



Rockland Electric Company
4 Irving Place
New York NY 10003-0987
www.oru.com

March 31, 2023

VIA ELECTRONIC MAIL

Ms. Sherri L. Golden
Secretary of the Board
State of New Jersey
Board of Public Utilities
44 South Clinton Avenue, 1st Floor,
PO Box 350
Trenton, New Jersey 08625-0350

Re: In the Matter of the Petition of Rockland Electric Company Requesting Approval of a Tariff Amendment to Add Basic Generation Service (BGS) Time-of-Use Rates Pursuant to N.J.A.C. 14: 1-5.11 and N.J.A.C. 14:3-1.3 BPU Docket No. _____

Dear Secretary Golden:

Rockland Electric Company (the "Company" or "RECO") hereby submits for filing with the Board of Public Utilities (the "Board") in draft format Leaf No. 50 to its Schedule for Electric Service B.P.U. No. 3 – ELECTRICITY.

The Board's November 9, 2022 Order in Docket No. ER22030127 ("November Order")¹ directed the New Jersey Electric Distribution Companies ("EDCs") to establish a "BGS Time-of-Use ("TOU") rate" to address Electric Vehicle ("EV") charging "on the residential supply side to take effect June 1, 2023." The Company is making this filing pursuant to N.J.A.C. 14:3-1.3(a)² and N.J.A.C. 14:1-5.11.³

The Board's Decision and Order Approving Stipulation dated October 12, 2022⁴ (the "October Order") approved a stipulation which included a new Service Classification ("SC") No. 1 Distribution Charge applicable to Voluntary-Time-of-Day ("TOD")⁵ Service. On October 28, 2022, the Company submitted a compliance filing amending its tariff in compliance with the October Order, to be effective October 31, 2022.

In the section titled "EV BGS Rates Issues" in the November Order, the Board noted that "the distribution side of residential EV charging was addressed in some of the EDC's EV

¹ In the Matter of the Provision of Basic Generation Service (BGS) for the Period Beginning June 1, 2023, BPU Docket No. ER22030127, Order dated November 9, 2022.

² N.J.A.C. 14:3-1.3(a) requires that "each public utility shall, prior to offering a utility service to the public, submit a tariff or tariff amendments to the Board for approval, with electronic copy to Rate Counsel."

³ N.J.A.C. 14:1-5.11 addresses tariff filings that do not propose increases in charges to customers.

⁴ In the Matter of the Petition of Rockland Electric Company for Approval of an Electric Vehicle Program, Establishment of an Electric Vehicle Surcharge, and for Other Relief, BPU Docket No. EO20110730, Order dated October 12, 2022.

⁵ The terms TOD and TOU have the same meaning.

Honorable Sherri L. Golden
March 31, 2023
Page 2

proceedings,” and included a footnote identifying RECO’s October Order. The November Order also stated that, “The Board believes a BGS Time-of-Use (“TOU”) rate can be created and **HEREBY ORDERS** the EDCs to create a similar solution on the residential supply side to take effect June 1, 2023.”

As required by the November Order, this filing proposes a residential supply side solution to be applicable to customers electing the Company's SC No. 1 Voluntary TOD Service approved by the Board. The Company is filing as Attachment A to this letter, a draft revised tariff leaf that would become effective June 1, 2023. This draft tariff leaf reflects new SC No. 1 TOD BGS Charges that would be applicable to customers who elect the Company’s Voluntary TOD Service. In determining the SC No. 1 TOD BGS Charges, the Company has utilized the same rate design used for the BGS – Residential and Small Commercial Pricing rates applicable to all other SCs. Attachments B and C contain that rate design.

The Company also requests that all costs associated with the revised tariff (including costs of upgrading RECO systems) flow through the Company’s quarterly BGS Reconciliation charge, consistent with the Board’s November 18, 2020 Order in Docket No. ER20030190.

Please note that the Company is making this filing solely in electronic form pursuant to the Board’s directive in its Emergency Order dated March 19, 2020 in BPU Docket No. EO20030254.

Any questions regarding this filing can be directed to Cheryl Ruggiero at (212) 460-3189 or at ruggieroc@coned.com.

