. After January 1, 1983 Mercury Vapor outdoor lighting service will be available only to customers then being served at the rates set out herein and at the present service location.

Tariff Code	Size of Lamp in Lumens	Nominal Lamp Wattage	Lamp Type	Rate Per Lamp Per Month
099	7,000	175	Mercury Vapor	\$16.16

- C. When a customer requires an underground circuit longer than 30 feet from existing secondary facilities for underground lighting service, the customer will pay to the Company, in advance, a charge for the additional length of underground circuit.
- (1) Pay to the Company in advance a charge of \$5.62 per foot for the length of underground circuit in excess of 30 feet; or
 - (2) Pay a monthly facilities charge of \$1.00 for each 25 feet (or fraction thereof) of underground circuit in excess of 30 feet.

In addition, the customer shall reimburse the Company for all state and federal income taxes associated with such charges.

Fixtures and poles will be standard utility grade secured from the Company's normal suppliers. The Company will be the sole judge of the suitability of the types of fixtures and poles used.

RIDERS

Monthly charges computed under this tariff shall be adjusted in accordance with the applicable Commission-approved riders as contained herein.

PROMPT PAYMENT DISCOUNT

A discount of 1.5 percent will be allowed if account is paid in full within 15 days of date of bill.

TERM OF CONTRACT

Contracts under this tariff will be for not less than 1 year for residential or farm customers, not less than 3 years for commercial or industrial customers, or not less than 5 years for other customers. The Company reserves the right to include in the contract such other provisions as it may deem necessary to insure payment of bills throughout the term of the contract.

HOURS OF LIGHTING

All lamps shall burn from one-half hour after sunset until one-half hour before sunrise, every night and all night, or approximately 4,000

Issued:
By: Christian T Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

hours per annum.

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 16-3
T.P.U.C. Tariff Number 3

TARIFF O. L.
(Outdoor Lighting)

OWNERSHIP OF FACILITIES

All facilities necessary for service including fixtures, controls, poles, transformers, secondaries, lamps and other appurtenances shall be owned and maintained by the Company. All service and necessary maintenance will be performed only during the regular scheduled working hours of the Company. Burned out lamps will normally be replaced within 48 hours after notification by the customer.

TERM

The minimum billing term for new residential outdoor lighting installations will be 12 months. At the Company's option, a written agreement may be required pursuant to the Extension of Service provision of the Company's Terms and Conditions of Standard Service. The minimum billing term for new commercial, industrial and other non-residential outdoor lighting installations will be 36 months. At the Company's option, a written agreement may be required pursuant to the Extension of Service provision of the Company's Terms and Conditions of Standard Service.

SPECIAL TERMS AND CONDITIONS

This tariff is subject to the Company's Terms and Conditions of Service.

In cases where the Company is requested to replace an existing mercury vapor lamp with a high pressure sodium or metal halide lamp, the right is reserved to charge the customer an amount commensurate with the cost involved.

All new lighting installations must be requested by property owner.

CONVERSION CHARGE

Upon Customer request, the Company will convert an existing non-LED luminaire, currently billed in accordance with the Company's Schedule O.L., to an available LED luminaire upon payment, in advance, by the Customer to the Company of the applicable Conversion Charge.

| The Conversion Charge for replacing an existing non-LED luminaire to a LED luminaire will be \$~~304~~.00.

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 17-1
T.P.U.C. Tariff Number 3

TARIFF S. L.
(Street Lighting)

AVAILABILITY OF SERVICE

Available for street lighting distribution service to individual customers, provided the lighting location designated by the customer is reasonably accessible to the Company's service vehicles without causing damage to the customer's or other's property. LED Equivalent options will be utilized for all new installations.

MONTHLY RATE (Tariff Code 523)

OVERHEAD LIGHTING SERVICE

- A. For each of the following, the Company will provide lamp, photo-electric relay control equipment, luminaire and upsweep arm not over 6 feet in length, and shall mount same on an existing wood distribution pole which is connected to secondary facilities of the Company:

Size of Lamp In Lumens (Approximate)	Nominal Lamp Wattage (Approximate)	Lamp Type	Rate Per Lamp Per Month	Cost of Facilities Included in Rates (\$) ¹	
9,500	100	High Pressure Sodium	\$7.45		P
16,000	150	High Pressure Sodium	\$8.62		P
22,000	200	High Pressure Sodium	\$9.09		P
28,000	250	High Pressure Sodium	\$22.26		P
50,000	400	High Pressure Sodium	\$27.16		P
5,000	50	LED OH	\$4.90	\$342.48	P
9,800	100	LED OH	\$5.48	\$379.70	P
23,000	200	LED OH	\$7.99	\$541.38	P
73,000	480	LED Flood OH	30.08	\$1,958.64	

When facilities other than those specified above are to be installed by the Company, the customer will, in addition to above monthly charge or charges, pay in advance the installation cost for the new overhead facilities extending from nearest or most suitable pole of the Company to the point designated by the customer for the installation of said lamp

- B. After January 1, 1983 Mercury Vapor outdoor lighting service will be available only to customers then being served at the rates set out herein and at the present service location.

