

June 28, 2023

The Honorable Chair and Members of the Hawai'i Public Utilities Commission Kekuanao'a Building, First Floor 465 South King Street Honolulu, Hawai'i 96813

Dear Commissioners:

Subject: Maui Electric Energy Cost Recovery Factor for July 2023

Maui Electric Company, Limited's ("Maui Electric" or "Company") July 2023 Energy Cost Recovery factor for our Maui Division is 23.122 cents per kilowatt-hour ("kWh"), a decrease of 0.274 cents per kWh from last month. A residential customer consuming 500 kWh of electricity will be paying \$205.68, a decrease of \$1.02 compared to rates effective June 1, 2023. The decrease in the typical residential bill is due to the decrease in the Energy Cost Recovery factor (-\$1.37) and decrease in the Green Infrastructure Fee (-\$0.05), partially offset by the increase in the Public Benefits Fund Surcharge (+\$0.36), the increase in the impact of the RBA Rate Adjustment (+\$0.03) and increase in the Purchase Power Adjustment (+\$0.01).

The Company's Maui Division fuel composite cost of generation, central station and other decreased 134.870 cents per million BTU to 1,814.96 cents per million BTU. The composite cost of DG energy is 0.00 cents per kWh. The composite cost of purchased energy increased 0.051 cents per kWh to 20.705 cents per kWh.

The Energy Cost Recovery factor for our Lāna'i Division for July 2023 is 28.448 cents per kWh, a decrease of 2.992 cents per kWh from last month. A residential customer consuming 400 kWh of electricity will be paying \$190.49, a decrease of \$11.72 compared to rates effective June 1, 2023. The decrease in the typical residential bill is due to the decrease in the Energy Cost Recovery factor (-\$11.97) and decrease in the Green Infrastructure Fee (-\$0.05), partially offset by the increase in the Public Benefits Fund Surcharge (+\$0.28) and increase in the impact of the RBA Rate Adjustment (+\$0.02).

The Company's Lāna'i Division fuel composite cost of generation, central station and other decreased 262.93 cents per million BTU to 2,450.61 cents per million BTU. The composite cost DG energy is 0.00 cents per kWh. The composite cost of purchased energy is 30.00 cents per kWh.

The Energy Cost Recovery factor for our Moloka'i Division for July 2023 is 24.467 cents per kWh, a decrease of 3.565 cents per kWh from last month. A residential customer consuming 400 kWh of electricity will be paying \$182.57, a decrease of \$14.01 compared to rates effective June 1, 2023. The decrease in the typical residential bill is due to the decrease in the Energy

The Honorable Chair and Members of the Hawai'i Public Utilities Commission June 28, 2023 Page 2

Cost Recovery factor (-\$14.26) and decrease in the Green Infrastructure Fee (-\$0.05), partially offset by the increase in the Public Benefits Fund Surcharge (+\$0.28) and the increase in the impact of the RBA Rate Adjustment (+\$0.02).

The Company's Moloka'i Division fuel composite cost of generation, central station and other decreased 298.39 cents per million BTU to 1,998.78 cents per million BTU. The composite cost of DG energy is 0.00 cents per kWh. The composite cost of purchased energy is 21.80 cents per kWh.

The attached sheets set forth the fuel adjustment in cents per kWh for each rate schedule that is applicable for pro rata use beginning July 1, 2023.

Sincerely,

/s/ Dean K. Matsuura

Dean K. Matsuura Director, Regulatory Rate Proceedings Hawaiian Electric Company, Inc.

Attachments

cc: Division of Consumer Advocacy

MAUI ELECTRIC COMPANY, LTD. LANAI DIVISION

ENERGY COST RECOVERY FACTOR

	EFFECTIV 6/01/2023	VE DATES 7/01/2023	<u>Change</u>
COMPOSITE COSTS Generation, Central Station & Other, ¢/mbtu DG Energy, ¢/kWh Purchased Energy, ¢/kWh	2,713.54 0.00 30.00	2,450.61 0.00 30.00	(262.93) 0.00 0.00
Residential Schedule "R"			
Energy Cost Recovery, ¢/kWh	31.440	28.448	(2.992)
Others - "G,J,P,F"			
Energy Cost Recovery, ¢/kWh	31.440	28.448	(2.992)
Residential Customer with			
400 KWH Consumption, \$/Bill	202.21	190.49	(11.72)
500 KWH Consumption, \$/Bill	250.93	236.32	(14.61)

