READING MUNICIPAL LIGHT DEPARTMENT

2025 BUDGET

October 1, 2024

Revision 1: November 7, 2024

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Reading Municipal Light Department

Mission Statement

RMLD's team mission is to serve our customers with reliable, low cost, and increasingly non-carbon energy.

Vision Statement

RMLD's team vision is to innovatively support electrification and the required transition to non-carbon energy with customer engagement.

SYSTEM PROFILE
(Based on CY 2023)

SERVICE TERRITORY	51 square miles serving Reading, North Reading, Wilmington, and part of Lynnfield
TOTAL OPERATING REVENUES	$102,064,724
POWER PURCHASED	$56,128,361
NUMBER OF CUSTOMERS/ACTIVE METERS	32,200
ANNUAL PEAK DEMAND	152,712 kW on September 7, 2023, hour ending 5:00 PM
ANNUAL SALES	636,992,506 kWh
PLANT VALUE	Gross: $ 175,859,000 Net: $89,324,000
SUPPLY VOLTAGE	115 Kv
SUPPLY CAPACITY (tie points)	Station 4: (3) 60 MVA Transformers (2) 35 MVA Transformers – feeds Station 5 250 MVA Connected, 190 MVA Firm Station 3: (2) 60 MVA Transformers 120 MVA Connected, 60 MVA Firm
DISTRIBUTION SYSTEM VOLTAGE	13,800 volt wye 4,160 volt wye
OVERHEAD LINES	914 miles
UNDERGROUND LINES	335 miles
DISTRIBUTION TRANSFORMERS	4,031 Transformers – 330 MVA Capacity
STATION TRANSFORMER CAPACITY	370 MVA Capacity
UTILITY POLES	18,181 poles *Pole Ownership*: 50% Verizon, 50% RMLD *Pole Custodial By Town:* North Reading – RMLD Lynnfield – Verizon Reading • east of Main Street – Verizon • west of Main Street, east of West Street, south of Prescott Street – Verizon • west of West Street – RMLD • west of Main Street, north of Prescott Street – RMLD Wilmington • all poles with 35 kV sub-transmission circuits, and Concord Street – RMLD • all other locations in Wilmington – Verizon
EV REGISTERED IN TERRITORY (July 1, 2024)	1,016 (battery only; excluding hybrids)
ASHP INSTALLED IN TERRITORY (July 1, 2024)	876

APPLICATION SOFTWARE			
	Adobe Creative Cloud	Fortinet	Office 365 E3
	CenturionCARES	Futura	PoleForeman
	ChargePoint Cloud Services	Great Plains/Cogsdale	Replicon
	CivicPlus	Home Energy Audits	SagLine
	CMARS	ISO-NE	SharePoint
	Constant Contact	Itron	SpryPoint
	EFI (Energy Federation)	Key Accounts	Survalent (OMS)
	eRequester	LexisNexis	Tagent AMP
	ESRI	ManagerPlus	Team Gantt
	eTrack	Map/LightTable	Vmware
	Filezilla	Meraki	Windows 11
	Forecast Pro	Milsoft-WindMil	Windows Server 2016,2012
	Forecasting	NJUNS	Yukon
CONTACT INFORMATION			
Address:	230 Ash Street Reading, MA 01867		
Telephone:	781-942-6598		
Fax:	781-942-2409		
Website:	www.rmld.com		
Office Hours	7:30 am – 5:30 pm Monday through Thursday		
KEY PERSONNEL			
General Manager	Gregory Phipps	email: gphipps@rmld.com	
Director of Operations	Mike O'Neill	email: moneill@rmld.com	
Assistant Director of Engineering	Peter Price	email: pprice@rmld.com	
Director of Integrated Resources	Megan Wu	email: mwu@rmld.com	
Director of Information Technology	John Pelletier	email: jpelletier@rmld.com	
Director of Human Resources	Susan Inman	email: sinman@rmld.com	
Director of Finance and Accounting	Benjamin Bloomenthal	email: bbloomenthal@rmld.com	
In-House Counsel	Janet Walsh	email: jwalsh@rmld.com	
GOVERNING BODY (Oct 2024)			
	David Talbot Philip B Pacino Robert Coulter Pamela Daskalakis Raymond Porter		
Number of Employees	88		
Year Founded	1894		

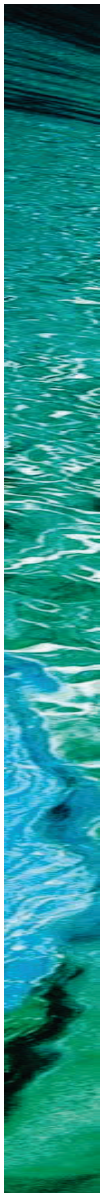
RMLD Strategy Overview

27 September 2024 update

RMLD

Reading Municipal Light Department
RELIABLE POWER

Outline



Mission and vision

Strategy - executive summary

Context – seismic changes

Reliability

Cost structure (load and assets)

Compliance (non-carbon certificates)

Investment timing

RMLD Reading Municipal Light Department RELIABLE POWER

RMLD mission and vision

mission *(what we do)* → ***vision*** *(where we are going)* → ***strategy*** *(how we get there)* → ***goals*** *(milestones)*

Mission

RMLD's team mission is to serve our customers with **reliable**, **low cost**, and increasingly **non-carbon** energy.

Vision

RMLD's team vision is to innovatively support electrification and sensibly facilitate the required non-carbon transition, with customer involvement.

Established in 1894 as a quasi-public municipal light plant, RMLD is one of the two largest Municipal Light Plants (MLPs) in the Commonwealth and the only MLP serving four towns (Lynnfield Center, North Reading, Reading, and Wilmington). RMLD provides over 670,000 MWHs annually across 32,500 meters with a peak load of 165 MW. 2024 revenues of $110 million, no debt, and a team of 90 dedicated employees. RMLD operates two tie-points (one to Eversource, one to National Grid) and is building a third tie point (to National Grid).

Executive summary – RMLD strategy

RMLD serves Lynnfield Center, North Reading, Reading, and Wilmington with *reliable*, *low-cost*, and *non-carbon* electricity
- Reliability is a combination of proactively minimizing external and internal outages and quickly restoring when they occur

2021 Climate Bill is accelerating electrification as part of decarbonization; no softening of legislative targets is expected
- Hence, RMLD load will double, and demand will increase 75% by mid 2040's

Near-term, regional wholesale network supply reliability is increasingly fragile (and over 99% of RMLD energy is wholesale)
- Hence, RMLD needs significant investment (generation / storage assets, data analytics, distribution network, supporting systems (MDM/AMI metering, IT, …), where asset life ranges 10 – 40 years

Wholesale transmission costs are increasing, capacity market is undergoing reform, and energy pricing is increasingly volatile
- Hence, RMLD costs will increase to support load growth and associated buildout

RMLD has new access to tax credits and numerous grants (new funding sources)

In-territory generation and energy storage require creativity and investment

RMLD needs land parcels in its service territory to support network buildout to support load and demand growth

Data analytics is a core foundation element of RMLD's ongoing strategy refinement

RMLD is investing in its employee team (new skills, process efficiency, data, recruiting, …)

4 *Source: RMLD 2022 statistics and analysis*

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Context – external to RMLD

Electrification compliance requires more than 2X growth in regional generation capacity by 2050

- In 2023, natural gas fueled generation represents half of current generation mix
- By 2050, natural gas fueled generation capacity utilization is forecasted to drop to less than 15% (upward cost pressure)
- Massive transmission investment required to support increased distributed generation, especially off-shore wind
- LNG now economically ships to Europe (EU energy affects US energy; increased volatility)
- Massachusetts offshore wind (up to 17,000 MWs) significantly delayed into mid 2030's and likely much more expensive (2X)
- Several New England solar PV projects delayed, cost increased, or cancelled and land is limited for new solar projects

MLP's, including RMLD, have access to new state and federal incentives and grants

Technology improvements enabling electrification (ASHPs, EVs, V2G, carbon capture, …)

Context – internal within RMLD

Power supply portfolio solid for current load

- Nearly 90% hedged; compliant with RMLD Policy 30 and already exceeds 2021 Climate Bill goals through 2035
- Weather trends, electrification, and business growth are key load drivers
- More generation and new supply contracts will be required to support growth

Given current daily and seasonal RMLD load shape, RMLD network has capacity of ~220 MW and ~40% capacity utilization and peak load at ~168 MW

RMLD is a unique MLP, having two 115 kV wholesale tie points (Eversource and National Grid)

Our core distribution network is primarily 13.8 kV but many poles carry multiple circuits

RMLD has 9 MW of in territory solar generation (none owned; 2% of purchases) and 2.5 MW peak shaving generation

Our 5 MW 2 hour battery storage system will grow to 30 MW 3 hour by mid 2025 (reliability enhancement)

RMLD is engaging several long duration (time shifting) and alternate chemistry pilot storage projects

RMLD metering system is undergoing replacement (including a prerequisite meter data management system)

RMLD cost structure enables low rates (~70% power supply and ~30% operations and payments to towns)

Source: RMLD 2022 statistics

RMLD – excellent reliability

Reliability (**lower is better and RMLD is lower**)

- 2023 SAIDI 37 minutes (RMLD) vs. 55 minutes (regional average)
- 2024 SAIDI 14.64 minutes (RMLD YTD)
- 2023 SAIFI 0.340 instances (RMLD) vs. 0.55 Instances (regional average)
- 2024 SAIFI 0.204 instances YTD

RMLD earned highest RP3 award level – **Diamond**
(98 out of 100 points)

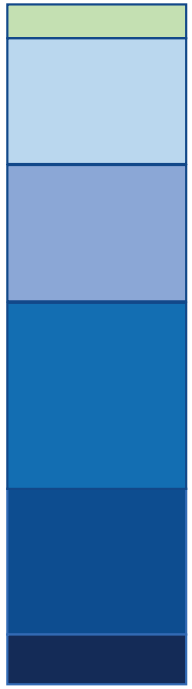
- Recognition of a “utility's dedication to operating an efficient, safe, and reliable distribution system”.
- Evaluation: reliability, safety, workforce development, system improvement
- Only 3 MLP’s in MA (out of 41) achieved Diamond level; 7 other MLPs at Platinum level
- RMLD up from prior Platinum level primarily due clearer strategy

RP3 RELIABLE PUBLIC POWER PROVIDER™
American Public Power Association

Key components of RMLD cost structure

Description	*Category* (% of total RMLD)	*Key Levers to Manage*
Retired non-carbon certificates (number retired * current market price)	power supply: **Certificates** *(0.5%)*	Actively manage portfolio, retirement strategy
ISO-NE charges for new generation (RMLD load at single annual peak hour * rate)	power supply: **Capacity** *(14%)*	Reduce load during annual peak hour (peak management programs)
Charges for transport outside of and to RMLD (RMLD load at single monthly peak hour * rate)	power supply: **Transmission** *(20%)*	Reduce load during monthly peak hours (peak management programs)
Net cost of purchased energy w/ certificate sales (contracted or market price minus certificate sales)	power supply: **Energy** *(31%)*	Portfolio mix, risk factors, compliance; longer term contracts reduce volatility and net cost risk
RMLD plant, equipment, distribution costs w/in RMLD network, labor	**Operating Costs** *(28.5%)*	Efficient internal operations, preventative maintenance, timing of capital investments
Payments to Towns and EEC	**Other** *(6%)*	

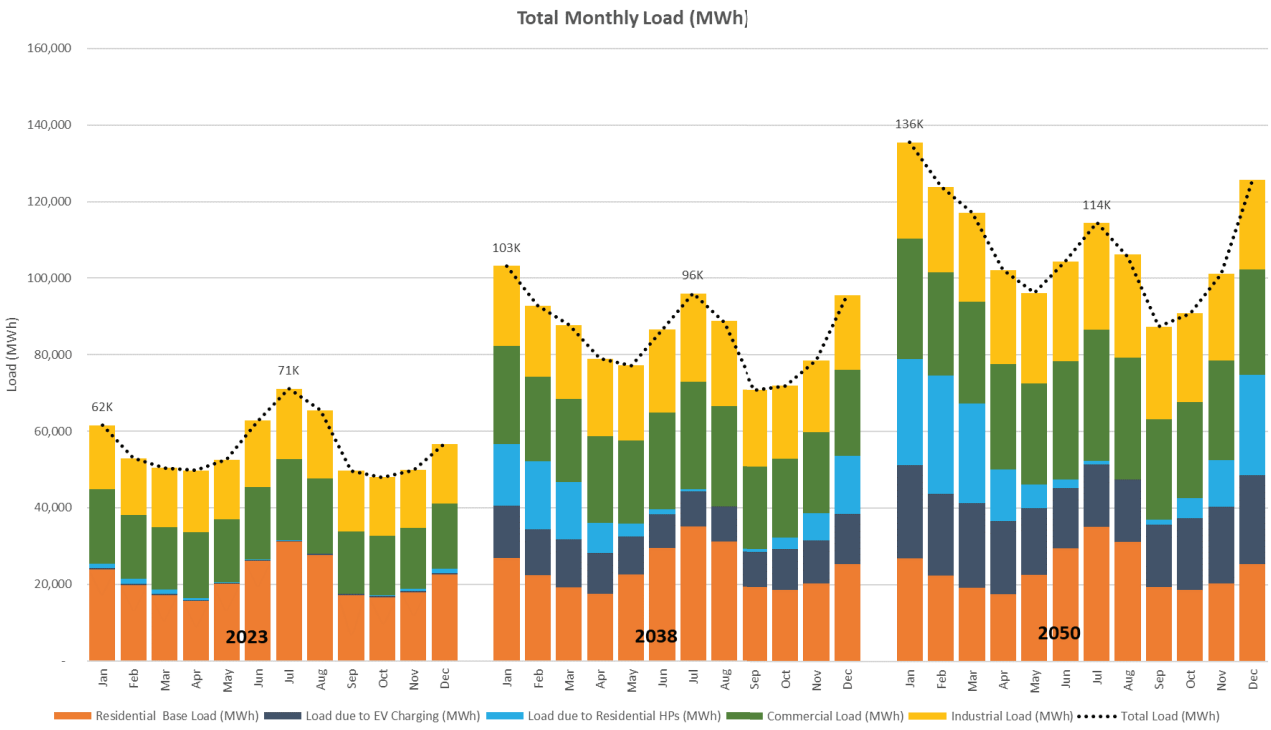
2024 illustration



8 *source: RMLD analysis and forecasts, other (Town Payments and EEC), 2024 budget*

RMLD Reading Municipal Light Department RELIABLE POWER

RMLD load doubles by 2050 – 2.5% cagr



Winter (January) highest load beginning in 2030's primarily due to ASHP and EV load additions; doubling winter load by 2050

Summer load 60% higher by 2050

- Industrial 1.5% cagr
- Commercial 1.8% cagr
- ASHP Residential 12% cagr (75% conversion by 2050)
- EV Residential 17% cagr (95% adoption by 2050)
- Base Residential 0.5% cagr