Size of Lamp in Lumens (Approximate)	Nominal Lamp Wattage (Approximate)	Lamp Type	Rate Per Lamp Per Month	
7,000	175	Mercury Vapor	\$7.74	P
20,000	400	Mercury Vapor	\$16.36	P

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 17-2
T.P.U.C. Tariff Number 3

TARIFF S. L.
(Street Lighting)
(Continued)

UNDERGROUND LIGHTING SERVICE

- B. The Company will provide lamp, photo-electric relay control, post-top luminaire, post, and installation, including underground wiring, for a distance of 30 feet from the Company's existing secondary circuits.

Size of Lamp In Lumens (Approximate)	Nominal Lamp Wattage (Approximate)	Lamp Type	Rate Per Lamp Per Month	Cost of Facilities Included in Rates (\$)¹	
9,500	100	High Pressure Sodium	\$5.08		P
16,000	150	High Pressure Sodium	\$12.21		P
22,000	200	High Pressure Sodium	\$9.09		P
28,000	250	High Pressure Sodium	\$23.32		P
50,000	400	High Pressure Sodium	\$27.16		P
140,000	1,000	High Pressure Sodium	\$82.92		P
5,000	50	LED UG	\$13.33	\$1,085.89	P
9,800	100	LED UG	\$13.91	\$1,123.11	P
15,700	115	LED SHOEBOX UG	\$16.99	\$1,322.02	P
23,000	200	LED UG	\$16.41	\$1,284.80	P
4,300	40	LED Postop UG	\$14.45	\$1,122.87	P
6,300	65	LED Postop UG	\$16.11	\$1,265.02	P
8,900	60	LED Decorative Postop UG	\$21.88	\$1,637.24	P
7,800	90	LED Decorative Postop UG	\$28.01	\$2,032.73	P
73,000	480	LED Flood UG	\$38.84	\$2,731.81	P
140,000	1,000	High Pressure Sodium-Energy only	\$22.10		
22,000	200	High Pressure Sodium-Energy only	\$5.77		

Fixtures and poles will be standard utility grade secured from the Company's normal suppliers. The Company will be the sole judge of the suitability of the types of fixtures and poles used.

The rates in Overhead lighting and Underground lighting are based on the Company's investment in standard facilities. For LED lights, the Company's investment in standard facilities is the amount as shown adjacent to the rate¹. When the investment in new standard facilities, including costs for service from underground, exceeds the prescribed amount, the difference will be paid to the Company by the Customer as a Contribution in Aid of Construction (CIAC). The customer shall also reimburse the Company for all state and federal income taxes associated with the CIAC.

RIDERS

Monthly charges computed under this tariff shall be adjusted in accordance with the applicable Commission-approved riders as contained herein.

PROMPT PAYMENT DISCOUNT

A discount of 1.5 percent will be allowed if account is paid in full within 15 days of date of bill.

TERM OF CONTRACT

Contracts under this tariff will be for not less than 1 year for residential or farm customers, not less than 3 years for commercial or industrial customers, or not less than 5 years for other customers. The Company reserves the right to include in the contract such other provisions as it may deem necessary to insure payment of bills throughout the term of the contract.

HOURS OF LIGHTING

All lamps shall burn from one-half hour after sunset until one-half hour before sunrise, every night and all night, or approximately 4,000 hours per annum.

Issued:
By: Christian T Beam, President

Effective: July 1, 2022
Pursuant to an Order in
Docket Number 21-00107

KINGSPORT POWER COMPANY
d/b/a AEP Appalachian Power
Kingsport, Tennessee

Original Sheet Number 17-3
T.P.U.C. Tariff Number 3

TARIFF S. L.
(Street Lighting)
(Continued)

OWNERSHIP OF FACILITIES

All facilities necessary for service including fixtures, controls, poles, transformers, secondaries, lamps and other appurtenances shall be owned and maintained by the Company. All service and necessary maintenance will be performed only during the regular scheduled working hours of the Company. Burned out lamps will normally be replaced within 48 hours after notification by the customer.

SPECIAL TERMS AND CONDITIONS

This tariff is subject to the Company's Terms and Conditions of Service.

CONVERSION CHARGE

Upon Customer request, the Company will convert an existing non-LED luminaire, currently billed in accordance with the Company's Schedule O.L., to an available LED luminaire upon payment, in advance, by the Customer to the Company of the applicable Conversion Charge.

The Conversion Charge for replacing an existing non-LED luminaire to a LED luminaire will be \$165.00.

In cases where the Company is requested to replace an existing mercury vapor lamp with a high pressure sodium or metal halide lamp, the right is reserved to charge the customer an amount commensurate with the cost involved.

SMART LIGHTING SERVICES

The light post and power together means other Smart Lighting devices could be attached to the light post at the same time as the upgrade to LED luminaires. Other devices could include environmental sensors, cameras, Wi-Fi network devices, smart parking and smart trash removal devices, speakers, signs etc. The installation of these devices at the same time as the street light upgrade may be more cost effective than adding these devices to the light post at a later date. If a customer desires to receive Smart Lighting services, the Company may provide a proposal to address individual customer needs. The customer agrees to execute a Service Agreement to contract with the Company for the pricing and terms of such Smart Lighting services.