Supersedes Sheet Effective: 6/01/2023

MAUI ELECTRIC COMPANY, LTD. LANAI DIVISION

ENERGY COST RECOVERY (ECR) FILING

ENERGY COST RECOVERY (ECR) FILING - July 1, 2023 (page 1 of 2)

Line
1 Effective Date
2 Supercedes Factors of July 1, 2023 June 1, 2023

GENERATION COMPONENT

	CENTRAL STATION		1	
	FUEL PRICES, ¢/mmbtu			
	Industrial	0.00		
	Diesel - Miki Basin	2,450.61		
5	Other	0.00		
ь	Other	0.00		
	BTU MIX, %		DG ENERGY COMPONENT	
7	Industrial	0.00%	25 COMPOSITE COST OF DG	
8	Diesel - Miki Basin	100.00%	ENERGY, ¢/kWh	0.000
9			•	
10	Other	0.00%	26 % Input to System kWh Mix	0.00%
		100.00%		
	ACMPOSITE ASST OF SEMERATION		27 WEIGHTED COMPOSITE DG ENERGY	
11	COMPOSITE COST OF GENERATION,	0.450.04	COST, ¢/kWh (Lines 25 x 26)	0.00000
	CENTRAL STATION + OTHER ¢/mmbtu (Lines (3 x 7) + (4 x 8) + (5 x 9) + (6 x 10))	2,450.61		
12	% Input to System kWh Mix	98.05%	28 BASE DG ENERGY COMP COST	0.000
	70 input to Gyotom KVVII Mix	00.0070	29 Base % Input to System kWh Mix	0.00%
	EFFICIENCY FACTOR, mmbtu/kWh		30 WEIGHTED BASE DG ENERGY COST,	
	(A) (B) (C)	(D)	¢/kWh (Line 28 x 29)	0.00000
	Percent of			
	Eff Factor Centrl Stn +	Weighted	31 Cost Less Base (Line 27 - 30)	0.00000
	Fuel Type mmbtu/kwh Other	Eff Factor	32 Loss Factor	1.0500
13	Industrial 0.000000 0.00	0.000000	33 Revenue Tax Req Multiplier	1.0975
14 15	Diesel 0.010722 100.00 Other 0.010722 0.00	0.010722 0.000000	34 DG FACTOR,	0.00000
15	(Lines 13, 14, 15): Col(B) x Col(C) = Col(D)	0.000000	¢/kWh (Line 31 x 32 x 33)	0.00000
16	Weighted Efficiency Factor, mmbtu/kWh			
	[lines 13(D) + 14(D) + 15(D)]	0.010722		
17	WEIGHTED COMPOSITE CENTRAL STATION	+		
	OTHER GEN COST, ¢/kWh			
	(lines (11 x 12 x 16))	25.76307		
40	DACE CENTRAL CTATION : OTHER CENERA	TION		
18	BASE CENTRAL STATION + OTHER GENERA COST, ¢/mmbtu	TION		
10	Base % Input to Sys kWh Mix	0.00%		
	Efficiency Factor, mmbtu/kwh	0.0070		
	WEIGHTED BASE CENTRAL STATION +			
	OTHER GENERATION COST ¢/kWh			
	(lines (18 x 19 x 20))	-		
			SUMMARY OF	
	COST LESS BASE (line(17 - 21))	25.76307	TOTAL GENERATION FACTOR, ¢/kWh	00.0740-
	Revenue Tax Req Multiplier	1.0975	35 CNTRL STN + OTHER (line 24)	28.27497
	CENTRAL STATION + OTHER GENERATION FACTOR, ¢/kWh (line (22 x 23))	28.27497	36 DG (line 34) 37 TOTAL GENERATION FACTOR.	-
	FACTOR, \$/KVVII (IIIIe (22 x 23))	20.21491	¢/kWh (lines 35 + 36)	28.27497
			φ/λ(VVII (IIIIes 00 1 00)	20.21431