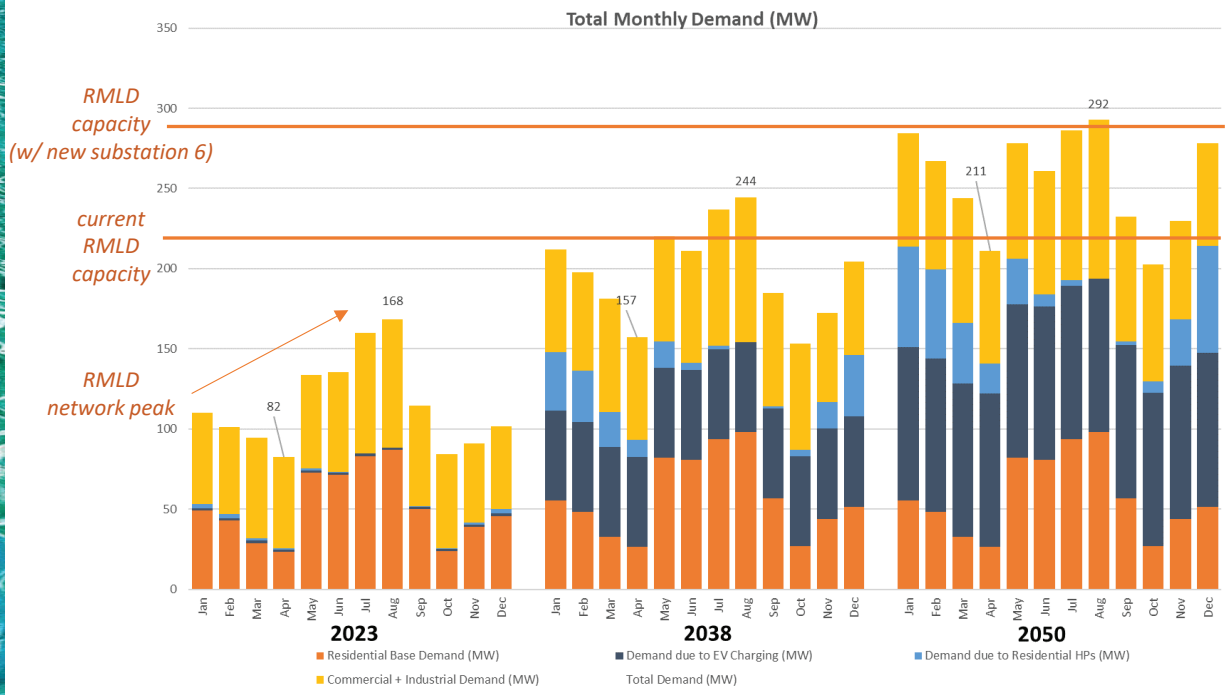
RMLD forecast consistent with ISO NE 2050 Transmission Study and ISO NE 2023 CELT forecast

9

Source: long-term-forecast 2023-10-02; 2023 CELT; RMLD analysis; actual RMLD 2022 is base year; 2023 CELT shows 2.3% cagr 2023 - 2032

RMLD Reading Municipal Light Department RELIABLE POWER

Demand (MWs) 75% higher by 2050



Commercial / Industrial demand increases primarily first shift; some distribution EV; plus ASHP space heating

ASHP Residential mainly winter addition; summer is AC replacement

EV Residential based on 20% simultaneous charging (ex pre-storm)

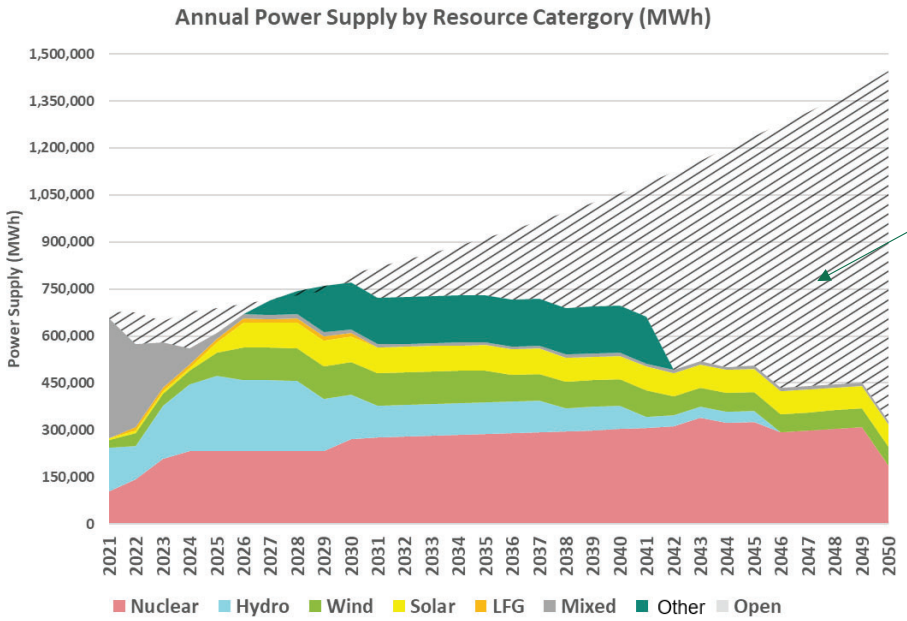
Base Residential steady pattern; few living unit additions; few efficiency reductions

Demand growth requires distribution network buildout
Network increasingly bi-directional to support w/in territory generation and storage

10 *Source: long-term-forecast 2023-10-02*

RMLD Reading Municipal Light Department RELIABLE POWER

RMLD power supply – risk managed



Power supply portfolio supports our mission

1) reliability (keep the lights on)
2) low-cost (affordable total energy bills)
3) non-carbon (compliance)

RMLD has three options to fill portfolio

1) Purchase open market in RT or DA
2) Contract more longer-term supply
3) Generate in-territory

Primary decision criteria:

a) Geography and site concentration
b) Generation type (wind, hydro, …)
c) Contract duration and price structure
d) Vendor reliability and concentration
e) Hedge level
f) In-territory vs wholesale
g) Asset life (economic and physical)

RMLD's portfolio is balanced and actively risk managed across generation type, geography, supplier, contract duration.

11 *source: Energy Position MASTER 2X with dashboards 2024-04-11*

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RMLD's risk managed power supply portfolio

Numerous components of our risk managed power supply

- Continuous attention to market conditions
- Ongoing contract management and pursuit of new sources
- More storage (30 MW 3 hr)
- Commission novel 10 MW 100 hr storage
- Maximize in territory solar PV (30 more MWs)
- Expand TOU as AMI / MDM deployed
- Uncover new demand management (behavior)
- Pilot and expand V2G (more balancing assets)
- Expand to transmission tie-points
- Build three ~20 MW generation assets (~2030, ~2035, ~2040)
- Distribute assets around network (distribution ring)
- and more research and exploration

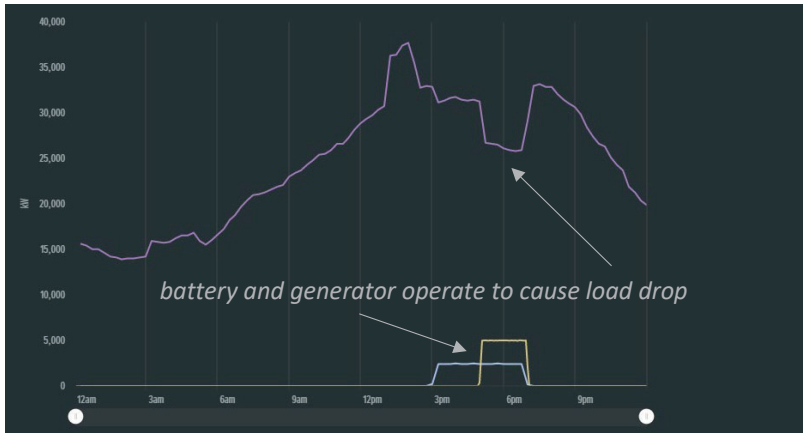
*In-territory assets is just **one** component of the larger portfolio*

Energy storage – key puzzle piece

Storage systems ***time shift*** energy (ex. afternoon solar to evening use)

Time shifting enables benefits:

a) **Economic** (coincident ISO NE / RMLD peak management)
b) **Reliability** (network hot spots)
c) **Resiliency** (limited backup for mandatory load reductions)

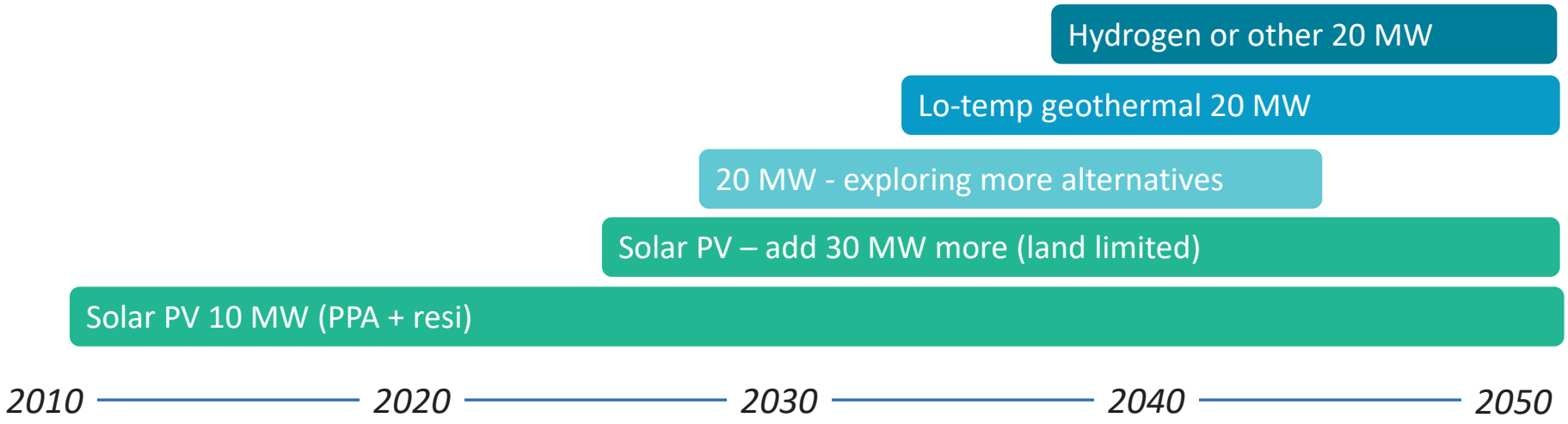


RMLD adding ~30 MW of battery storage

- Existing 5 MW at Station 3 - 2019
- New mobile 500 kw at Station 2 - 2024
- New 10 MW on Riverpark - 2024
- New 10 MW at Station 3 - 2025
- Pursuing 10 MW (100 hour) – 2026
- Planning 10 MW at Station 6 – 2027

Energy storage – important component of reliability, low-cost, non carbon mission and decarbonization

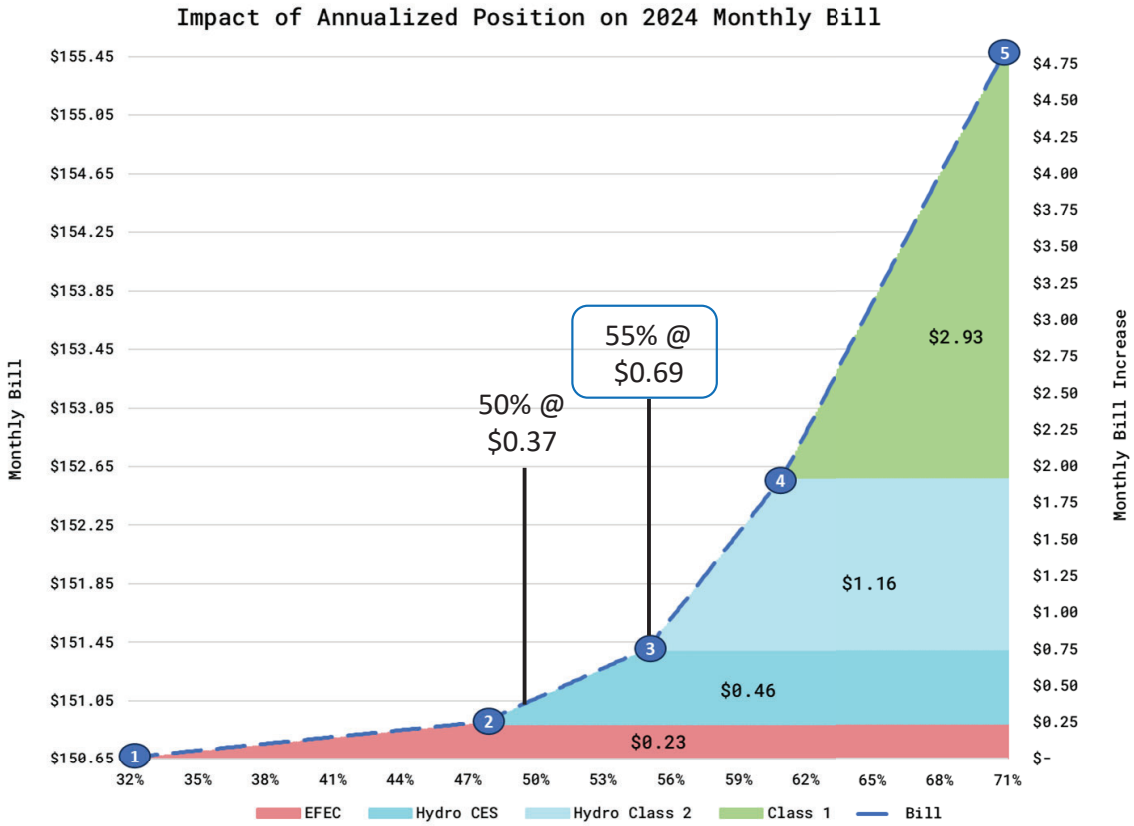
In-territory generation – responsible diversification



Responsible diversification *– add in-territory generation blocks that support RMLD mission and fit the compliance timeline*

Accelerating certificate retirements to 55% in 2024

Update: RMLD certificates sales reduced energy costs by $8.6 million during last 30 months



Source: 2024-2029 Resi Certificates 2024-01-25 JP.xls

RMLD made noteworthy power supply changes over past few years (more non-carbon)

RMLD acquires certificates with power purchases (associated certificates)

New Hydro Quebec contract provides additional low cost certificates, adding to EFECs from power supply changes