Respectfully submitted,

/s/

William A. Atzl, Jr.
Director – Rate Engineering

DRAFT

Revised Leaf No. 50
Superseding Revised Leaf No. 50

GENERAL INFORMATION

No. 31 BASIC GENERATION SERVICE (“BGS”)

- (1) Basic Generation Service – Residential Small Commercial Pricing (BGS-RSCP)
Applicable to Service Classification Nos. 1, 2, 3, 4, and 6

Applicable to Service Classification Nos. 1, 2 (Non-Demand Billed), 3, 4, and 6
Charges per kilowatthour:

<u>Service Classification</u>	<u>Summer Months*</u>	<u>Other Months</u>
1 (Non-TOD) – First 600 kWh	4.599¢	7.879¢
1 (Non-TOD) – Over 600 kWh	9.956¢	7.879¢
1 (TOD) – Peak	X.XXX¢	X.XXX¢
1 (TOD) – Off-Peak	X.XXX¢	X.XXX¢
2 - (Non-Demand Billed) – All kWh	6.823¢	6.598¢
3 – Peak	10.497¢	10.166¢
3 – Off-Peak	5.497¢	5.890¢
4 – All kWh	6.228¢	6.170¢
6 – All kWh	6.221¢	6.150¢

Applicable to Service Classification No. 2 Demand Billed customers who do not take BGS-CIEP service in accordance with General Information Section No. 31(2):

	<u>Summer Months*</u>	<u>Other Months</u>
Demand Charges		
First 5 kW (\$/kW)	0.93	1.05
Over 5 kW (\$/kW)	3.42	2.71
Usage Charges		
All kWh (¢/kWh)	6.165¢	6.062¢

The above Basic Generation Service Charges reflect costs for Energy, Generation Capacity, and Ancillary Services (including ISO Administrative Charges).

*Definition of Summer Billing Months - June through September

(Continued)

ISSUED:

EFFECTIVE:

ISSUED BY: Robert Sanchez, President
Mahwah, New Jersey 07430

Development of BGS Cost and Bid Factors for Rates Effective June 1, 2023

Table #1 % Usage During PJM On-Peak Period

Based on 2022 Load Profile Information
On-Peak periods defined as the 16 hr PJM Trading period, adj for NERC holidays

	<i>Profile Meter Data</i>	<i>Profile Meter Data</i>	<i>Profile Meter Data</i>	<i>--- Other Analysis ---</i>	<i>Profile Meter Data</i>	
	SC1	SC3	SC2 ND	SC4	SC6	SC2 Dem
January	48.84%	44.39%	31.84%	50.34%	50.34%	51.00%
February	51.74%	46.03%	33.60%	53.20%	53.20%	53.06%
March	53.28%	48.02%	33.82%	55.58%	55.58%	55.93%
April	51.09%	44.76%	31.51%	52.53%	52.53%	54.01%
May	51.33%	43.24%	26.75%	53.05%	53.05%	53.55%
June	55.53%	47.70%	27.37%	56.32%	56.32%	57.39%
July	52.01%	41.21%	24.43%	49.75%	49.75%	52.15%
August	59.02%	47.22%	28.37%	56.90%	56.90%	58.67%
September	52.80%	43.63%	32.55%	52.10%	52.10%	54.60%
October	49.82%	43.07%	32.00%	50.72%	50.72%	53.36%
November	49.80%	45.26%	33.05%	52.17%	52.17%	53.49%
December	49.68%	44.35%	31.91%	51.31%	51.31%	50.98%

Table #2 % Usage During RECO On-Peak Billing Period *On-Peak periods as defined in specified rate schedule*

<i>(data rounded to nearest %)</i>	<i>N/A</i>		<i>N/A</i>	<i>N/A</i>	<i>N/A</i>	<i>N/A</i>	
	SC1	SC3	SC2 ND	SC4	SC6	SC2 Dem	SC1 TOD
January	----	32.6%	----	----	----	----	23.2%
February	----	35.9%	----	----	----	----	24.4%
March	----	33.6%	----	----	----	----	23.4%
April	----	34.8%	----	----	----	----	22.7%
May	----	36.0%	----	----	----	----	26.5%
June	----	39.5%	----	----	----	----	30.5%
July	----	41.7%	----	----	----	----	31.4%
August	----	42.9%	----	----	----	----	31.8%
September	----	41.8%	----	----	----	----	29.4%
October	----	40.0%	----	----	----	----	24.1%
November	----	37.6%	----	----	----	----	26.0%
December	----	35.8%	----	----	----	----	24.6%