MAUI ELECTRIC COMPANY, LTD. LANAI DIVISION

ENERGY COST RECOVERY (ECR) FILING

ENERGY COST RECOVERY (ECR) FILING - July 1, 2023 (page 2 of 2)

Line
1 Effective Date
2 Supercedes Factors of July 1, 2023 June 1, 2023

ĺ	Line	PURCHASED ENERGY COMPON	<u>ENT</u>
		PURCHASED ENERGY PRICE, ¢/kWh - FOSS PURCHASED ENERGY PRICE, ¢/kWh - RENE	
	38 39	LANAI SOLAR RESEARCH - On Peak - Off Peak	30.000 30.000
ı	40	Sch Q	0.000
	41 42	PURCHASED ENERGY KWH MIX, %, FOSSIL PURCHASED ENERGY KWH MIX, %, RENEW LANAI SOLAR RESEARCH - On Peak - Off Peak	ABLE 100.00% 0.00%
	43A 43B 43C	Sch Q Total Fossil % Total Renewable % Comp. cost of purch. energy, fossil ¢/kWh Comp. cost of purch. energy, renewable ¢/kWh	0.00% 0.00% 100.00% N/A 30.00
	45	COMPOSITE COST OF PURCHASED ENERGY, ¢/kWh (Lines (38 x 41) + (39 x 42) + (40 x 43)) % Input to System kWh Mix WEIGHTED COMP. PURCH. ENERGY	30.000 1.95% 0.58500
	48	COST, ¢/kWh (lines (44 x 45)) BASE PURCHASED ENERGY COMPOSITE COST, ¢/kWh Base % Input to Sys kWh Mix WEIGHTED BASE PURCHASED ENERGY COST, ¢/kWh (lines (47 x 48))	0.000 0.000 0.00000
	51 52	COST LESS BASE(lines (46 - 49)) Loss Factor Revenue Tax Req Multiplier PURCHASED ENERGY FACTOR, ¢/kWh (lines (50 x 51 x 52))	0.58500 1.050 1.0975 0.67414

culatio	on of Monthly Fossil Fuel Cost Risk Sharing Component	
	Baseline Diesel	
54	Diesel \$, baseline month	\$936,16
55	Diesel mmbtu, baseline	30,062
56	Baseline Diesel, c/mmbtu	3,114.1
	Month Diesel	
57	Diesel mmbtu, budget	31,01
58	Diesel Cost, ¢/mmbtu	2,450.6
59	Diesel ECRC Fossil Cost	\$759,92
60	Diesel Base ECRC Recovery Target	\$965,67
61	Diesel differential	-\$205,75
62	Total Fossil	-\$205,75
63	2% of above	-\$4,1
64	Total Monthly Fossil Fuel Cost Risk Sharing, Prior Months in Year	-\$7,3°
65	Maximum Annual Cap (bi-directional)	\$31,50
66	Number of Days in year from implementation	36
67	Fossil Risk % Proration (based on 365 day year)	100.00
68	Maximum Annual Cap (bi-directional) prorated	\$31,50
69	Applicable Monthly Fossil Fuel Cost Risk Sharing	-\$4,11
70	Total Monthly Fossil Fuel Cost Risk Sharing, Including This Month	-\$11,42
71	Fossil Cost Risk Sharing before taxes	-\$4,1
72	Revenue Tax Adjustment	1.09751
73	Fossil Cost Risk Sharing w/revenue tax	-\$4,5
74	Forecasted Month MWh Sales	2,95
75	Fossil Fuel Cost Risk Sharing Component, ¢/kWh	0.152

<u>Line</u>	SYSTEM COMPOSITE CALCULATIONS	
76	GENERATION AND PURCHASED ENERGY FACTOR, ¢/kWh (lines (37 + 53))	28.94911
	Adjustment, ¢/kWh Fossil Fuel Cost Risk Sharing Component	0.000 0.153
	ECR Reconciliation Adjustment	(0.654)
80	ECR FACTOR, ¢/kWh (lines (76 + 77 + 78 + 79))	28.448