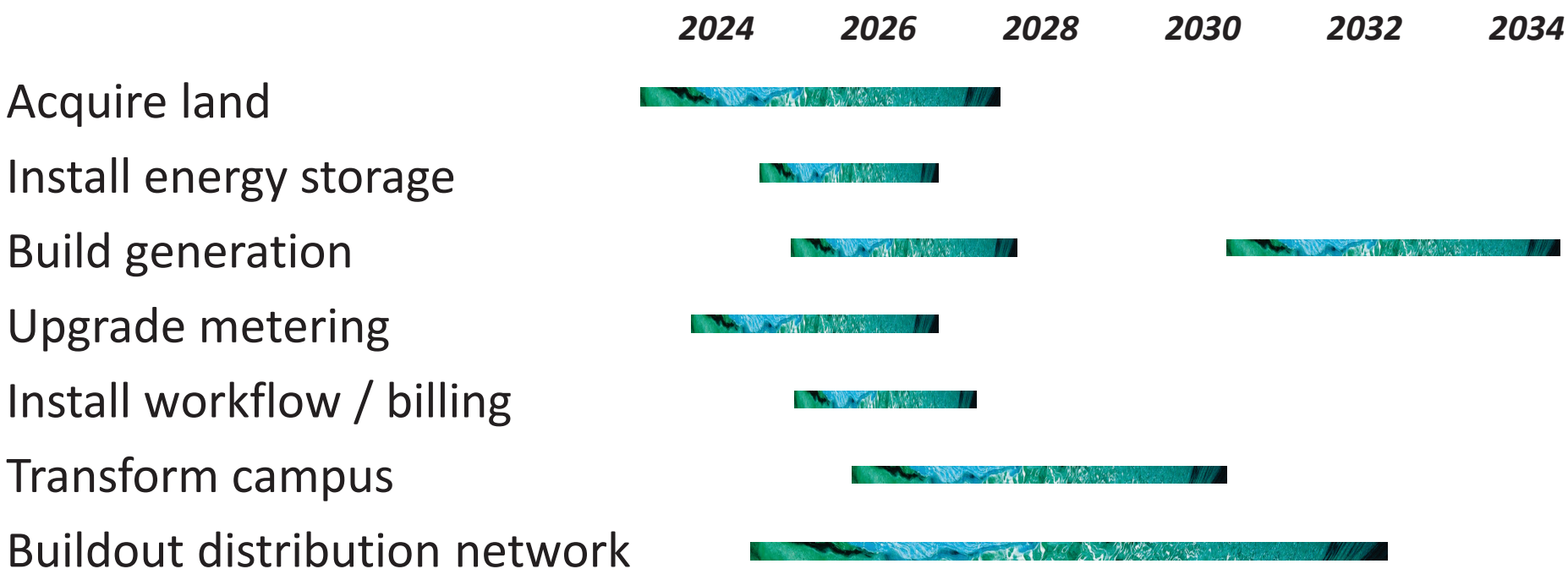
Current certificate retirement rate increases 3% annually to avoid customer rate shock while achieving 50% retirements by 2030

Accelerated retirement of EFECs and Hydro CES-E certificates would allow for 55% retirements

$0.69 increase in average monthly residential bill

RMLD Reading Municipal Light Department RELIABLE POWER

Investment timing – key initiatives

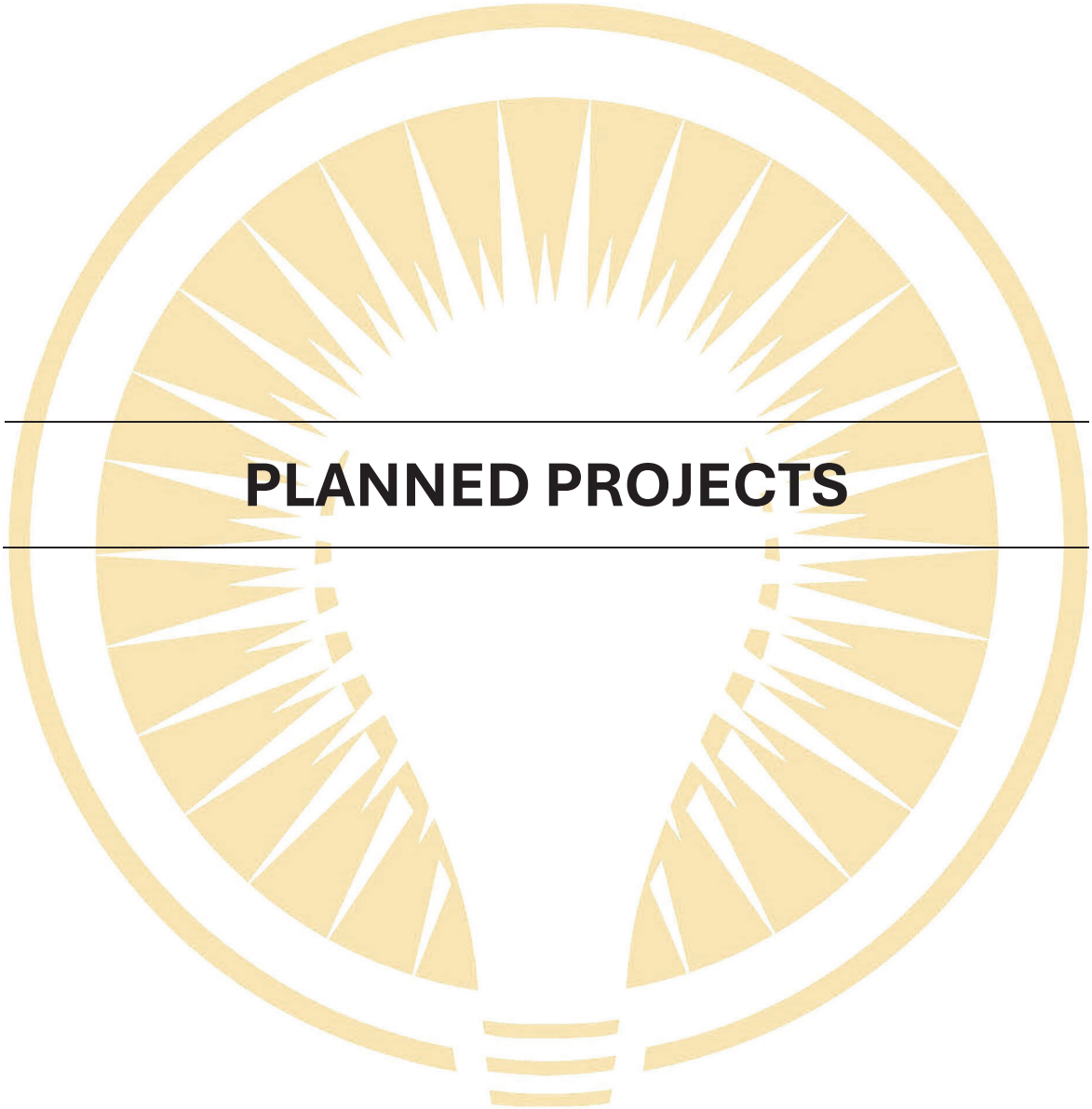


Thank You
from the RMLD Team

RMLD

Reading Municipal Light Department
RELIABLE POWER

2025 CAPITAL BUDGET



PLANNED PROJECTS

READING MUNICIPAL LIGHT DEPARTMENT													
Capital Improvements CY25 thru CY30													
$ Shown in thousands													
LINE #	PAGE #	TOWN	WO#	PROJECT NAME	CY24 Total w/ CO	CY24 Proj Spend	CY24 Carry Over	CY25	CY26	CY27	CY28	CY29	CY30
				GENERAL MANAGER									
1	10	W	108	Maple Meadows (Land)	3,000	114	2,886	0					
2	10	W	113	Route 125 Wilmington (Land)	6,000	23	5,977	0					
3	11	A	F25-1	Land Acquisition		New CY2025		10,000					
				FACILITIES									
4	16	A	095	Building/Grounds Upgrades	585	0	550	150	50	50	50	50	50
5	16	R	098	Office Upgrades - 230 Ash St	276	334	0	200	30	30	30	30	30
6	17	R	104	Office Lighting (LED Upgrade)		New CY2025		255					
7	17	A	118	Heavy Duty - Rolling Stock Replacement	3,334	397	1,340	3,000	1,000	1,000	1,000		
8	18	A	121	Light Duty - Rolling Stock Replacement		New CY2025		410	410	420			
9	18	A	119	Security Upgrades - All Sites	963	935	0	30	50	50	50	50	50
				INTEGRATED RESOURCES									
10	24	A	099	Electric Vehicle Supply Equipment	369	203	166	508	700	528	361		
				INFORMATION TECHNOLOGY									
11	30	A	127	Hardware Upgrades	125	105	0	125	125	130	135	139	140
12	30	A	128	Software and Licensing	275	170	0	150	110	110	115	118	120
13	30	A	139	IT Infrastructure Enhancements	150	26	0	100	125	150	175	100	100
14	31	A	140	IT Security	332	35	0	100	125	150	175	100	100
15	31	A	F25-2	Telecommunication System Replacement		New CY2025		30					
				ENGINEERING									
16	36	W/R/NR	102	Pad-mount Switchgear Upgrade at Industrial Parks	251	7	245	57					
17	37	A	103	Grid Automation, Modernization & Optimization	2,941	308	1,683	974	1,301	1,411	1,198	799	810
18	38	W	105	Wilmington Substation Construction & Commissioning	21,982	6,507	15,475	7,950	2,707	2,667	2,667		
19	39	A	109	35kV Underground Cable Upgrade - 4P9 Substation 4	387	138	249	0					
				Engineering: Annual Preventive Projects									
20	40	A	106	UG Facilities Upgrades (URDs, Manholes, etc.) - All Towns	857	500	0	424	437	437	450	464	478
21	41	A	107	13.8kV Upgrade (Step-down Area, etc.) - All Towns	200	200	0	350	360	360	360	360	360
22	42	A	116	Transformers and Capacitors Purchase (Stock and Projects)	7,810	2,210	2,559	1,372	1,500	1,500	1,500	1,500	1,500
23	43	A	458	Overhead Upgrade Program (Primary, Secondary and Main Replacements)	380	380	0	550	550	550	550	550	550
24	44	A	668	Aged/Overloaded Transformer Replacement Program	857	350	0	500	500	500	500	500	500
				Engineering: Pole Line Upgrades									
25	45	W	124	Pole Upgrades - Ballardvale St, Wilmington		New CY2025		741					
26	45	W	136	Pole Line Upgrade - River Park, Wilmington/North Reading	314	161	154						
27	46	W	F26-1	Pole Upgrades - Industrial Way, Wilmington					783				
				Engineering: Circuit Upgrades									
28	47	W	F25-3	Circuit Upgrade - West St, Wilmington - Lowell to Woburn		New CY2025		472					
29	47	R	F26-2	Circuit Upgrade – Beverly Rd ROW to Grove St, Reading					401				
30	47	W	F27-1	Circuit Upgrade - Andover St, Wilmington Access Road to Route 125						474			
31	48	W	F27-2	Circuit Upgrade - Butters Row, Wilmington						287			
32	48	W	F28-1	Circuit Upgrade - Concord St, Wilmington - Middlesex to Woburn							351		
33	48	W	F28-2	Circuit Upgrade - Woburn St, W - Park to Salem							394		

READING MUNICIPAL LIGHT DEPARTMENT													
Capital Improvements CY25 thru CY30													
$ Shown in thousands													
LINE #	PAGE #	TOWN	WO#	PROJECT NAME	CY24 Total w/ CO	CY24 Proj Spend	CY24 Carry Over	CY25	CY26	CY27	CY28	CY29	CY30
				Engineering: Force Account									
34	49	W	203	Force Account (MassDOT): Route 38 Bridge over MBTA, W	166	100	66	0					
35	50	W	206	Force Account (MassDOT): Butters Row over MBTA, W	298	100	198	0					
36	50	W	207	Force Account (MassDOT): Rt 38 (Main St) Wilmington					466				
				Engineering: Battery Storage/ Solar Array									
37	51	A	F25-4	Long Duration Battery Storage 10 MW/ 100hrs	1,000	0	1,000	12,000	2,000				
38	51	L	F25-5	2 MW Solar/ 10 MW Battery (Lynnfield Water Dept)		New CY2025		2,000	3,000	4,000			
39	51	W	F25-6	8 MW Solar Field/ 10 MW Battery (Maple Meadows)	1,000	0	1,000	3,000	10,000	16,000			
40	52	NR	F25-7	North Reading School (HS Roof or Canopy)		New CY2025		1,000	3,000				
41	52	R	F26-3	Reading School (Parker, Killam)					1,000				
42	52	W	F25-8	Wilmington Senior Center and School (Shawsheen, West)		New CY2025		1,000	1,000				
43	53	W	F25-9	3.5MW Solar Array (RT 125 Solar Array)		New CY2025		1,000	8,000	3,000			
44	53	W	F25-10	2.5 MW Utility Solar		New CY2025		1,500	6,500	1,000			
				Engineering: Future Projects									
45	N/A	W	F26-4	Distribution Improvements Associated with New Wilmington Substation					1,000	1,000	500		
46	N/A	R	F26-5	4W24 Partial Circuit Reconductoring					356	30			
				GRID ASSET AND COMMUNICATION									
47	60	A	110	Primary Metering Inspection and Upgrade Program	211	64	111	100	80				
48	60	R/NR/W	111	Substation Equipment Upgrade	202	20	0	40	40	40	40	40	40
49	61	A	112	AMI Mesh Network Expansion & Meter Replacement	1,270	115	1,155	2,509	2,458	2,531			
50	62	A	117	Meters and Primary Meters (for stock)	80	80	0	80	60	40	40	40	40
				OPERATIONS									
51	68	A	114	Safety Program		New CY2025		30	30	30	30	30	30
52	68	A	115	Power/Lab and Tool Equipment	113	95	0	65	30	30	30	30	30
53	69	R/NR	175	Pole Replacement Program, R and NR	1,008	240	0	307	316	326	336	340	350
54	70	A	N/A	Routine Construction - All Towns	1,501	1,501	0	2,000	2,100	2,200	2,300	2,400	2,500
55	70	A	N/A	Service Connections (Residential and Commercial) - All Towns	310	300	0	315	320	320	330	340	350
				COMPLETED									
56	N/A	R	133	Station 4 CCVT Replacement	114	0			Completed CY 2024				
57	N/A	W	132	5W4/5W5 Getaway Improvements	170	74			Completed CY 2024				
58	N/A	W	202	Force Account (MassDOT): Lowell at Woburn Street, W	320	294			Completed CY 2024				
59	N/A	R	315	Johnson Woods- Create Loop	258	258			Completed CY 2024				
60	N/A	R	742	Gazebo Circle, Reading, Underground Feed Relocation	290	38			Completed CY 2024				
				TOTAL	**59,699**	**16,382**	**34,814**	**55,395**	**53,020**	**41,350**	**13,667**	**7,980**	**8,128**

READING MUNICIPAL LIGHT DEPARTMENT

Capital Improvements CY25 thru CY30

$ Shown in thousands

AREA SUBTOTALS	*CY24 Carry Over*	*CY25*	*CY26*	*CY27*	*CY28*	*CY29*	*CY30*
LAND	8,863	10,000	0	0	0	0	0
IN TERRITORY GENERATION	1,000	9,500	32,500	24,000	0	0	0
IN TERRITORY STORAGE	1,000	12,000	2,000	0	0	0	0
EV CHARGERS	166	508	700	528	361	0	0
ENGINEERING: ON GOING	17,652	8,981	4,008	4,078	3,865	799	810
ENGINEERING: PREVENTIVE	2,559	3,196	4,703	4,377	3,860	3,374	3,388
ENGINEERING: POLE UPGRADES	418	741	1,249	0	0	0	0
GRID ASSETS: CIRCUIT UPGRADES	0	472	401	760	745	0	0
GRID ASSETS	1,266	2,729	2,638	2,611	80	80	80
OPERATIONS	0	2,717	2,796	2,906	3,026	3,140	3,260
FACILITIES	1,890	4,045	1,540	1,550	1,130	130	130
INFORMATION TECHNOLOGY	0	505	485	540	600	458	460
TOTAL	**34,814**	**55,395**	**53,020**	**41,350**	**13,667**	**7,980**	**8,128**