Table #3 Class Usage @ customer

*Calendar month billed sales forecasted for 2023
in MWh*

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>Total</u>
January	57,249	33	1,609	671	476	35,510	95,547
February	51,407	29	1,858	580	423	31,572	85,869
March	47,197	25	2,085	553	379	30,303	80,541
April	43,981	26	1,248	457	391	32,629	78,732
May	44,146	21	970	414	380	28,833	74,763
June	59,018	28	950	378	341	31,531	92,246
July	81,819	34	1,121	408	337	35,806	119,525
August	88,718	36	1,173	462	342	39,218	129,949
September	74,963	32	1,077	509	407	37,494	114,481
October	52,253	22	1,024	586	479	32,831	87,194
November	44,519	21	991	631	519	29,854	76,535
December	53,488	30	1,505	680	514	32,184	88,399
Total	698,755	337	15,611	6,326	4,987	397,767	1,123,782

Table #4 Forwards Prices - Energy Only @ bulk system

in \$/MWh (See Table 18)

	<u>On-Peak</u>	<u>Off-Peak</u>
January	100.94	84.19
February	94.22	78.77
March	53.77	44.31
April	46.05	38.04
May	45.30	37.30
June	51.65	34.76
July	68.53	45.74
August	60.95	40.68
September	48.29	32.88
October	44.72	36.51
November	48.87	39.87
December	67.49	56.49

Table #5 Losses

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>
Expansion Factor =	1.08640	1.08640	1.08640	1.08261	1.08261	1.08640
Expansion Factor (net Marginal Losses)	1.07635	1.07635	1.07338	1.07261	1.06614	1.07635

Table #6 Summary of Average BGS Energy Only Unit Costs @ customer - PJM Time Periods

based on Forwards prices corrected for basis differential & losses in \$/MWh

		<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>
Summer - all hrs	\$	53.74	\$ 51.39	\$ 47.82	\$ 52.36	\$ 52.23	\$ 53.36
	PJM on pk \$	63.08	\$ 62.59	\$ 61.95	\$ 61.63	\$ 61.47	\$ 62.35
	PJM off pk \$	42.35	\$ 42.28	\$ 42.28	\$ 41.59	\$ 41.51	\$ 42.06
Winter - all hrs	\$	63.84	\$ 64.65	\$ 63.59	\$ 64.11	\$ 62.79	\$ 63.36
	PJM on pk \$	69.57	\$ 71.43	\$ 72.24	\$ 69.63	\$ 68.23	\$ 68.52
	PJM off pk \$	57.97	\$ 59.12	\$ 59.49	\$ 58.07	\$ 56.84	\$ 57.52
Annual	\$	59.44	\$ 59.54	\$ 59.22	\$ 60.85	\$ 59.77	\$ 59.74
System Total	\$	59.55					

Table #7 Summary of Average BGS Energy Only Costs @ customer - PJM Time Periods

based on Forwards prices corrected for basis differential & losses in \$1000

		<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>
Summer - all hrs	\$	16,364	\$ 7	\$ 207	\$ 92	\$ 75	\$ 7,686
	PJM on pk \$	10,551	\$ 4	\$ 75	\$ 58	\$ 47	\$ 5,003
	PJM off pk \$	5,813	\$ 3	\$ 131	\$ 34	\$ 27	\$ 2,683
Winter - all hrs	\$	25,170	\$ 13	\$ 718	\$ 293	\$ 224	\$ 16,077
	PJM on pk \$	13,887	\$ 7	\$ 262	\$ 166	\$ 127	\$ 9,234
	PJM off pk \$	11,283	\$ 7	\$ 456	\$ 127	\$ 97	\$ 6,843
Annual	\$	41,533	\$ 20	\$ 925	\$ 385	\$ 298	\$ 23,763
System Total	\$	66,924					

Table #8 Summary of Average BGS Energy Only Unit Costs @ customer - RECO Time Periods
based on Forwards prices corrected for basis differential & losses - RECO billing time periods in \$/MWh

		<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>SC1 TOD</u>
Summer - all hrs	\$	53.74	\$ 51.39	\$ 47.82	\$ 52.36	\$ 52.23	\$ 53.36	53.74
			\$ 63.26				\$	67.99
			\$ 42.95				\$	47.26
Winter - all hrs	\$	63.84	\$ 64.65	\$ 63.59	\$ 64.11	\$ 62.79	\$ 63.36	63.84
			\$ 72.59				\$	72.62
			\$ 60.28				\$	61.02
Annual Average	\$	59.44	\$ 59.54	\$ 59.22	\$ 60.85	\$ 59.77	\$ 59.74	59.44
System Average	\$	59.55						

Table #9 Generation & Transmission Obligations and Costs and Other Adjustments
Obligations - annual average forecasted for 2022; costs are market estimates in MW