Maui Electric Company, Ltd. Lanai Division

MONTH END FUEL OIL ESTIMATE

<u> Miki Basin - ULSD</u>	Barrels	MBTU	\$
6/21/2023	4,959.17	28,416.04	719,111.08
Estimated Use	1,544.71	8,851.19	240,180.53
Estimated Received	1,428.57	8,185.71	200,932.94
Estimated Additional	568.84	3,259.44	80,069.77
Estimated End	5,411.87	31,010.00	759,933.26
Next Month's Combined Miki E	Expense (\$/bbl)	\$ 140.4197 /bbl	

FUEL OIL INVENTORY PRICE USED FOR FILING

Type of Oil Burned	<u>Price</u>	Conversion Factor	Prices ¢/MBTU
Diesel - Miki Basin	\$ 140.4197	5.73 BTU/BBL	2,450.61

MAUI ELECTRIC COMPANY, LTD. Lanai Division ECR Reconciliation Adjustment

July 2023

Amount to be refunded	(\$52,900)
2. Monthly amount (1 / 3 X Line 1)	(\$17,633)
3. Revenue Tax Divisor	0.91115
4. Total (Line 2 / Line 3)	(\$19,352)
5. Estimated Sales (July 2023)	2,958 mwh
6. Adjustment (Line 4 ÷ Line 5)	-0.654 ¢/kwh

MAUI ELECTRIC COMPANY, LTD. LANAI DIVISION 2023 Cumulative Reconciliation Balance

	(1)		(2)	(3) FOA Rec	(4)	(5)	(6) Month-end
	YTD FOA		Adjust	Less	Try to	Actual	Cumulative
<u>Month</u>	Reconciliation	<u>Qtr</u>	<u>Variance</u>	<u>Variance</u>	Collect	Collect	<u>Balance</u>
December '21					(22,367)	(20,800)	27,810
January '22					(22,367)	(20,722)	7,088
February	55,600	(4)	5,451	50,149	(18,533)	(16,329)	40,908
March					(18,533)	(18,196)	22,712
April					(18,533)	(17,076)	5,636
May	68,500	(1)	4,186	64,314	(22,833)	(23,687)	46,263
June					(22,833)	(22,948)	23,315
July					(22,833)	(22,368)	947
August	55,300	(2)	488	54,812	(18,433)	(17,864)	37,895
September					(18,433)	(17,494)	20,401
October					(18,433)	(18,331)	2,070
November	58,900	(3)	1,973	56,927	(19,633)	(18,575)	40,422
December					(19,633)	(18,053)	22,369
January '23					(19,633)	(20,368)	2,001
February	58,300	(4)	2,740	55,560	(19,433)	(19,178)	38,383
March					(19,433)	(19,777)	18,606
April					(19,433)	(19,028)	(422)
May	52,900	(1)	(824)	53,724	(17,633)	(17,785)	35,517
June					(17,633)		
July					(17,633)		
NOTES:							
Col(1):	Quarterly FOA	rec	onciliation a	mounts (Refe	er to Attachme	ent 13)	
331(1).	A positive num			•		•	er-collection.
Col(2):	FOA reconcilia				-		
, ,	starting with th	e fo	urth prior m	onth; the diffe	rence betwee	n the estimat	ted recorded
	sales used to	deriv	e the \$/kwh	n adjustment a	and the actual	recorded sal	es.
	(Col(5) - Col(4))					
Col(3):	FOA reconcilia		•		•	YTD FOA re	conciliation
	difference min		•		` , ` ,		
Col(4):	Amount that th			•		•	` '
Col(5):	Actual collecte	d ar	nount. (reco	orded sales * \$	∌/kwh adjustm	ent/1.09751))

Cumulative balance of the FOA reconciliation (Previous balance + Col(3) + Col(5))

Col(6):

Maui Electric Company, Ltd. Lanai Division Calculations of the Average Residential Customer Bill

Base Rates Base Fuel/Energy Charge Non-fuel Energy Charge First 250 kWhr per month Next 500 kWhr per month Customer Charge Total Base Charges
IRP Refund
Revenue Balancing Rate Adjustment
PBF Surcharge Renewable Energy Infrastructure Cost Recovery Provision SolarSaver Adjustment Energy Cost Recovery Green Infrastructure Fee