READING MUNICIPAL LIGHT DEPARTMENT

Capital Improvements CY25 thru CY30

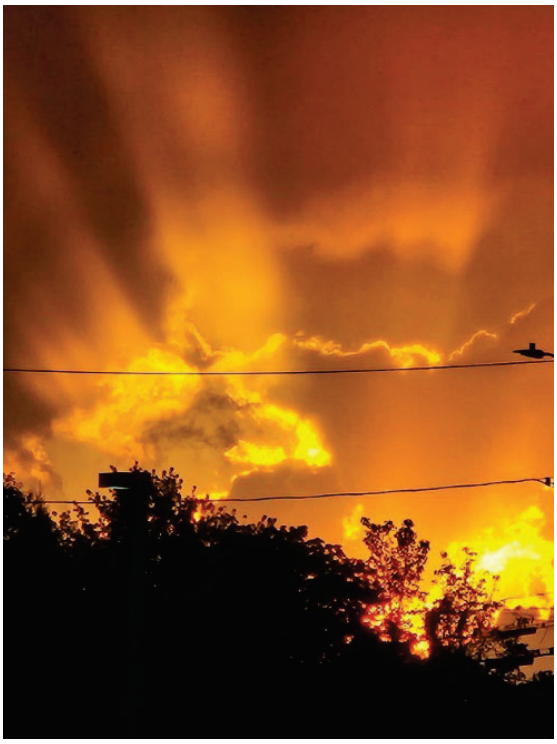
$ Shown in thousands

	CY25	CY26	CY27	CY28	CY29	CY30
Total Additions:	**55,395**	**53,020**	**41,350**	**13,667**	**7,980**	**8,128**
	CY25	**CY26**	**CY27**	**CY28**	**CY29**	**CY30**
TABLE 1: PLANT VALUES & DEPRECIATION EXPENSE:						
Plant in Service (Beginning)	219,088	273,483	325,503	365,853	378,520	385,500
Additions	**55,395**	**53,020**	**41,350**	**13,667**	**7,980**	**8,128**
Adjustments (Property Retirement)	-1,000	-1,000	-1,000	-1,000	-1,000	-1,000
Plant in Service (Ending)	273,483	325,503	365,853	378,520	385,500	392,628
Less Land and Land Rights	5,275	5,275	5,275	5,275	5,275	5,275
Depreciable Plant in Service	278,758	330,778	371,128	383,795	390,775	397,903
Accumulated Reserve For Depreciation	-101,200	-109,563	-119,486	-130,620	-142,134	-153,857
Net Plant in Service	172,283	215,941	246,367	247,900	243,366	238,771
TABLE 2: DEPRECIATION FUND BALANCES:						
Beginning Balance	10,164	25,064	29,973	7,646	13,213	19,847
Depreciation Rate (3%)	3%	3%	3%	3%	3%	3%
Depreciation Expense	**6,731**	**8,363**	**9,923**	**11,134**	**11,514**	**11,723**
Bond Proceeds and Other Fund Sources	55,564	40,566	100	100	100	100
Operating Fund Transfer	8,000	9,000	9,000	8,000	3,000	1,000
Capital Funds Ending Balance	80,459	82,993	48,996	26,880	27,827	32,670
Capital Improvements	-55,395	-53,020	-41,350	-13,667	-7,980	-8,128
Ending Balance	**25,064**	**29,973**	**7,646**	**13,213**	**19,847**	**24,543**
TABLE 3: BOND PROCEEDS & OTHER FUND SOURCES:						
Grants	15,000					
Bonding	40,000	40,000				
Force Account (MassDOT): Route 38 Bridge over MBTA, W	166	0	0	0	0	0
Force Account (MassDOT): Butters Row over MBTA, W	298	0	0	0	0	0
Force Account (MassDOT): Rt 38 (Main St) Wilmington	0	466	0	0	0	0
Interest Income	100	100	100	100	100	100
Subtotals:	55,564	40,566	100	100	100	100

CAPITAL PROJECTS

General Manager

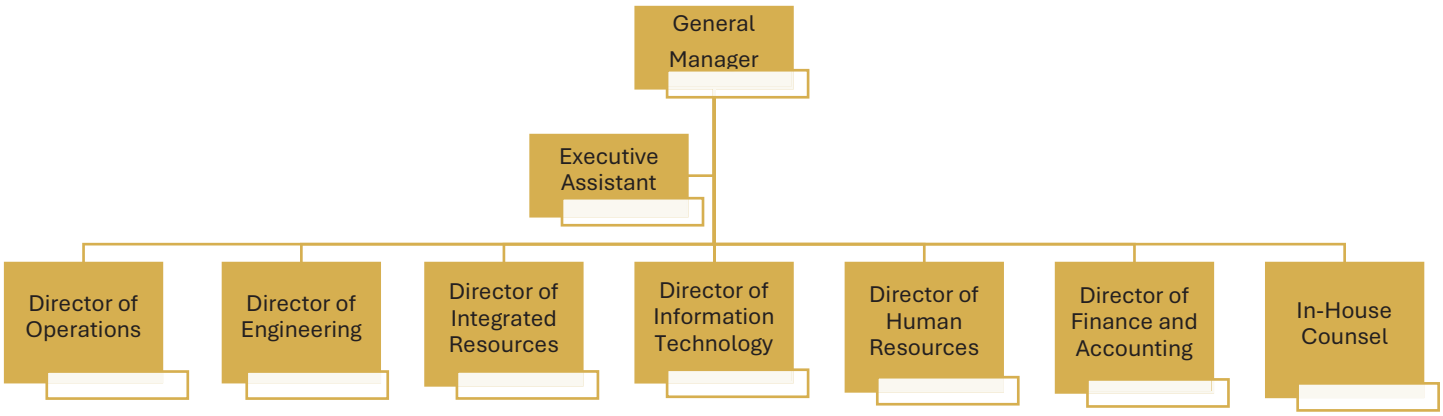
GENERAL MANAGER
CAPITAL PROJECTS CY2025



Gregory Phipps, General Manager

Land acquisition is essential to secure additional assets necessary for accommodating future load growth. According to forecasts, load demand is expected to double by 2050, largely due to the mandates established in the 2021 climate bill. In selecting land, key criteria include proximity to natural resources and transmission infrastructure, alignment with load concentrations within the RMLD service area, and sufficient distance from residential and wetland areas.

Given the constraints of available acreage within the RMLD service territory, RMLD is adopting innovative and proactive strategies to identify and acquire suitable land.



GENERAL MANAGER
CAPITAL PROJECTS CY2025

Project Name: Maple Meadows - Land **Work Order #:** 108 **Status:** On-Going

Brief Description/Scope:

Thirty-five (35) of the seventy-five (75) acres of the Maple Meadow property will support up to 10 megawatts of solar PV. In addition, this land will support 10-20 MW of battery storage and associated switch gear equipment.

Status Update:

Continuing discussion with Mass DEP site will not require closure under solid waste laws. DEP has provided initial support regarding the COM97 soils to provide a larger relatively flat area for the anticipated solar array over the land fill. But instead, can be closed under MCP. We have given lack of marketable title RMLD is pursuing a lease of the property to allow RMLD to participate and likely lead the legal process to clear the title so that RMLD can acquire it. The council has draft not to sue RMLD for historic liability in the event that RMLD is successful in taking ownership of the property. More detailed engineering will likely proceed once the lease or clear path to ownership is confirmed.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Maple Meadows	N/A	N/A	N/A	N/A	$2,886,000

Project Name: Route 125 Wilmington **Work Order #:** 113 **Status:** On-Going

Brief Description/Scope:

Sixteen (16) acres of the forty-one (41) acres is suitable for new battery storage assets and new in-territory generation assets to enhance system reliability and reduce upward cost pressure. In addition, a portion of the land could be utilized for operations and equipment storage

Status Update:

Wet land delineation and surveys of all the parcels have revealed that the 16 acres of usable land is likely smaller RMLD is in discussion with the owner on a lower price. An MOU was executed in early 2024.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Route 125 Wilmington	N/A	N/A	N/A	N/A	$5,977,000

GENERAL MANAGER
CAPITAL PROJECTS CY2025

Project Name: Land Acquisition **Work Order #:** F25-1 **Status:** Beginning CY2025

Brief Description/Scope:

For expenses necessary to acquire land, or interests, therein to develop and operate in-territory energy assets and for administrative/transactional costs including but not limited to: title reports; title insurance; property surveys; appraisals; certified appraisal review; legal fees for due diligence, negotiate/close acquisitions and to review title reports and, as necessary, prepare title curatives, filing fees or other closing costs; map and GIS/remote sensing data; environmental assessments, and if necessary remediation; baseline documentation reports; project specific defense liability insurance; property taxes; state or local real estate transfer fees/taxes.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Land Acquisition	N/A	N/A	N/A	$10,000,000	N/A

Maple Meadows (source: Boston Realty Advisors)

GENERAL MANAGER
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	Sub CY26-30	Status
$ Shown in thousands							
108	Maple Meadows Land	3,000	114	2,886	0	0	On-Going
113	Route 125 Wilmington Land	6,000	23	5,977	0	0	On-Going
F25-1	Land Acquisition	New CY2025			10,000	0	Beginning CY2025

CAPITAL PROJECTS

Facilities

FACILITIES DIVISION
CAPITAL PROJECTS CY2025

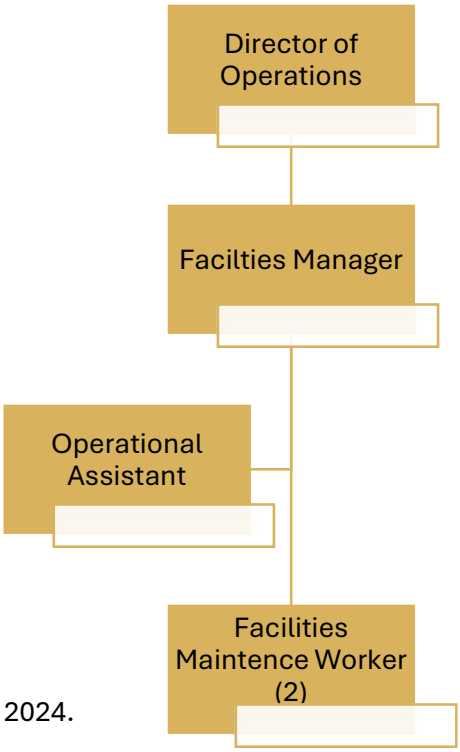
Christopher Zaniboni, Facilties Manager

The Facilities Division experienced a productive year in 2024, successfully completing significant internal projects at 230 Ash St. These projects included creating new office spaces to accommodate our expanding workforce, upgrading the building's security system and replacement of ageing vehicles in our Light-Duty and Heavy-Duty fleet.

Looking ahead to 2025, we plan to focus on enhancing our external properties, specifically by improving the rack system in Barbas building warehouse, as well as updating internal furniture within the main office building. Additionally, we will focus on the maintenance and updating of our vehicle fleet to ensure its reliability matches that of our electrical systems.

Capital Projects Completed in CY 2024:

Project Name:	Work Order #:	Total:	Years:
Office Upgrades; 230 Ash St	095	$334,175	CY23-24
Security Upgrades	119	$934,880	CY23-24



*Carry Over Numbers based on financial figures through August 2024.

FACILITIES DIVISION
CAPITAL PROJECTS CY2025

Project Name: Building/Grounds Upgrade **Work Order #:** 095 **Status:** Beginning CY2025

Brief Description/Scope:

Design and replacement of warehouse racks in Barbas building and Station 1.

Status Updates: This project was moved from CY 2024 to CY 2025

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Building/Grounds Upgrade	N/A	$150,000	N/A	$150,000	$550,000

Project Name: Office Upgrades: 230 Ash St **Work Order #:** 098 **Status:** Beginning CY2025

Brief Description/Scope:

Annual allotment for general office upgrades at 230 Ash Street. Miscellaneous office upgrades and furniture upgrades for Conference Rooms, Audio-Visual Room, and the cafeteria. Funds also include to replace Reading Municipal Light Department sign on front of property.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Office Upgrades: 230 Ash St	N/A	$200,000	N/A	$200,000	N/A

FACILITIES DIVISION
CAPITAL PROJECTS CY2025

Project Name: Office Lighting (LED Upgrade) **Work Order #:** 104 **Status:** Beginning CY2025

Brief Description/Scope:

Upgrade the existing lighting at 230 Ash Street, 218 Ash Street, and the substations with new LED fixtures. Energy use will be reduced when switching to LED. This will include interior and exterior light fixtures at the Ash Street campus, including all office spaces, the garage and bay area, and all lighting at the substations.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Office Lighting (LED Upgrade)	N/A	$255,000	N/A	$255,000	N/A

Project Name: Heavy Duty - Rolling Stock Replacement (bucket trucks, material handlers) **Work Order #:** 118 **Status:** On-Going

Brief Description/Scope:

Specifications, bids, and purchase orders will be completed in 2025 for the following:

- Six (6) Heavy Duty Vehicles: a combination of Material Handler HD Trucks – 55', Service Truck – 40' bucket and/or ePTO material handler

Waiting on Delivery from CY 2024:

- One (1) Service Truck – 40' bucket

Waiting on Delivery from CY 2023:

- Two (2) ePTO material handler

Type	QTY	Vehicle	Subtotal CY2025
Heavy Duty Vehicles	6	$500,000	$3,000,000

Rolling Stock on Order:

Type	CY	Qty	Amount	Est Delivery
ePTO Material Handler	2023	2	$992,153	Dec 2024- Feb 2025
Service Truck with 40' Bucket	2024	1	$347,696	March 2026
Carry Over Amount			**$1,339,849**	

FACILITIES DIVISION
CAPITAL PROJECTS CY2025

Project Name: Light Duty - Rolling Stock Replacement (pick-up trucks, vehicles, trailers, fork trucks) **Work Order #:** 121 **Status:** On-Going

Brief Description/Scope:

Specifications, bids, and purchase orders will be completed in 2025 for the following:

- One (1) Fork Truck
- Four (4) 2.5-ton Pick Ups

Type	QTY	Vehicle	Subtotal CY2025
Fork Truck	1	$50,000	$50,000
Gas 2.5-ton Pick Ups	4	$90,000	$360,00
		Subtotal:	$410,000

Project Name: Security Upgrades – All Sites **Work Order #:** 119 **Status:** On-Going

Brief Description/Scope:

This project represents an annual allotment for security upgrades as needed at all RMLD facilities.