		<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>Total FP</u>	
Gen Obl - MW		303.503	0.116	2.803	0.0	0.0	82.848	389.270	TRUE
Trans Obl - MW		294.013	0.110	2.774	0.0	0.0	81.490	378.387	TRUE
# of Months and Days used in this analysis									
			# of summer days =	122	# of summer months =		4		
			# of winter days =	244	# of winter months =		8		
					total # months =		12		
Transmission Cost*	\$	42,548	per MW-yr	116.25					
Generation Capacity cost (see Table 19)	summer		\$71.12	\$/MW/day	Resulting avg gen cap cost =	summer >>	\$	25.96	per kW/yr
	winter		\$56.32	\$/MW/day		winter >>	\$	20.56	per kW/yr
Current residential summer BGS charges									
Current Tariff and % of total summer usage									
		----- SC1 -----							
		Charges		% usage					
Block 1 (0-600 kWh/month)		4.599	¢/kWh	42.97%					
Block 2 (>600 kWh/m)		9.956	¢/kWh	57.03%					
Calculated inversion =		5.357	¢/kWh						

Table #10 Ancillary Services
forecasted overall annual average

\$18.95 /MWh

Table #11 Summary of Obligation Costs Expressed as \$/MWh @ customer (for non-demand rates only)

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC1 TOD</u>
Transmission Obl - all months \$	17.90 \$	13.89 \$	7.56 \$	- \$	- \$	17.90
Generation Obl -						
per annual MWh \$	9.74 \$	7.72 \$	4.03 \$	- \$	- \$	9.74
per summer MWh \$	8.65 \$	7.74 \$	5.63 \$	- \$	- \$	8.65
per winter MWh \$	10.58 \$	7.70 \$	3.41 \$	- \$	- \$	10.58

Table #12 Summary of BGS Unit Costs @ customer

NON-DEMAND RATES (includes energy, G&T obligations, and Ancillary Services - adjusted to billing time periods in \$/MWh)

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC1 TOD</u>
Summer - all hrs \$	99.24 \$	91.97 \$	79.96 \$	71.31 \$	71.18 \$	99.24
RECO On pk \$		114.72				132.87
RECO Off pk \$		75.79				84.12
Block 1 \$	68.69					
Block 2 \$	122.26					
Winter - all hrs \$	111.28 \$	105.19 \$	93.51 \$	83.06 \$	81.74 \$	111.28
RECO On pk \$		127.10				152.98
RECO Off pk \$		93.12				97.87
Annual -all hrs \$	106.03 \$	100.09 \$	89.76 \$	79.80 \$	78.72 \$	106.03

DEMAND RATES (includes energy and Ancillary Services, G&T obligations charged separately - adjusted to billing time periods in \$/MWh)

	<u>SC2 Dem</u>	PLUS:		
Summer - all hrs \$	72.31		<u>Gen Cost (per kW of Billed Demand/Month)</u>	
				≤ 5 kW > 5 kW
Winter - all hrs \$	82.31		summer \$	0.432 \$ 1.677
			winter \$	0.625 \$ 1.455
			<u>Trans cost</u>	
Annual - all hrs per MWh only \$	78.69		all months \$	3.55 per kW of T obl /month

Table #12 (Continued)

<u>Including T&G Obligation \$</u>		<u>Gen Cost (per kW of Billed Demand/Month)</u>			
Summer - all hrs	\$ 86.32				
			≤ 5 kW	> 5 kW	
Winter - all hrs	\$ 97.27	summer	\$ 0.432	\$	1.677
		winter	\$ 0.625	\$	1.455
Annual - including T&G Obl \$	\$ 92.08				

ALL RATES

Grand Total Cost in \$1000 = \$ 113,046
 All-In Average cost @ customer = \$ 100.59 per MWh at customer (per customer metered MWh)
 All-In Average costs @ transmission nodes = \$ 93.47 per MWh at transmission nodes (per metered MWh at transmission node)

Table #13 Ratio of BGS Unit Costs @ customer to All-In Average Cost @ transmission nodes

NON-DEMAND RATES

Includes energy, G&T obligations, and Ancillary Services - adjusted to billing time periods

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC1 TOD</u>
Summer - all hrs	1.062		0.855	0.763	0.762	
RECO On pk		1.227				1.422
RECO Off pk		0.811				0.900
Constant Blk 1 \$	(30.55)					
Constant Blk 2 \$	23.02					
Winter - all hrs	1.191		1.000	0.889	0.875	
RECO On pk		1.360				1.6370
RECO Off pk		0.996				1.0470
Annual - all hrs	1.134	1.071	0.960	0.854	0.842	1.1340

Table #13 (Continued)

DEMAND RATES

Includes energy and Ancillary Services, G&T obligations charged separately - adjusted to billing time periods