Avg Residential Bill at 400 kwh

Rate							
6/01/23 7/01/23							
effective date:	09/01/19	09/01/19					
¢/kWh	0.0000	0.0000					
¢/kWh	12.3123	12.3123					
¢/kWh	14.8123	14.8123					
\$	11.50	11.50					
% on base	0.0000	0.0000					
% of bill	11.88%	11.88%					
excluding ECRC							
¢/kWh	0.6488	0.7195					
¢/kWh	0.0000	0.0000					
¢/kWh	0.0000	0.0000					
¢/kWh	31.440	28.448					
, \$	1.23	1.18					

Charge (f) at 400 Kuch						
Charge (\$) at 400 Kwh						
6/01/23	7/01/23	Difference				
0.00	0.00	0.00				
30.78	30.78	0.00				
22.22	22.22					
		0.00				
11.50	11.50	0.00				
64.50	64.50	0.00				
0.00	0.00	0.00				
8.12	8.14	0.02				
0.12	0.14	0.02				
2.60	2.88	0.28				
0.00	0.00	0.00				
0.00	0.00	0.00				
125.76	113.79	-11.97				
1.23	1.18	-0.05				
1.23	1.10	-0.03				
000.04	400.40					
202.21	190.49					

Increase (Decrease -) % Change

-11.72 -5.80%

Base Rates Base Fuel/Energy Charge Non-fuel Energy Charge First 250 kWhr per month Next 500 kWhr per month Customer Charge Total Base Charges		
IRP Refund		
Revenue Balancing Rate Adjustment		
PBF Surcharge Renewable Energy Infrastructure Cost Recovery Provision SolarSaver Adjustment Energy Cost Recovery Green Infrastructure Fee		
Avg Residential Bill at 500 kwh		

	Rate	
	6/01/23	7/01/23
effective date:	09/01/19	09/01/19
¢/kWh	0.0000	0.0000
¢/kWh	12.3123	12.3123
¢/kWh	14.8123	14.8123
\$	11.50	11.50
Ψ	11.50	11.50
% on base	0.0000	0.0000
% of bill excluding	11.88%	11.88%
ECRC ¢/kWh	0.6488	0.7195
¢/kWh	0.0000	0.0000
¢/kWh	0.0000	0.0000
¢/kWh	31.440	28.448
´ \$	1.23	1.18

Charge (\$) at 500 Kwh		
6/01/23	7/01/23	Difference
0.00	0.00	0.00
30.78	30.78	0.00
37.03	37.03	0.00
11.50	11.50	0.00
79.31	79.31	0.00
0.00	0.00	0.00
9.95	9.99	0.04
3.24	3.60	0.36
0.00 0.00	0.00 0.00	0.00 0.00
157.20	142.24	-14.96
1.23	142.24	-0.05
250.93	236.32	

Increase (Decrease -) % Change

ease -) -14.61 hange -5.82%

Note: Effective June 1, 2023, the RBA Rate Adjustment is billed based on the total billed amount before the RBA rate adjustment excluding the Energy Cost Recovery.

MAUI ELECTRIC COMPANY, LTD. -- Lanai Division FUEL OIL ADJUSTMENT FACTOR DATA

FUEL FACTOR CENTS / KWH

	CENTS / KWH		
	RESIDENTIAL &	RESIDENTI	AL BILL (\$)
EFFECTIVE DATE	COMMERCIAL	@ 400 KWH	@ 500 KWH
January 1, 2020	25.369	173.69	215.49
February 1, 2020	24.109	168.65	209.19
March 1, 2020	23.379	165.73	205.54
April 1, 2020	19.794	151.15	187.31
May 1, 2020	18.958	148.04	183.43
June 1, 2020	15.429	131.79	163.12
July 1, 2020	16.335	134.73	166.81
August 1, 2020	17.755	140.41	173.91
September 1, 2020	18.135	141.93	175.81
October 1, 2020	18.076	141.69	175.51
November 1, 2020	17.881	140.91	174.54
December 1, 2020	17.874	140.89	174.50
January 1, 2021	19.498	147.44	182.68
February 1, 2021	20.640	152.01	188.39
March 1, 2021	22.103	157.86	195.71
April 1, 2021	24.018	165.34	205.06
May 1, 2021	24.354	166.87	206.96
June 1, 2021	23.796	167.38	207.60
July 1, 2021	24.680	171.10	212.26
August 1, 2021	25.269	173.46	215.21
September 1, 2021	25.345	173.76	215.59
October 1, 2021	24.342	169.75	210.57
November 1, 2021	29.191	189.14	234.82
December 1, 2021	29.254	189.40	235.13
January 1, 2022	28.241	189.19	234.87
February 1, 2022	28.361	189.67	235.47
<u> </u>	31.445	202.01	250.89
March 1, 2022			
April 1, 2022	33.341	209.46	260.21
May 1, 2022	37.529	226.35	281.31
June 1, 2022	41.508	240.84	299.43
July 1, 2022	43.106	247.17	307.35
August 1, 2022	43.083	247.08	307.24
September 1, 2022	37.630	225.27	279.97
October 1, 2022	37.815	226.01	280.90
•			
November 1, 2022	37.960	226.59	281.62
December 1, 2022	38.346	228.13	283.55
January 1, 2023	36.114	220.41	273.87
February 1, 2023	36.012	220.00	273.36
March 1, 2023	34.661	214.59	266.61
April 1, 2023	33.234	208.87	259.45
May 1, 2023	29.925	195.65	242.93
June 1, 2023	31.440		
		202.21	250.93
July 1, 2023	28.448	190.49	236.32