Change in Scope of Work from Prior Year:

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Security Upgrades - All Sites	N/A	$30,000	N/A	$30,000	N/A

FACILITIES DIVISION
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	Subtotal CY26-30	Status
$ Shown in thousands							
095	Building/Grounds Upgrades	585	0	550	150	250	Annual
098	Office Upgrades - 230 Ash Street	276	334	N/A	200	150	Annual
104	Office Lighting (LED Upgrade)	New in CY2025			255	0	Beginning CY 2025
118	Heavy Duty - Rolling Stock Replacement	3,334	397	1,340	3,000	3,000	Annual
121	Light Duty - Rolling Stock Replacement	New in CY2025			410	830	Annual
119	Security Upgrades - All Sites	803	935	N/A	30	250	Annual

(RMLD Bucket Truck -circa 1962)

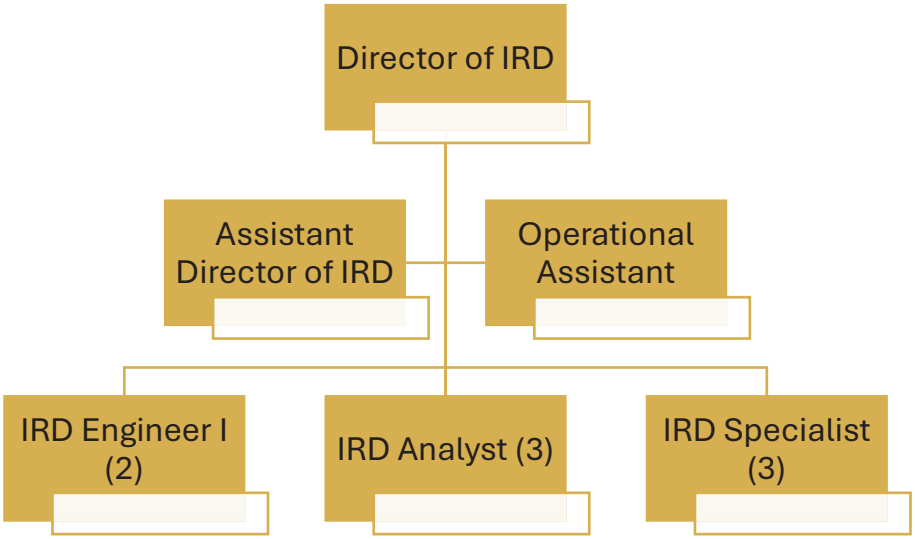
CAPITAL PROJECTS

Integrated Resources

INTEGRATED RESOURSES DIVISION
CAPITAL PROJECTS CY2025

Megan Wu, Director of Integrated Resources

The Integrated Resources Division (IRD) plays a crucial role in advancing RMLD's mission of delivering "Reliable, Low-Cost, and Increasingly Non-Carbon Energy" to the communities we serve. We work closely with the engineering division on the deployment of solar, battery storage and EV charging stations. For these projects, IRD focuses on project initiation, financial and feasibility studies, and asset management in peak demand reduction. IRD also manages and maintains all RMLD-owned EV charging stations.



*Carry Over Numbers based on financial figures through August 2024.

INTEGRATED RESOURSES DIVISION
CAPITAL PROJECTS CY2025

Project Name: Electric Vehicle Supply Equipment **Work Order #:** 099 **Status:** Annual

Brief Description/Scope:

RMLD expects our town government partners to continue requesting the installation of public EV charging stations. As of today, at least two additional public EV charging stations have been identified for construction next year. We also expect to continue working with some of our large commercial and industrial customers to install EV charging stations at their properties and provide charging services to their employees and visitors.

All EV charging stations in this deployment project will be owned and managed by RMLD. Commercial and industrial customers continue to have the option to install their own EV chargers on their properties.

Project Name	Qty	Cost	Subtotal CY2025	Carry Over CY2024
DC Fast Charger (DCFC) Equipment	2	$100,000	$200,000	N/A
Contractor design and install DCFC chargers	2	$40,000	$80,000	N/A
Level 2 (L2) Charger Equipment	6	$12,000	$72,000	N/A
Contractor design and install L2 chargers	6	$26,000	$156,000	N/A
Contractor design and install L2 chargers (CY24 Carry-over)	N/A	N/A	N/A	$166,000
Total:			$508,000	

INTEGRATED RESOURSES DIVISION
CAPITAL PROJECTS CY2025

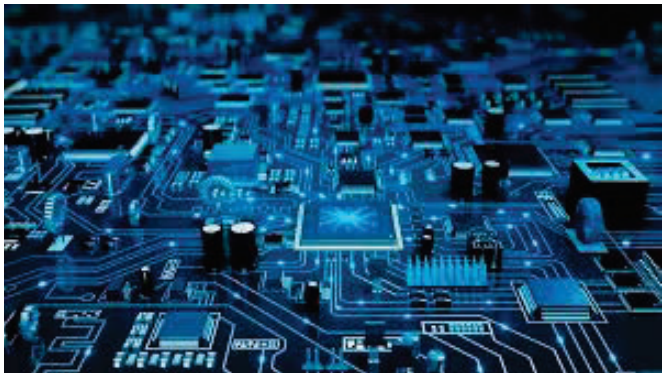
WO#	Project Name	CY24 Total w/ CO	CY24 Projected Spend	CY24 Carry Over	CY25	Subtotal CY26-30	Status
$ Shown in thousands							
99	Electric Vehicle Supply Equipment (EVSE)	369	203	166	508	1,589	Annual

(Residential Solar Example)

CAPITAL PROJECTS

Information Technology

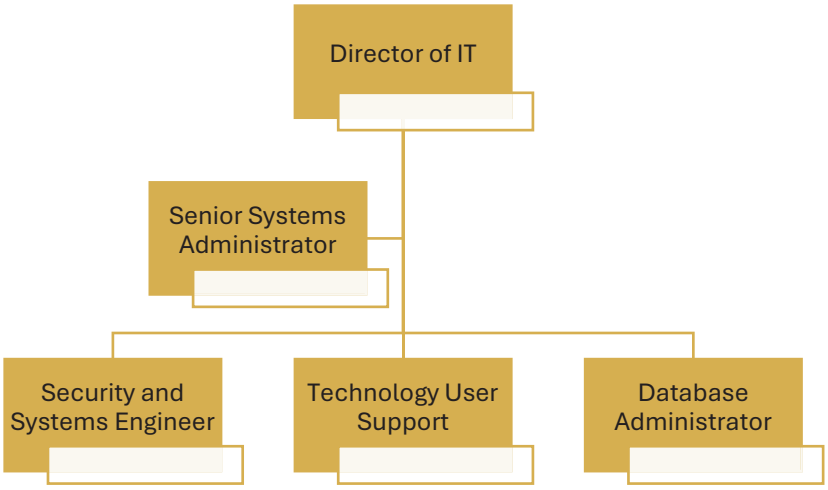
INFORMATION TECHNOLOGY DIVISION
CAPITAL PROJECTS CY2025



John Pelletier, Director of Information Technology

In 2025, RMLD IT will continue to advance our investments in upgrading physical infrastructure and enhancing our cybersecurity posture. We are committed to educating both staff and users about the growing cyber threats targeting critical infrastructure from both domestic and international sources.

Our focus will remain on advancing cybersecurity training for IT personnel, expanding our cybersecurity toolset, and further developing overall IT technical skills. Additionally, we will bolster data protection and application resiliency to ensure robust and secure operations.



INFORMATION TECHNOLOGY DIVISION
CAPITAL PROJECTS CY2025

Project Name: Hardware Upgrades **Work Order #:** 127 **Status:** Annual

Brief Description/Scope:

RMLD will continue to replace 25% of its workstations annually, physical servers are replaced every 4 to 5 years as well as procure ad hoc hardware as needed. Additionally, IT will purchase hardware for new employees, as necessary.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Hardware Upgrades	N/A	$ 125,000	N/A	$125,000	N/A

Project Name: Software and Licensing **Work Order #:** 128 **Status:** Annual

Brief Description/Scope:

Each year RMLD purchases miscellaneous new software for new users and to update existing users. Additional new software projects may be added at the request of various operating units as outlined below:

RMLD will begin investigating the options around replacing our CRM (Cogsdale) or replacing it with an entirely new solution. We will be engaging a vendor to assist us with the RFP process.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Software and Licensing	N/A	$ 150,000	N/A	$150,000	N/A

Project Name: IT Infrastructure Enhancements **Work Order #:** 139 **Status:** Annual

Brief Description/Scope:

In 2025 we will address the following items:

- Infrastructure to support physical access and security project: RMLD will be building out our infrastructure to support the upcoming physical security project. This will require additional specialized hardware and optical transport components.
- Cellular infrastructure will be expanded in FY25, this will allow for remote control of power switching equipment reducing the need for a location visit and associated overtime for off hours work.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
IT Infrastructure Enhancements	N/A	$ 100,000	N/A	$100,000	N/A

INFORMATION TECHNOLOGY DIVISION
CAPITAL PROJECTS CY2025

Project Name: IT Security **Work Order #:** 140 **Status:** Annual

Brief Description/Scope:

RMLD IT plans to invest in cybersecurity related tools to include forensics capabilities, enhanced threat detection and management.

Information Security (Miscellaneous): This is an allotment to address unforeseen security issues which may arise during the year.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
IT Security	N/A	$ 100,000	N/A	$100,000	N/A

Project Name: Telecommunication System Replacement **Work Order #:** F25-2 **Status:** Beginning CY 2025

Brief Description/Scope:

Replacement of current legacy phone system with cloud-based phone solution.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Telecommunication System Replacement	N/A	$30,000	N/A	$30,000	N/A

INFORMATION TECHNOLOGY DIVISION
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	Subtotal CY26-30	Status
$ Shown in thousands							
127	Hardware Upgrades	125	105	N/A	125	669	Annual
128	Software and Licensing	275	170	N/A	150	573	Annual
139	IT Infrastructure Enhancements	150	26	N/A	100	650	Annual
140	IT Security	332	35	N/A	100	650	Annual
F25-2	Telecommunication System Replacement	New in CY2025			30	0	Beginning CY2025

CAPITAL PROJECTS

Engineering

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

(Inside of a transformer)

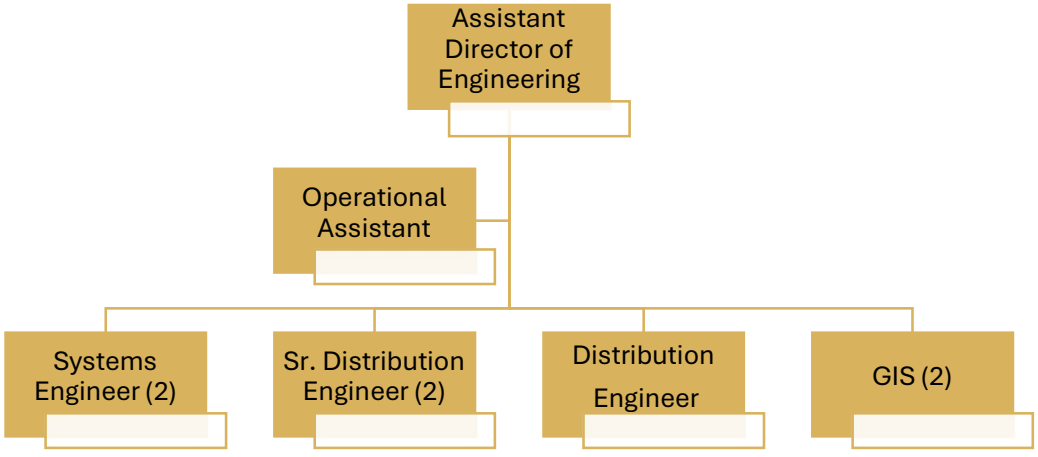
Peter Price, Assistant Director of Engineering

Preventive maintenance is central to the Engineering Department's strategy. We focus on forward-looking assessments to ensure our equipment is prepared to meet the evolving demands of our infrastructure. Whether that be air source heat pumps, EV chargers, or service upgrades, by anticipating potential areas of load growth within our region, we proactively enhance our systems to minimize or prevent downtime, ensuring a reliable and robust network.

Undertaking long-term, multi-year projects for grid enhancements has been a compelling challenge for our department in recent years and will remain a key focus into the next decade.

Capital Projects Completed in CY 2024:

Project Name:	Work Order #:	Total Spent:	Years:
3W18 Getaway Improvements	125	$318,803	CY22 -24
5W4/5W5 Getaway Improvements	132	$173,735	CY23-24
Pole Line Upgrade: Fordham Rd, W	136	$319,401	CY23-24
Force Account (MassDOT): Lowell at Woburn Street, W	202	$358,261	CY23 -24
Johnson Woods – Create Loop	315	$258,000	CY24
Gazebo Circle, Reading, Underground Feed Relocation	742	$290,000	CY22-24



*Carry Over Numbers based on financial figures through August 2024.

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Pad-mount Switchgear Upgrade at Industrial Parks **Work Order #:** 102 **Status:** Completing Spring 2025

Brief Description/Scope:

Purchase new units to replace live front pad-mounted switchgear. New units will be dead front with provisions for remote/supervisor control. In 2025 the RMLD will install the last four units including two motor operated style switchgear, which will be bid and ordered in CY2022.

Status Update:

The 2 motor operated switches were bid out and ordered in January of 2023, IFP 2022-38, PO# 23-E00074. Delivery was originally quoted at 62 to 66 weeks. Delivery is now expected in September of 2024. Installation will be in the Spring of 2025.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2023
Pad-mount Switchgear Upgrade at Industrial Parks	$50,000	$7,000	N/A	$57,000	$245,000

Substation 4, Causeway St, Reading, MA

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Grid Automation, Modernization & Optimization **Work Order #:** 103 **Status:** On-Going

Brief Description/Scope:

Continue implementation of the Grid Automation, Modernization and Optimization Road Map including installation and integration of smart switches, IntelliRupters, capacitor banks and Volt Var Optimization (VVO) and controls, cyber security, simulators, fiber rationale connections, Fault Detection Isolation and Restoration (FDIR), economic dispatch, and overall system integration, including GIS and AMI/MDM.

Status Update:

The Department has installed 30 Scadamate Switches and 10 IntelliRupters. The Department continues to modify/upgrade capacitor banks to work with the Volt Var Optimization Controls. The Department continues to integrate the communications of each of these devices to work within the SCADA environment.

The Department has ordered 8 Scadamate Switches in 2024. Four of the units were received in June of 2024. The other 4 units are due in September of 2024

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Scada- Mate Switches	$140,000	$297,000	$13,000	$450,000	$724,000
IntelliRupter®	N/A	N/A	N/A	N/A	$196,000
ABB Reclosers	$92,000	$219,000	$8,000	$319,000	$317,000
Cap Bank Automation	N/A	$20,000	N/A	$20,000	N/A
Software Integration	N/A	$30,000	N/A	$30,000	N/A
Communication to Field Devices	N/A	$75,000	N/A	$75,000	N/A
Power Factor Correction/VVO	N/A	$80,000	N/A	$80,000	N/A
Meter Data Management (MDM)	N/A	N/A	N/A	N/A	$445,367*
Total:				**$974,000**	

*Meter Data Management carry over is from CY 2023

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Substation 6 **Work Order #:** 105 **Status:** On-Going

Brief Description/Scope:

RMLD will build a new 115kV/13.8 kV substation in Wilmington in the Ballardvale/ Route 125 area. The new substation will include two 75 MVA transformers and 15kV switchgear with eight (or more as needed) feeder/breaker positions. This new substation will also provide backup and load relief for Substation 3, Substation 4, and Substation 5.