	SC2 Dem Multiplier		SC2 Dem Constant	PLUS:			
Summer - all hrs	0.923	\$	(14.008)	<u>Gen Cost (per kW of Billed Demand/Month)</u>			
						≤ 5 kW	> 5 kW
Winter - all hrs	1.041	\$	(14.950)	summer	\$	0.43	\$ 1.68
				winter	\$	0.63	\$ 1.46
Annual - including T&G Obl \$	0.985			<u>Trans cost</u>			
				all months	\$	3.546	per kW of T obl /month

Table #14 Summary of BGS Unit Costs Less Transmission @ customer

NON-DEMAND RATES

Includes energy, generation capacity obligation, and Ancillary Services - adjusted to billing time periods. Transmission billed at retail tariff level. in \$/MWh

		SC1		SC3		SC2 ND		SC4		SC6		SC1 TOD
Summer - all hrs	\$	81.33	\$	78.09	\$	72.40	\$	71.31	\$	71.18	\$	81.33
			\$	100.83							\$	114.97
			\$	61.90							\$	66.21
	Block 1 \$	50.78										
	Block 2 \$	104.35										
Winter - all hrs	\$	93.37	\$	91.30	\$	85.95	\$	83.06	\$	81.74	\$	93.37
			\$	113.21							\$	135.08
			\$	79.23							\$	79.97
Annual -all hrs	\$	88.13	\$	86.20	\$	82.20	\$	79.80	\$	78.72	\$	88.13

Table #14 (Continued)

DEMAND RATES

Includes energy and Ancillary Services, generation obligation charged separately - adjusted to billing time periods. Transmission billed at retail tariff level. In \$/MWh.

	<u>SC2 Dem</u>	PLUS:			
		<u>Gen Cost (per kW of Billed Demand/Month)</u>			
				<u>< 5 kW</u>	<u>> 5 kW</u>
Summer - all hrs	\$ 72.31				
Winter - all hrs	\$ 82.31	summer	\$ 0.432	\$	1.677
		winter	\$ 0.625	\$	1.455
Annual - all hrs per MWh only	\$ 78.69				
<u>Including Generation Obligation \$</u>					
Summer - all hrs	\$ 78.29				
Winter - all hrs	\$ 88.15				
Annual - including T&G Obl \$	\$ 84.58				

ALL RATES

Grand Total Cost in \$1000 = \$	97,433		
All-In Average cost @ customer = \$		86.70	per MWh at customer (per customer metered MWh)
All-In Average costs @ transmission nodes = \$		80.56	per MWh at transmission node system (per metered MWh at transmission node)

Table #15 Ratio of BGS Unit Costs Less Transmission @ customer to All-In Average Cost @ transmission nodes

NON-DEMAND RATES

Includes energy, G&T obligations, and Ancillary Services - adjusted to billing time periods

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC1 TOD</u>
Summer - all hrs	1.010		0.899	0.885	0.884	
RECO On pk		1.252				1.427
RECO Off pk		0.768				0.822
Constant Blk 1 \$	(30.55)					
Constant Blk 2 \$	23.02					
Winter - all hrs	1.159		1.067	1.031	1.015	
RECO On pk		1.405				1.677
RECO Off pk		0.983				0.993
Annual - all hrs	1.094	1.070	1.020	0.991	0.977	1.094

DEMAND RATES

includes energy and Ancillary Services, G&T obligations charged separately - adjusted to billing time periods

	<u>SC2 Dem Multiplier</u>	<u>SC2 Dem Constant</u>	PLUS:			
			<u>Gen Cost (per kW of Billed Demand/Month)</u>			
				<u>< 5 kW</u>		<u>> 5 kW</u>
Summer - all hrs	0.972	(5.985)				
Winter - all hrs	1.094	(5.840)	summer	\$ 0.432	\$	1.677
			winter	\$ 0.625	\$	1.455
Annual - including T&G Obl \$	1.050					

Table #16 Summary of Total BGS Costs by Season

		<u>SC1</u>		<u>SC3</u>		<u>SC2 ND</u>		<u>SC4</u>		<u>SC6</u>		<u>SC2 Dem</u>		<u>SC1 TOD</u>
Total Costs by Rate - in \$1000														
Summer	\$	30,219	\$	12	\$	346	\$	125	\$	102	\$	12,291	\$	30,219
Winter	\$	43,869	\$	22	\$	1,056	\$	380	\$	291	\$	24,335	\$	43,869
Total	\$	74,089	\$	34	\$	1,401	\$	505	\$	393	\$	36,625	\$	74,089
% of Annual Total \$ by Rate														
Summer		41%		35%		25%		25%		26%		34%		41%
Winter		59%		65%		75%		75%		74%		66%		59%
Total Costs - in \$1000														
Summer	\$	43,095												
Winter	\$	69,952												
Total	\$	113,046												
% of Annual Total \$														
Summer		38%												
Winter		62%												