MAUI ELECTRIC COMPANY, LTD. -- Lanai Division RESIDENTIAL SURCHARGE DATA

EFFECTIVE DATE	DESCRIPTION OF SURCHARGE	RATE	
06/01/11	IRP RECOVERY REFUND	0.000 PERCENT ON BASE	
08/17/17	RENEWABLE ENERGY INFRASTRUCTURE COST	0.0000 CENTS/KWH	
06/01/19	RECOVERY PROVISION FINAL RATE INCREASE (3.74%), DOCKET NO. 2017-0150 (2	118 TEST VEAD	
05/01/20 - 03/31/21	SOLARSAVER ADJUSTMENT	0.0000 CENTS/KWH	
06/01/20 - 05/31/21	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	0.3383 CENTS/KWH	
07/01/20 - 06/30/21	RESID. PBF SURCHARGE ADJUSTMENT	******	
01/01/21 - 06/30/21	GREEN INFRASTRUCTURE FEE	1.25 DOLLARS/MONTH	
04/01/21 - 04/30/21	SOLARSAVER ADJUSTMENT	-0.0445 CENTS/KWH	
05/01/21 - 03/31/22	SOLARSAVER ADJUSTMENT	0.0000 CENTS/KWH	
06/01/21 - 12/31/21	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	1.0242 CENTS/KWH	
07/01/21 - 12/31/21	GREEN INFRASTRUCTURE FEE	1.19 DOLLARS/MONTH	
07/01/21 - 06/30/22	RESID. PBF SURCHARGE ADJUSTMENT		
01/01/22 - 05/31/22	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	1.9714 CENTS/KWH	
01/01/22 - 06/30/22	GREEN INFRASTRUCTURE FEE	1.25 DOLLARS/MONTH	
04/01/22 - 04/30/22	SOLARSAVER ADJUSTMENT	-0.0315 CENTS/KWH	
05/01/22 - 03/31/23	SOLARSAVER ADJUSTMENT	0.0000 CENTS/KWH	
06/01/22 - 12/31/22	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	1.6175 CENTS/KWH	
07/01/22 - 06/30/23	RESID. PBF SURCHARGE ADJUSTMENT	0.6488 CENTS/KWH	
07/01/22 - 12/31/22	GREEN INFRASTRUCTURE FEE	1.18 DOLLARS/MONTH	
01/01/23 - 06/30/23	GREEN INFRASTRUCTURE FEE	1.23 DOLLARS/MONTH	
01/01/23 - 05/31/23	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	1.9048 CENTS/KWH	
04/01/23 - 04/30/23	SOLARSAVER ADJUSTMENT	-0.0038 CENTS/KWH	
05/01/23	SOLARSAVER ADJUSTMENT	0.0000 CENTS/KWH	
06/01/23	REVENUE BALANCING ACCOUNT RATE ADJUSTMENT	,	and RBA
07/01/23	RESID. PBF SURCHARGE ADJUSTMENT	0.7195 CENTS/KWH	
07/01/23	GREEN INFRASTRUCTURE FEE	1.18 DOLLARS/MONTH	