Status Update:

The Power Transformers are scheduled to be ready for delivery at the end of December of 2024, the 15 kV switchgear is scheduled to ready for delivery in September of 2025, the 115kV breakers, structure will be bid out in September of 2024, the site prep & foundations bid will be ready in September of 25 to be bid out.

The delays have been to the interaction with National Grid. National Grid has many transmission jobs in the que. PLM needed certain transmission design information from National Grid to proceed with the 115 kV structures and equipment bid, as well as the site prep and foundations bid. National Grid finally agreed to a kick-off meeting for June 27, 2024. They assigned a project manager to get back to us with the required information. PLM needed the required interrupting rating of the 115 kV breakers, the design amperage of the transmission line and breakers, and the maximum design tension of the conductors to be dead ended on the RMLD structures. The duct bank and station get-a-ways bid will go out in the winter/spring of 2025.

Project Name	Land	Labor	Material	Project Total
Substation 6 Project	**$4,000,000**		**$ 31,086,210**	**$35,086,210**

Project Name	Budget	Spent	Remaining CY24 Milestone	Carry Over
Land Purchase CY2022		$4,000,000		
Prior Spent		$370,690		
CY 2023 Budget	$7,992,500	$1,523,848		$6,468,652
CY 2024 Budget	$15,513,000	$2,885,694	$3,621,057	**$15,474,901**
CY 2025 Budget	**$7,950,000**			
CY 2026 Budget	$2,707,000			
CY 2027 Budget	$2,666,666			
CY 2028 Budget	$2,666,666			

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: 35 kV Underground Cable Upgrade - 4P9 Station 4 **Work Order #:** 109 **Status:** Completing Spring 2025

Brief Description/Scope:

The RMLD will replace the 350CU underground cable on 4P9 running from the 35kV structure at the back of Station 4 to the structure by the entrance of Station 4. This cable runs under Route 93 along the railroad tracks. Crews will also replace the 350CU underground cable at Station 5 from the structure to the transformer

Status Update:

This project will need to be scheduled for light load periods. While either circuit is out of service, Station 5 will be running on one line. This project will be completed in Spring 2025.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
13.8kV Upgrades (Step-down Areas, etc.) All Towns	N/A	N/A	N/A	N/A	$249,000

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025
Annual Preventive Projects

Project Name: Underground Facilities Upgrades (URDs, Manholes, etc.) **Work Order #:** 106 **Status:** Annual

Brief Description/Scope:

Replace primary and neutral cables, and pad-mount transformers as needed in the various URDs. The precast transformer pads will be replaced with fiberglass box pads, as needed, for elevation requirements. Certain areas will be targeted each year. In 2025, we will continue inspecting transformers to determine which URDs will need to be scheduled for upgrades. Areas to be targeted include Wildwood Estates, Center Village and King James Grant Estates in Lynnfield, Parkwood Estates in North Reading, Pine Grove Estates in Reading and Whitfield Elm Village, Blanchard Road and Apache Way in Wilmington

Status Update:

Areas targeted in 2024 include Baldwin Lane, Acorn Knoll, and Hidden Pond Lane, North Reading; Serenoa Lane, Nelson Way and Flynn Way, Arlene Ave & Ring Ave in Wilmington; and Zachary Lane, in Reading; and Pocahontas Way in Lynnfield. The Department has replaced/upgraded 42+ single phase pad-mount transformers since the beginning of the year.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Underground Facilities Upgrades (URDs, Manholes, etc.)	$267,000	$127,000	$30,000	$424,000	N/A

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: 13.8kV Upgrades (Step-down Areas, etc.) All Towns **Work Order #:** 107 **Status:** Annual

Brief Description/Scope:

Replace poles, primary cable, and overhead transformers, as needed, in the various step-down areas. Convert areas to 13.8kV and remove step-down transformers. The secondary cable and service upgrades will be done in conjunction with Project 458. The areas targeted for 2025 are the Faulkner Ave area in Wilmington, the Whitehall and the Ash Hill area in Reading. These are Verizon set areas.

Status Update:

In 2024 the Department completed the conversion of the Salem and Forest Street area in North Reading. The Department has continued working in the Orchard Drive area in North Reading, the Edwards Ave area in Lynnfield, and the Belmont Street area in Reading.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
13.8kV Upgrades (Step-down Areas, etc.) All Towns	$262,000	$77,000	$11,000	$350,000	N/A

(New Substation Transformer Install, Station 4 – circa 2010)

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Transformers and Capacitors Purchase (Stock and Projects) **Work Order #:** 116 **Status:** Annual

Brief Description/Scope:

All transformers and capacitors for planned and ad hoc projects are purchased under this project. These transformers and capacitors will be used for new construction, as well as reliability projects including Secondary and Main Replacement, 13.8kV Upgrade (Step-down Areas), Underground Facilities Upgrades, and Aged/Overloaded Transformer Replacement

Status Update:

As of September 2024, the Department still has 320 transformers on back order of which 196 are scheduled for delivery in the last quarter of 2024, 124 units are scheduled for delivery in 2025.

Project Name	Qty	Subtotal CY2025
Single Phase Pole-mounts	125	$435,000
Single Phase Pad-mounts	10	$125,000
Three Phase Pad-mounts	15	$575,000
Three Phase Pole-mounts	30	$237,000
Transformers Purchase 2025		**$1,372,000**

Backordered Transformers:

Project Name	CY	Qty	Amount	Est Delivery
Three Phase Pad-mounts	2022	2	$184,411	Oct-24
Single Phase Pad-mounts	2023	2	$25,320	Oct-24
Single Phase Pole-mounts	2024	72	$232,416	Oct-24
Single Phase Pad-mounts	2024	40	$252,070	Oct-24
Single Phase Pole-mounts	2022	80	$647,337	Dec-24
Projected Spend		**196**	**$1,341,554**	
Single Phase Pad-mounts	2023	80	$982,200	Jan-25
Three Phase Pad-mounts	2023	26	$1,134,356	Jan-25
Three Phase Pad-mounts	2024	8	$180,925	Apr-25
Single Phase Pad-mounts	2022	10	$261,690	TBD
Carry Over		**124**	**$2,559,171**	

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Overhead Upgrade Program (Primary, Secondary and Main Replacement) - All Towns **Work Order #:** 458 **Status:** Annual

Brief Description/Scope:

This program identifies aging infrastructure and addresses a variety of work to include pole replacements, primary cable and secondary upgrades, transformer upgrades and service drop upgrades, as needed. Various areas in the service territory will be targeted for upgrade in 2025 in conjunction with the 13.8kV Upgrade (Step-down Areas) – Project 107. The areas selected are usually the result of the pole inspections and/or overloaded transformer replacements/upgrades.

Status Update:

The Department will continue with this ongoing project.

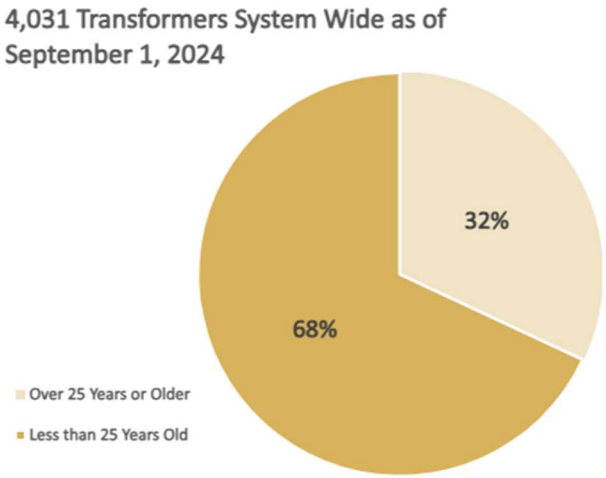
Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Overhead Upgrade Program (Primary, Secondary and Main Replacement) - All Towns	$356,000	$154,000	$40,000	$550,000	N/A

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Aged/Overloaded Transformer Replacement Program **Work Order #:** 668 **Status:** Annual

Brief Description/Scope:

All transformers over 25 years old are inspected and prioritized for replacement based on age, physical condition, and load. Additionally, the transformer load management program will further identify transformers that need replacement. Any transformer replacement not part of an area upgrade under one of the reliability programs will be replaced under this project.



Status Update:

The Department will continue with this project. Year to date the Department has replaced/upgrade over 60 single phase pole-mount transformers as part of this program or one of the other reliability projects.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Aged/Overloaded Transformer Replacement Program	$351,000	$105,000	$44,000	$500,000	N/A

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025
Pole Line Upgrades

Project Name: Pole Upgrades - Ballardvale St, Wilmington **Work Order #:** 124 **Status:** Beginning 2025

Brief Description/Scope:

RMLD to replace 28 poles on Ballardvale Street with 55' poles, transfer circuits 5W8, 5W9 spacer cables/open wire primary, transfer transformers, laterals, secondary cable, services and streetlights.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Pole Upgrades Ballardvale St, W	$428,290	$74,360	$238,500	$741,150	N/A

Project Name: Pole Line Upgrade - River Park, Wilmington/ North Reading (Formerly Fordham Rd) **Project #:** 136 **Status:** Beginning 2025

Brief Description/Scope:

Extend circuits 4W10 and 5W4 from Concord Street to proposed battery storage location, once approved, behind 700 River Park Drive. Includes the installation of approximately 22 new poles and approximately 4000 circuit feet of 336AL spacer cable (2,000 feet for each circuit).

Status Update:

Pole line upgrade on Fordham Road was completed. Project location has changed from Fordham Road due to permitting/permissions during the planning process of the Battery Owner/Installer. The new proposed location is behind 700 River Park Drive.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Pole Upgrades River Park, Wilmington/ North Reading	N/A	N/A	N/A	$153,757	N/A

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Pole Upgrades - Industrial Way, Wilmington **Work Order #:** F261 **Status:** Beginning 2026

Brief Description/Scope:

RMLD to replace 35 poles on Industrial Way with 55' poles, transfer circuits 4W4, 4W24, 4W12 & 4W28 spacer cables/open wire primary/aerial cable, transfer transformers, laterals, secondary cable, services and streetlights.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Subtotal CY2026
Pole Upgrades Industrial Way, Wilmington	$466,040	$86,350	$230,400	N/A	$782,790

(Pole Top Transformer being installed)

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025
Circuit Upgrades

Project Name: Circuit Upgrade - West St, Wilmington - Lowell to Woburn **Work Order #:** F252 **Status:** Beginning 2025

Brief Description/Scope:

Verizon to replace 40 poles, RMLD to reconductor 5000' of 336 spacer cable with 556 spacer cable, transfer 4W10 spacer cable, install two GOSs, transfer risers, laterals, transformers, secondary cable, services & streetlights.

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Carry Over CY2024
Circuit Upgrade - West St, W - Lowell to Woburn	$234,900	$122,100	$115,200	$472,200	N/A

Project Name: Circuit Upgrade – Beverly Rd ROW to Grove St, Reading **Work Order #:** F262 **Status:** Beginning 2026

Brief Description/Scope:

Replace 10 poles, reconductor 2000' of 336 spacer cable with 556 spacer cable, replace 1000' of 500 mcm CU UG primary cable with 750 mcm CU UG primary cable, replace/upgrade underarm switches with GOSs & Scadamates, remove old spacer cable, transfer construction.

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Subtotal CY2026
Circuit Upgrade – Beverly Rd ROW to Grove St, Reading	$153,170	$176,000	$72,000	N/A	$401,170

Project Name: Circuit Upgrade - Andover St, Wilmington Access Road to Route 125 **Work Order #:** F271 **Status:** Beginning 2027

Brief Description/Scope:

Verizon to replace 30 poles, RMLD to reconductor 5000' of 336 spacer cable with 556 spacer cable, transfer 3W5 spacer cable, remove old spacer cable, install two GOSs, transfer risers, laterals, transformers, secondary cable, services & streetlights.

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Subtotal CY2027
Circuit Upgrade - Andover St, W - Access Road to Route 125	$234,900	$123,420	$115,200	N/A	$473,520

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Circuit Upgrade - Butters Row, Wilmington **Work Order #:** F272 **Status:** Beginning 2027

Brief Description/Scope:

Verizon to replace 20 poles, RMLD to reconductor 3500' of 4/0 CU spacer cable with 556 spacer cable, and install one GOS, remove old spacer cable, transfer transformers, laterals, risers, secondary cable, services and streetlights

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Subtotal CY2027
Circuit Upgrade - Butters Row, W	$135,040	$81,890	$69,600	N/A	$286,530

Project Name: Circuit Upgrade - Concord St, Wilmington - Middlesex to Woburn **Work Order #:** F281 **Status:** Beginning 2028

Brief Description/Scope:

Replace 16 poles, reconductor 4200' of 336 spacer cable with 556 spacer cable, replace 1 set of underarm switches with a GOS, remove old spacer cable, transfer transformers, laterals, secondary cable, services and streetlights.

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Subtotal CY2028
Circuit Upgrade - Concord St, W - Middlesex to Woburn	$157,430	$109,340	$84,000	N/A	$350,770

Project Name: Circuit Upgrade - Woburn St, Wilmington Park to Salem **Work Order #:** F282 **Status:** Beginning 2028

Brief Description/Scope:

Verizon to replace 40 poles, RMLD to reconductor 5000' of 336 spacer cable with 556 spacer cable, transfer 4W10 spacer cable, install two GOSs, transfer risers, laterals, transformers, secondary cable, services & streetlights.

Project Name	Labor	Material	Vehicle	Subtotal CY2025	Subtotal CY2028
Circuit Upgrade - Woburn St, W - Park to Salem	$197,950	$95,810	$100,500	N/A	$394,260

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025
FORCE ACCOUNTS: MassDOT

Force Accounts are reimbursable jobs that are sponsored by the Massachusetts Department of Transportation (MassDOT). Any work associated with the relocation/modification of overhead and/or underground municipal utilities, by a MassDOT project, is reimbursable. There are certain restrictions with what qualifies for reimbursement, i.e., you cannot upgrade equipment, you must show a credit for scrapped materials, raising or lowering manholes covers is not reimbursable, etc. Force Accounts must be prepared, submitted, and accepted by MassDOT to qualify for reimbursement.

Project Name:	Force Account (MassDOT): Route 38 Bridge over MBTA, Wilmington	**Work Order #:**	203	**Status:**	Completing Early 2025

Brief Description/Scope:

Verizon to set nine (9) permanent poles and two (2) temporary poles, RMLD to transfer construction to new poles and make provisions to be able to de-energize the primary cables along the bridge during bridge installation. Once bridge is in place, Verizon to set two (2) permanent poles and the RMLD to transfer construction from the temporary poles to the permanent poles.