If total \$ were split on a per MWh basis (on transmission node MWhs):

Ratio to All-In Cost
 Summer **0.9390**
 Winter **1.0417**

Table #17 Summary of Total BGS Costs by Season - Less Transmission

		<u>SC1</u>		<u>SC3</u>		<u>SC2 ND</u>		<u>SC4</u>		<u>SC6</u>		<u>SC2 Dem</u>		<u>SC1 TOD</u>
Total Costs by Rate - in \$1000														
Summer	\$	24,768	\$	10	\$	313	\$	125	\$	102	\$	11,135	\$	24,768
Winter	\$	36,811	\$	19	\$	970	\$	380	\$	291	\$	22,023	\$	36,811
Total	\$	61,579	\$	29	\$	1,283	\$	505	\$	393	\$	33,158	\$	61,579
% of Annual Total \$ by Rate														
Summer		40%		35%		24%		25%		26%		34%		40%
Winter		60%		65%		76%		75%		74%		66%		60%
Total Costs - in \$1000														
Summer	\$	36,453												
Winter	\$	60,494												
Total	\$	96,947												
% of Annual Total \$														
Summer		38%												
Winter		62%												

If total \$ were split on a per MWh basis (on transmission node MWhs):

Ratio to All-In Cost
 Summer **0.9216**
 Winter **1.0452**

Table #18 Forward Energy Prices

PJM Forward Prices - Energy Only @ bulk system <i>in \$/MWh</i>	<u>On-Peak</u>	<u>Off/On Peak LMP ratio</u>	Zone to Western Hub Basis Differential <i>in \$/MWh</i>			PJM Forward Prices (incl basis differential) <i>in \$/MWh</i>	
			<u>Off-Peak</u>	<u>On-Peak</u>	<u>Off-Peak</u>	<u>On-Peak</u>	<u>Off-Peak</u>
January	105.85	0.7862	83.22	91%	95%	96.32	79.06
February	98.35	0.7862	77.32	91%	95%	89.50	73.45
March	56.95	0.7862	44.77	91%	95%	51.82	42.53
April	50.35	0.7862	39.59	91%	95%	45.82	37.61
May	50.45	0.7862	39.66	91%	95%	45.91	37.68
June	59.30	0.6456	38.28	88%	91%	52.18	34.83
July	77.45	0.6456	50.00	88%	91%	68.16	45.50
August	68.60	0.6456	44.29	88%	91%	60.37	40.30
September	55.65	0.6456	35.93	88%	91%	48.97	32.70
October	49.80	0.7862	39.15	91%	95%	45.32	37.19
November	52.90	0.7862	41.59	91%	95%	48.14	39.51
December	69.95	0.7862	54.99	91%	95%	63.65	52.24

NYISO Forward Prices - Energy Only @ bulk system
in \$/MWh

	<u>On-Peak</u>	<u>Off-Peak</u>
January	135.25	122.25
February	129.25	118.25
March	68.25	57.50
April	47.75	41.25
May	40.75	34.50
June	47.75	34.25
July	71.25	47.50
August	65.25	43.50
September	43.25	34.25
October	40.25	31.50
November	54.25	42.50
December	96.00	88.00

Weighted Average Forward Prices - Energy Only @ bulk system (88.1% PJM - 11.9% NYISO)
in \$/MWh

	<u>On-Peak</u>	<u>Off-Peak</u>
January	100.94	84.19
February	94.22	78.77
March	53.77	44.31
April	46.05	38.04
May	45.30	37.30
June	51.65	34.76
July	68.53	45.74
August	60.95	40.68
September	48.29	32.88
October	44.72	36.51
November	48.87	39.87
December	67.49	56.49

Table #19 Generation Capacity Prices (\$/MW/Day)

	<u>PJM Base Capacity</u>	<u>PJM 88.1%</u>	<u>NYISO 11.9%</u>	<u>Weighted Average</u>
Summer	\$53.53	\$53.53	\$201.69	\$71.12
Winter	\$53.53	\$53.53	77.00	\$56.32

Table #20 Ancillary Services

	<u>PJM Ancillary Services</u>	<u>NYISO Ancillary Services</u>	<u>Renewable Power Cost</u>	<u>PJM 88.1%</u>	<u>NYISO 11.9%</u>	<u>Weighted Average</u>
	\$2.00	\$2.24	\$16.92	\$18.92	\$19.16	\$18.95