Status Update: This is a two-phase, two-year project – phase 1 will be to replace nine poles and relocate two temporary poles away from the bridge and transfer construction – phase 2 will be to place the last two permanent poles, once the bridge has been replaced, and transfer construction

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Force Account (MassDOT): Route 38 Bridge over MBTA, W	N/A	N/A	N/A	N/A	$66,000

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: Force Account (MassDOT): Butters Row over MBTA, Wilmington **Work Order #:** 206 **Status:** Completing Early 2025

Brief Description/Scope:

Verizon to set four (4) temporary poles. RMLD to build temp primary feed along temporary poles to 613 Main Street and remove construction over bridge. Once bridge is in place, Verizon to set ten (10) permanent poles, RMLD to set one (1) permanent pole & push-brace at pole 73 Main St., RMLD install new primary & secondary cables over the bridge and in the Main & Cross Street intersection. RMLD to re-install switch at P.29 Butters Row, transfer the permanent feed to 613 Main Street back to new pole line and remove construction from temp poles

Status Update: This will be a two-year, two phase project – phase 1 is to get the temporary pole line installed to feed 613 Main Street and remove the distribution system from Main Street to pole 25 Butters Row – phase 2 is for Verizon to set the new poles once the bridge has been completed and for RMLD to rebuild spacer cable circuit back over the Butters Row Bridge.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Force Account (MassDOT): Butters Row over MBTA, W	N/A	N/A	N/A	N/A	$198,000

Project Name: Force Account (MassDOT): Rt 38 (Main St) Wilmington **Work Order #:** 207 **Status:** Beginning CY 2026

Brief Description/Scope:

MassDOT is reconstructing Route 38 in Wilmington from the Woburn Town Line to the intersection of Route 38 and Route 62. The project involves the replacement/relocation of 60 poles to accommodate sidewalks, curbing, traffic signals, and the widening of intersections. Verizon will be responsible for the pole replacements. The RMLD will transfer primary spacer cable circuits, primary laterals, transformers, primary risers, secondary cables, streetlights, and services.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Subtotal CY2026	Carry Over CY2024
Force Account (MassDOT): Rt 38 (Main St) Wilmington	$291,170	$62,360	$112,500	N/A	$466,030	N/A

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025
Battery Storage/ Solar Array

Project Name: Long Duration Battery Storage 10 MW **Work Order #:** F25-4 **Status:** Beginning CY2025

Brief Description/Scope:

RMLD plans on installing and utilizing a battery system capable of discharging for 100 hours. This will give RMLD's network access to a long-duration, multi-day energy option made with environmentally clean and safe chemistry. This multi-day asset will be a source of reliable, grid-scale energy that can be used for peak-shaving or as a backup power source.

Project Name	CY2025	CY2026	CY2027	Project Estimate
Long Duration Battery Storage 10 MW	$13,000,000	$2,000,000	N/A	$15,000,000

Project Name: [LCWD Solar/BESS Energy Park] 2 MW Solar/ 10 MW Battery **Work Order #:** F25-5 **Status:** Beginning CY 2025

Brief Description/Scope:

RMLD will be working with the Lynnfield Center Water District (LCWD) to create an energy park around their new wastewater treatment facility on Glen Drive. This project will pair 2MW of solar energy and 10MW battery storage to create and store renewable energy. Along with the benefits to RMLD customers, LCWD will gain increased reliability with these assets on site.

Project Name	CY2025	CY2026	CY2027	Project Estimate
2 MW Solar/ 10 MW Battery	$2,000,000	$3,000,000	$4,000,000	$9,000,000

Project Name: [Maple Meadows Energy Park] 8 MW Solar Field/ 10 MW Battery **Work Order #:** F25-6 **Status:** Beginning CY 2025

Brief Description/Scope:

RMLD plans on utilizing the environmentally impacted site at Maple Meadows to create clean, carbon-free energy. RMLD will be maximizing the solar potential of this property by pairing it with a grid-scale battery system. This project will allow RMLD to generate and store a significant amount of energy within territory.

Project Name	CY2025	CY2026	CY2027	Project Estimate
8 MW Solar Field/ 10 MW Battery	$4,000,000	$10,000,000	$16,000,000	$30,000,000

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: North Reading School (HS Roof and Canopy) **Work Order #:** F25-7 **Status:** Beginning CY2025

Brief Description/Scope:

RMLD plans on utilizing the North Reading High School for a rooftop solar array and a canopy solar array. RMLD will save money on capacity and transmission costs by generating renewable energy within territory. This project will enhance grid stability and support non carbon goals.

Project Name	CY2025	CY2026	Project Estimate
North Reading School (HS Roof and Canopy)	$1,000,000	$3,000,000	$4,000,000

Project Name: Reading School (Parker, Killam) **Work Order #:** F26-3 **Status:** Beginning CY 2026

Brief Description/Scope:

RMLD plans on utilizing Parker Middle School and the newly built Killam School for rooftop solar arrays. RMLD will save money on capacity and transmission costs by generating renewable energy within territory. This project will enhance grid stability and support non carbon goals.

Project Name	CY2025	CY2026	Project Estimate
Reading School (Parker, Killam)	N/A	$1,000,000	$1,000,000

Project Name: Wilmington Senior Center and School (Shawsheen, West) **Work Order #:** F25-8 **Status:** Beginning CY 2025

Brief Description/Scope:

RMLD plans on utilizing Wilmington Senior Center, Shawsheen Elementary School, and West Intermediate School for rooftop solar arrays. RMLD will save money on capacity and transmission costs by generating renewable energy within territory. This project will enhance grid stability and support non carbon goals.

Project Name	CY2025	CY2026	Project Estimate
Wilmington Senior Center and School (Shawsheen, West)	$1,000,000	$1,000,000	$2,000,000

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

Project Name: 3.5MW Solar Array (RT 125 Solar Array) **Work Order #:** F25-9 **Status:** Beginning CY 2025

Brief Description/Scope:

RMLD plans on installing a solar field on a relatively large plot of land that is currently unutilized. RMLD will be able to use this site as a large source of in-territory energy generation that will strengthen the reliability of the electric system.

Project Name	CY2025	CY2026	CY2027	Project Estimate
3.5MW Solar Array (RT 125 Solar Array)	$1,000,000	$8,000,000	$3,000,000	$12,000,000

Project Name: 2.5 MW Utility Solar **Work Order #:** F25-10 **Status:** Beginning CY 2025

Brief Description/Scope:

RMLD will propose a 2.5 MW solar array to be installed at the existing Olin Chemical Superfund Site engaging with the property's new owner. Alternatively, the project may be situated on a privately owned, 15-acre undeveloped site along Andover Street in Wilmington.

Project Name	CY2025	CY2026	CY2027	Project Estimate
2.5 MW Utility Solar	$1,500,000	$6,500,000	$1,000,000	$9,000,000

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	CY 26-30	Status
$ Shown in thousands							
102	Pad-mount Switchgear Upgrade at Industrial Parks	251	7	245	57	Completing CY2025	
103	Grid Automation, Modernization & Optimization						
	Scada- Mate Switches	641	196	724	450	2,140	On-Going
	IntelliRupter®	346	0	196	0	1,364	On-Going
	ABB Reclosers	554	0	317	319	1,037	On-Going
	Cap Bank Automation	0	0	0	20	100	On-Going
	Software Integration	76	0	0	30	233	On-Going
	Comm to Field Devices	854	10	0	75	245	On-Going
	Power Factor Correction/VVO	0	77	0	80	400	On-Going
	Meter Data Management (MDM)	470	25	445	0	0	On-Going
105	Wilmington Substation Construction & Commissioning	21,982	6,507	15,475	7,950	8,040	On-Going
109	35kV Underground Cable Upgrade - 4P9 Substation 4	387	138	249	0	Completing CY2025	
Annual Preventative Projects							
106	UG Facilities Upgrades (URDs, Manholes, etc.) - All Towns	857	500	N/A	424	2,266	Annual
107	13.8kV Upgrade (Step-down Area, etc.) - All Towns	200	200	N/A	350	1,800	Annual
116	Transformers and Capacitors Purchase (Stock and Projects)	7,810	2,210	3,207	1,372	7,500	Annual
458	Overhead Upgrade Program (Primary, Secondary and Main Replacements) All Towns	380	380	N/A	550	2,750	Annual
668	Aged/Overloaded Transformer Replacement Program	857	350	N/A	500	2,500	Annual
Pole Line Upgrades							
124	Pole Upgrades - Ballardvale St, Wilmington	CY25			741	0	Beginning CY2025
136	Pole Upgrades - River Park, Wilmington/ North Reading	314	161	154	0	0	Completing CY2025
F26-1	Pole Upgrades - Industrial Way, Wilmington	CY26			0	783	Beginning CY2026

ENGINEERING DIVISION
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	CY 26-30	Status
Circuit Upgrades							
F25-3	Circuit Upgrade - West St, Wilmington - Lowell to Woburn	**CY25**			472	0	Beginning CY2025
F26-2	Circuit Upgrade – Beverly Rd ROW to Grove St, Reading	**CY26**			0	401	Beginning CY2026
F27-1	Circuit Upgrade - Andover St, Wilmington Access Road to Rt 125	**CY27**			0	474	Beginning CY2027
F27-2	Circuit Upgrade - Butters Row, Wilmington	**CY27**			0	287	Beginning CY2027
F28-1	Circuit Upgrade - Concord St, Wilmington - Middlesex to Woburn	**CY28**			0	351	Beginning CY2028
F28-2	Circuit Upgrade - Woburn St, W - Park to Salem	**CY28**			0	394	Beginning CY2028
Force Accounts							
203	Force Account (MassDOT): Route 38 Bridge over MBTA, W	166	100	66	0	0	Finishing CY2025
206	Force Account (MassDOT): Butters Row over MBTA, W	298	100	198	0	0	Finishing CY2025
207	Force Account (MassDOT): Rt 38 (Main St) Wilmington	N/A	0	0	0	466	Beginning CY2026
Battery Storage/ Solar Array							
F25-4	Long Duration Battery Storage 10 MW/ 100hrs	**CY25**			13,000	2,000	Beginning CY2025
F25-5	2 MW Solar/ 10 MW Battery (Lynnfield Water Dept)	**CY25**			2,000	7,000	Beginning CY2025
F25-6	8 MW Solar Field/ 10 MW Battery (Maple Meadows)	**CY25**			4,000	26,000	Beginning CY2025
F25-7	North Reading School (HS Roof and Canopy)	**CY25**			1,000	3,000	Beginning CY2025
F26-3	Reading School (Parker, Killam)	**CY26**			0	1,000	Beginning CY2026
F25-8	Wilmington Senior Center and School (Shawsheen, West)	**CY25**			1,000	1,000	Beginning CY2025
F25-9	3.5 MW Solar Array (RT 125 Solar Array)	**CY25**			1,000	11,000	Beginning CY2025
F25-10	2.5 MW Utility Solar	**CY25**			1,500	7,500	Beginning CY2025
Future Projects							
F26-4	Distribution Improvements Associated with New Wilmington Substation	**CY26**			0	2,500	Beginning CY2026
F26-5	4W24 Partial Circuit Reconductoring	**CY26**			0	386	Beginning CY2026

CAPITAL PROJECTS

Grid Assets and Communications

GRID ASSET DIVISION
CAPITAL PROJECTS CY2025

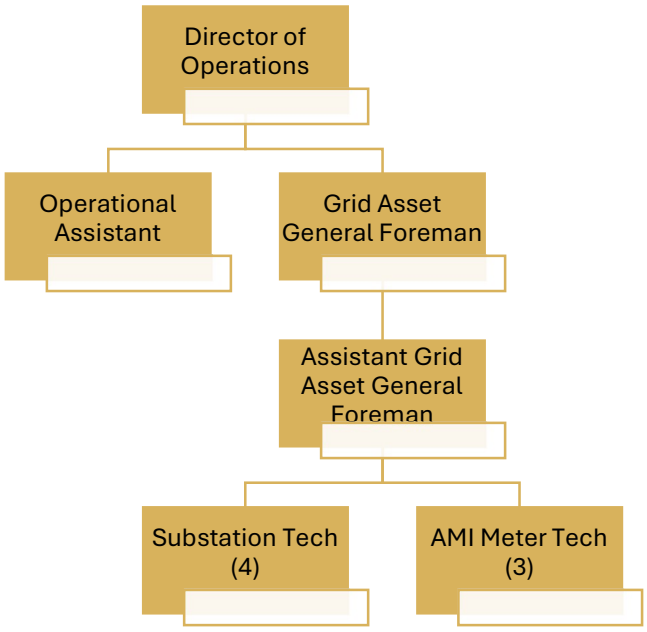
Nick D'Alleva, Grid Asset General Forman

(Substation 4 – Reading, MA)

As electrification continues to expand, it is imperative to ensure that the power RMLD procures—whether from solar, wind, or natural gas sources—is safely integrated into our network and delivered reliably to our residents. The implementation of the new Automated Metering Infrastructure (AMI) and Meter Data Management (MDM) Systems are key components of this effort. These systems will provide the necessary data to monitor and verify that our load remains sustainable and well-balanced, ensuring efficient and safe energy distribution.

Capital Projects Completed in CY 2024:

Project Name:	Work Order #:	Total:	Years:
Station 4 CCVT Replacement	133	$108,115	CY22-23



*Carry Over Numbers based on financial figures through August 2024.

GRID ASSET DIVISION
CAPITAL PROJECTS CY2025

Project Name: Primary Metering Inspection and Upgrade Program **Work Order #:** 110 **Status:** On-Going

Brief Description/Scope:

RMLD has initiated an inspection program of all primary metering revenue equipment. It is predicted that many of these installations will need to be replaced due to age and/or condition. Some primary metering customers are expected to be converted to secondary metering during implementation. This project will cover the cost of any necessary upgrades.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Primary Metering Inspection and Upgrade Program	N/A	$100,000	N/A	$100,000	$111,000

Project Name: Substation Equipment Upgrade **Work Order #:** 111 **Status:** Annual

Brief Description/Scope:

This is a proactive, preventive maintenance program for RMLD substations to increase reliability and prevent premature failure of long-lead substation equipment. RMLD personnel have identified substation equipment that needs to be replaced or upgraded as a result of their condition assessment.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Substation Equipment Upgrade	N/A	$40,000	N/A	$40,000	N/A

GRID ASSET DIVISION
CAPITAL PROJECTS CY2025

Project Name: AMI Mesh Network Expansion and Meter Replacement **Work Order #:** 112 **Status:** On-Going

Brief Description/Scope:

The RMLD hired a consultant who performed a system-wide evaluation of the current AMI/AMR mesh network and metering system and made recommendations for AMI system upgrades to accommodate current deficiencies as outlined above and to address future metering and data needs. The consultant also recommended RMLD purchase and install Meter Data Management (MDM) for housing metering data and data analytics. Katama Technologies, Inc., was then hired to prepare RFPs for both AMI and MDM systems based on the consultant's recommendations. In 2022, RMLD hired PSE (Power System Engineering) to review the RFPs and manage the project from procurement through full implementation. MDM procurement, which is part of the Grid Automation, Modernization and Optimization (Project 103) will take place 2023, followed by the AMI procurement starting in 2024. Once an AMI vendor is selected and materials have been procured, the headend and communication infrastructure installation will commence followed by the full deployment of meters in years 2025 through 2027. An outside contractor will be hired to remove the old meters and install the new meters.

The new AMI/MDM systems will be integrated with OMS/SCADA, Cogsdale-Harris CIS, and billing systems. Metering data obtained from this new system will be used by the Integrated Resources Division for data analytics, load forecasting, demand side management, and demand response programs.