Assumptions:

- Gen Cost = \$71.12 per MW-day in summer
\$56.32 per MW-day in winter
- Trans cost = \$ 42,548 per MW-yr
- Analysis time period = 4 summer months
8 winter months
- Ancillary Services = \$ 18.95 /MWh
- Energy Costs = Based on Jun 2023 to May 2024 Forwards @ PJM West as of January 04, 2023
Based on Jun 2023 to May 2024 Forwards @ NYISO Zone G and Lower Hudson Valley (LHV) as of January 18, 2023
- Usage patterns = Forecasted 2022 energy use by class, PJM on/off % from 2021 class load profiles,
RECO billing on/off % from 6/21 to 5/22 actual data
- Obligations = Class totals for 2022
- Losses = Per RECO's Third Party Supplier Agreement adjusted for PJM 500kV losses and inadvertent energy.
- PJM Time Periods = PJM trading time periods - 7 AM to 11 PM weekdays, local time, x NERC
Holidays - New Year's, Memorial, 4th of July, Labor Day, Thanksgiving & Christmas
- RECO Billing time periods = as per specific rate schedule

Table B Ratio of BGS Unit Costs Less Transmission @ customer to All-In Average Cost @ transmission nodes
 (from Table 15 of Bid Factor Spreadsheet)

NON-DEMAND RATES

includes energy, G&T obligations, and Ancillary Services - adjusted to billing time periods

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC1 TOD</u>
Summer - all hrs	1.010		0.899	0.885	0.884	
RECO On pk		1.252				1.427
RECO Off pk		0.768				0.822
Constant Blk 1 \$	(30.55)					
Constant Blk 2 \$	23.02					
Winter - all hrs	1.159		1.067	1.031	1.015	
RECO On pk		1.405				1.677
RECO Off pk		0.983				0.993
Annual - all hrs	1.094	1.070	1.020	0.991	0.977	1.094

DEMAND RATES

includes energy and Ancillary Services, G&T obligations charged separately - adjusted to billing time periods

	<u>SC2 Dem Multiplier</u>	<u>SC2 Dem Constant</u>	PLUS:		
			<u>Gen Cost (per kW of Billed Demand/Month)</u>		
			<u>0</u>	<u>< 5 kW</u>	<u>> 5 kW</u>
Summer - all hrs	0.972	(5.985)			
Winter - all hrs	1.094	(5.840)	summer \$	- \$ 0.432	\$ 1.677
			winter \$	- \$ 0.625	\$ 1.455
Annual - including T&G Obl \$	1.050				

Table C Determination of Preliminary Retail Rates to be Charged to BGS Customers

All-In Average costs @ Trans node =	\$ 78.23 /MWh*	* Price from Table A (which does not include
Less Transmission	\$ - /MWh**	transmission for the Central/Western Division).
BGS Cost	\$ 78.23 /MWh	

Retail BGS Rates (excl SUT) (¢/kWh)

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>SC1 TOD</u>
<u>Summer</u>							
All kWh (¢/kWh)	7.901		7.033	6.923	6.916	7.005	
Peak kWh (¢/kWh)		9.794					11.163
Off-Peak kWh (¢/kWh)		6.008					6.431
Block1	4.846						
Block2	10.203						
Demand Charge (\$/kW) 1st 5kW						0.432	
Demand Charge (\$/kW) > 5 kW						1.677	
<u>Winter</u>							
All kWh (¢/kWh)	9.067		8.347	8.066	7.940	7.974	
Peak kWh (¢/kWh)		10.991					13.119
Off-Peak kWh (¢/kWh)		7.690					7.768
Demand Charge (\$/kW) 1st 5kW						0.625	
Demand Charge (\$/kW) > 5 kW						1.455	

Table D Calculation of Rate Adjustment Factors

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>SC1 TOD</u>
Total BGS Revenue (Excl SUT) - in \$1000							
Summer	\$ 24,060	\$ 10	\$ 304	\$ 122	\$ 99	\$ 10,953	\$ 24,029
Winter	\$ 35,745	\$ 18	\$ 942	\$ 369	\$ 283	\$ 21,713	\$ 35,754
Total	\$ 59,805	\$ 28	\$ 1,246	\$ 491	\$ 382	\$ 32,666	\$ 59,783
Total							
Summer	\$ 35,548						
Winter	\$ 59,070						
Total	\$ 94,618						
<u>Total Supplier Payments - in \$1000</u>							
Eastern Division	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>				
Summer	\$ 34,321		\$ 34,321				
Winter	\$ 50,221		\$ 50,221				
Total	\$ 84,543	\$ -	\$ 84,543				
Central/Western Division	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>				
Summer	\$ 4,127	\$ -	\$ 4,127				
Winter	\$ 5,983	\$ -	\$ 5,983				
Total	\$ 10,110	\$ -	\$ 10,110				
Total RECO FP	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>				
Summer	\$ 38,448	\$ -	\$ 38,448				
Winter	\$ 56,204	\$ -	\$ 56,204				
Total	\$ 94,653	\$ -	\$ 94,653				
Differences	<u>BGS Revenue</u>	<u>BGS Costs</u>	<u>Difference</u>				
Summer	\$ 35,548	\$ 38,448	\$ 2,900				
Winter	\$ 59,070	\$ 56,204	\$ (2,866)				
Total	\$ 94,618	\$ 94,653	\$ 35				
					Rate Adjustment Factors		
					1.08159		
					0.95149		

Table E Final Retail BGS Rates (¢/kWh)

Rates Excluding SUT:

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>SC1 TOD</u>
<u>Summer</u>							
All kWh (¢/kWh)	8.546		7.607	7.488	7.480	7.577	
Peak kWh (¢/kWh)		10.593					12.074
Off-Peak kWh (¢/kWh)		6.498					6.956
Block1	5.241						
Block2	11.035						
Demand Charge (\$/kW) 1st 5kW						0.467	
Demand Charge (\$/kW) > 5 kW						1.814	
<u>Winter</u>							
All kWh (¢/kWh)	8.627		7.942	7.675	7.555	7.587	
Peak kWh (¢/kWh)		10.458					12.483
Off-Peak kWh (¢/kWh)		7.317					7.391
Demand Charge (\$/kW) 1st 5kW						0.595	
Demand Charge (\$/kW) > 5 kW						1.384	

Rates Including SUT:

	SUT @						
		6.625%					
	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>	<u>SC1 TOD</u>
<u>Summer</u>							
All kWh (¢/kWh)			8.111	7.984	7.976	8.079	
Peak kWh (¢/kWh)		11.295					12.874
Off-Peak kWh (¢/kWh)		6.928					7.417
Block1	5.588						
Block2	11.766						
Demand Charge (\$/kW) 1st 5kW						0.50	
Demand Charge (\$/kW) > 5 kW						1.93	
<u>Winter</u>							
All kWh (¢/kWh)	9.199		8.468	8.183	8.056	8.090	
Peak kWh (¢/kWh)		11.151					13.310
Off-Peak kWh (¢/kWh)		7.802					7.881
Demand Charge (\$/kW) 1st 5kW						0.63	
Demand Charge (\$/kW) > 5 kW						1.48	

Table F Spreadsheet Error Checking

Total BGS Revenue (Excl SUT) - in \$1000

	<u>SC1</u>	<u>SC3</u>	<u>SC2 ND</u>	<u>SC4</u>	<u>SC6</u>	<u>SC2 Dem</u>
Summer	\$ 26,024	\$ 11	\$ 329	\$ 131	\$ 107	\$ 11,847
Winter	\$ 34,011	\$ 17	\$ 897	\$ 351	\$ 269	\$ 20,659
Total	\$ 60,035	\$ 28	\$ 1,226	\$ 482	\$ 376	\$ 32,506
Total						
Summer	\$ 38,449					
Winter	\$ 56,204					
Total	\$ 94,653					

Supplier Payments - in \$1000

Eastern Division

	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>
Summer	\$ 34,321	\$ -	\$ 34,321
Winter	\$ 50,221	\$ -	\$ 50,221
Total	\$ 84,543	\$ -	\$ 84,543

Central/Western Division

	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>
Summer	\$ 4,127	\$ -	\$ 4,127
Winter	\$ 5,983	\$ -	\$ 5,983
Total	\$ 10,110	\$ -	\$ 10,110

Total RECO FP

	<u>Total</u>	<u>Transmission</u>	<u>Net BGS</u>
Summer	\$ 38,448	\$ -	\$ 38,448
Winter	\$ 56,204	\$ -	\$ 56,204
Total	\$ 94,653	\$ -	\$ 94,653

Differences

	<u>BGS Revenue</u>	<u>BGS Costs</u>	<u>Difference</u>
Summer	\$ 38,449	\$ 38,448	\$ (1)
Winter	\$ 56,204	\$ 56,204	\$ 0
Total	\$ 94,653	\$ 94,653	\$ (0)