Status Update from Prior Year:

Finalizing vendor selection and submittal to the board late Fall of 2024.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
AMI Mesh Network Expansion and Meter Replacement	N/A	$2,509,000	N/A	$2,509,000	$1,155,000

GRID ASSET DIVISION
CAPITAL PROJECTS CY2025

Project Name: Meters and Primary Meters (for Stock) **Work Order #:** 117 **Status:** Annual

Brief Description/Scope:

Purchase of meters and metering equipment for new construction, upgrades, and failures.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Meters and Primary Meters	N/A	$80,000	N/A	$80,000	N/A

GRID ASSET DIVISION
CAPITAL PROJECTS CY2025

WO#	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	Sub CY26-30	Status
$ Shown in thousands							
110	Primary Metering Inspection and Upgrade Program	211	64	111	100	80	On-Going
111	Substation Equipment Upgrade	202	20	N/A	40	200	Annual
112	AMI Mesh Network Expansion & Meter Replacement	1,270	115	1,155	2,509	4,989	On-Going
117	Meters and Primary Meters (for stock)	80	80	N/A	80	220	Annual

CAPITAL PROJECTS

Operations

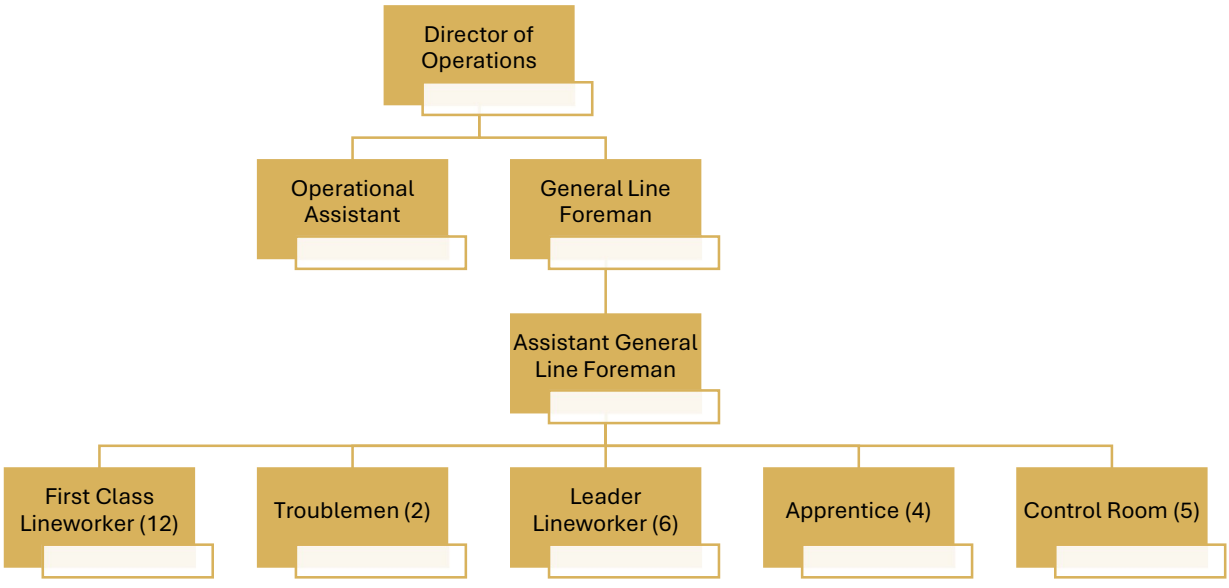
LINE DIVISION
CAPITAL PROJECTS CY2025

(Line Crew – Setting a New Pole)

Matt Bernard, General Line Foreman

In the Line Department, we are steadfastly committed to the RMLD mission statement, recognizing that the reliability of our network is the cornerstone of our responsibilities. Our primary objective is to ensure continuous electrical service for our customers, even amidst the most challenging weather conditions New England may present. Should an outage occur, our goal is to restore power as swiftly and safely as possible.

We are dedicated to enhancing productivity and reliability while maintaining a focus on safety and attention to detail. In 2025, we will continue to upgrade poles, overhead and underground transformers and to uphold the reliability of our community's electrical infrastructure.



*Carry Over Numbers based on financial figures through August 2024.

LINE DIVISION
CAPITAL PROJECTS CY2025

Project Name: Safety Program **Work Order #:** 114 **Status:** Annual

Brief Description/Scope:

This annual project is for the purchase of safety equipment and tools. These purchases include the replacement or upgrade of existing safety equipment and to assist line workers and technicians in performing their jobs safer and more efficiently.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Safety Program	N/A	$30,000	N/A	$30,000	N/A

Project Name: Power/Lab and Tool Equipment **Work Order #:** 115 **Status:** Annual

Brief Description/Scope:

This annual project is for the purchase of test equipment and tools. These purchases include the replacement or upgrade of existing equipment and new tools and equipment that assist line workers and technicians in performing their jobs safer and more efficiently.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Power/Lab and Tool Equipment	N/A	$65,000	N/A	$65,000	N/A

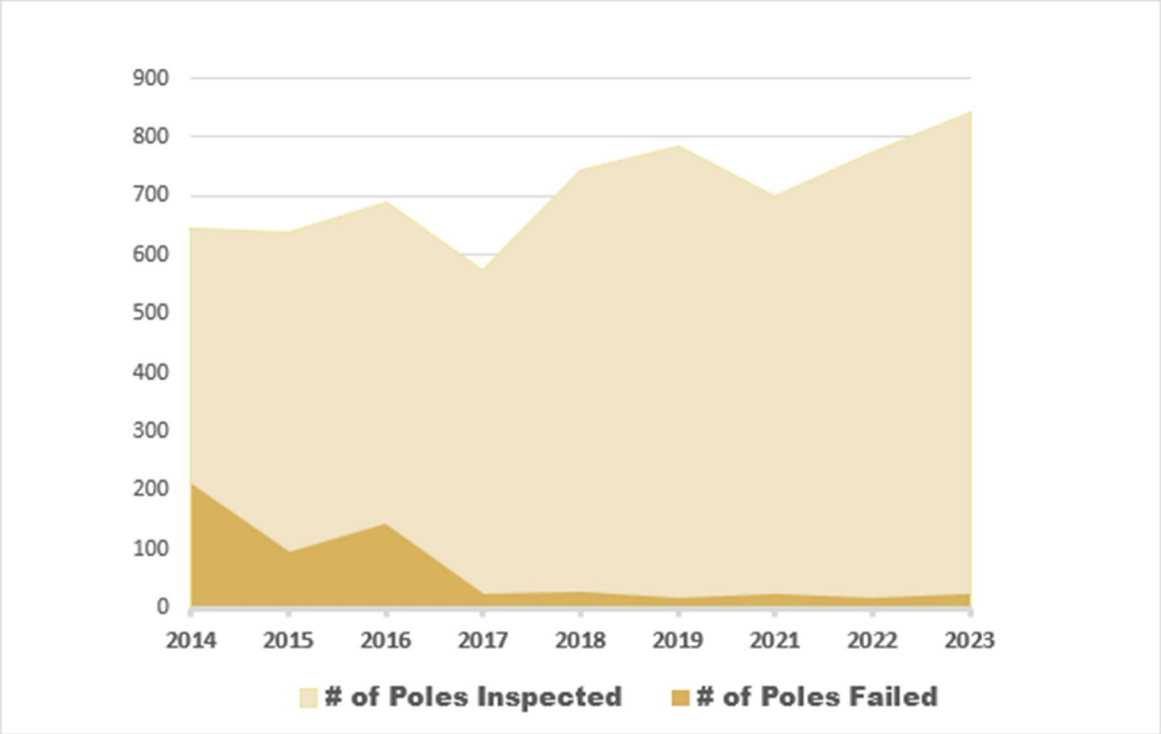
LINE DIVISION
CAPITAL PROJECTS CY2025

Project Name: Pole Replacement Program (R, NR) **Work Order #:** 175 **Status:** Annual

Brief Description/Scope:

RMLD will replace poles that are identified as part of the Pole Inspection Program. In 2025 100 poles are budgeted to be replaced. This includes setting poles, transfers, and replacing secondary services as needed.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Pole Replacement Program (R, NR)	N/A	$307,000	N/A	$307,000	N/A



(source: Alamon Annual Reports)

LINE DIVISION
CAPITAL PROJECTS CY2025

Project Name: Routine Construction **Work Order #:** N/A **Status:** Annual

Brief Description/Scope:

Routine Construction covers unplanned routine activity as well as capital construction projects that develop during the year including, but not limited to the items shown below.

- Overhead and underground system upgrades
- Miscellaneous projects
- Pole damage
- Station upgrades
- Porcelain cutout replacements
- Street Light Connections – new equipment installation
- Pole setting/transfers
- Underground subdivisions (new construction)

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Routine Construction	N/A	$2,000,000	N/A	$2,000,000	N/A

Project Name: Service Connections (Residential and Commercial) – All Towns **Work Order #:** N/A **Status:** Annual

Brief Description/Scope:

This item includes new service connections, upgrades, and service replacements for residential, commercial, and industrial customers. This represents the time and materials associated with the replacement of an existing or installation of a new overhead service drop and the connection of an underground service, etc. This does not include the time and materials associated with pole replacements/installations, transformer replacements/installations, primary or secondary cable replacements/ installations, etc. These aspects of a project are captured under Routine Construction.

Project Name	Labor	Material	Vehicles	Subtotal CY2025	Carry Over CY2024
Service Connections	N/A	$315,000	N/A	$315,000	N/A

LINE DIVISION
CAPITAL PROJECTS CY2025

WO #	Project Name	CY24 Total w/ CO	CY24 Project Spend	CY24 Carry Over	CY25	Sub CY26-30	Status
$ Shown in thousands							
114	Safety Program	New in CY 2025			30	150	Annual
115	Power/Lab and Tool Equipment	113	95	N/A	65	150	Annual
175	Pole Replacement Program, R and NR	1,008	240	N/A	307	1,668	Annual
N/A	Routine Construction - All Towns	1,501	1,501	N/A	2,000	11,500	Annual
N/A	Service Connections (Residential and Commercial) - All Towns	310	290	N/A	315	1,660	Annual

2025 OPERATING BUDGET

Town of Reading, Massachusetts
Municipal Light Department
Statement of Budgeted Revenues and Expenses

	CY25 BUDGET	CY24 BUDGET	Change in Budget %
Operating Revenues			
Base Revenue	$ 45,360,454	$ 40,385,209	12.32%
Fuel Revenue	35,140,174	33,549,002	4.74%
Purchased Power Capacity/Transmission	38,214,819	38,263,627	(0.13%)
Forfeited Discounts	1,360,814	1,211,556	12.32%
Energy Conservation Revenue	3,330,573	2,733,116	21.86%
NYPA	(1,144,145)	(1,133,940)	0.90%
Total Operating Revenues	122,262,689	115,008,570	6.31%
Expenses			
Power Expenses			
555 Purchased Power - Fuel	35,140,174	33,549,002	4.74%
555 Purchased Power - Capacity	14,359,191	16,100,402	(10.81%)
565 Purchased Power - Transmission	24,035,627	21,181,651	13.47%
Total Purchased Power	73,534,993	70,831,054	3.82%
Operating and Maintenance Expenses			
580 Supervision and Engineering	1,236,775	945,126	30.86%
581 Station/Control Room Operators	583,629	526,168	10.92%
582 Station Tech	1,344,546	1,310,897	2.57%
583 Line General Labor	753,743	813,453	(7.34%)
585 Street Lighting	6,565	6,355	3.30%
586 Meter General	342,121	267,117	28.08%
588 Materials Management	668,459	611,890	9.24%
593 Maintenance of Lines - Overhead	641,194	732,300	(12.44%)
593 Maintenance of Lines - Tree Trimming	1,596,424	829,901	92.36%
594 Maintenance of Lines - Underground	184,804	185,192	(0.21%)
595 Maintenance of Lines - Transformers	351,826	351,742	0.02%
598 Line General Leave Time Labor	431,897	453,565	(4.78%)
Total Operating and Maintenance Expenses	8,141,983	7,033,708	15.76%
General & Administrative Expenses			
903 Customer Collection	1,607,394	1,466,599	9.60%
904 Uncollectible Accounts	80,000	75,000	6.67%
916 Integrated Resources	915,784	996,716	(8.12%)
916 Efficiency and Electrification Expense	3,955,708	3,450,478	14.64%
920 Administrative and General Salaries	3,243,382	3,416,126	(5.06%)
921 Office Supplies	20,000	20,000	0.00%
923 Outside Services-Legal	676,000	600,800	12.52%
923 Outside Services-Contract	679,000	642,400	5.70%
923 Outside Services-Education	387,850	338,450	14.60%
924 Property Insurance	676,692	595,705	13.60%
925 Injuries and Damages	27,100	25,600	5.86%
926 Employee Pensions and Benefits	5,463,807	5,116,479	6.79%
930 Miscellaneous General Expense	670,158	555,522	20.64%
931 Rent Expense	260,000	233,200	11.49%
933 Vehicle Expense	393,000	389,000	1.03%
933 Vehicle Expense - Capital	(510,268)	(510,268)	0.00%
935 Maintenance of General Plant - Technology	725,000	700,000	3.57%
935 Maintenance of Building & Garage	1,190,357	1,301,753	0.00%
Total General & Administrative Expenses	20,460,965	19,413,560	5.40%
Other Operating Expenses			
403 Depreciation	5,972,893	5,798,925	3.00%
408 Voluntary Payments to Towns	2,889,432	2,023,689	42.78%
Total Other Expenses	8,862,325	7,822,614	13.29%
Operating Income	11,262,423	9,907,635	13.67%
Non-operating Revenues (Expenses)			
415 Contributions in Aid of Construction	-	50,000	0.00%
419 Interest Income	300,000	300,000	0.00%
419 Other Income	710,000	710,000	0.00%
421 Intergovernmental Grants	90,000	90,000	0.00%
426 Return on Investment Payment to Reading	(2,604,445)	(2,528,587)	3.00%
426 Loss on Disposal	(100,000)	(10,000)	900.00%
431 Interest Expense	(73,410)	(10,000)	634.10%
Total Non-operating Revenues (Expenses)	(1,677,854)	(1,398,587)	19.97%
Net Income	$ 9,584,569	$ 8,509,048	12.64%

Reading Municipal Light Department
Six Year Plan
CY25-CY30

	CY24	CY25	CY26	CY27	CY28	CY29	CY30
	BUDGET	**BUDGET**	**BUDGET**	**BUDGET**	**BUDGET**	**BUDGET**	**BUDGET**
OPERATING REVENUES							
SALES OF ELEC - BASE	$ 40,385,209	$ 45,360,454	$ 46,869,143	$ 48,999,346	$ 49,734,336	$ 50,579,820	$ 51,540,836
SALES OF ELEC - FUEL	33,549,002	35,140,174	34,612,265	35,393,730	36,680,111	38,050,039	38,772,989
SALES OF ELEC - CAPACITY/TRANSMISSION	38,263,627	38,214,819	36,409,210	38,961,576	39,994,103	43,757,544	44,588,938
PURCHASED POWER ADJUSTMENT							
FORFEITED DISCOUNTS	1,211,556	1,360,814	1,406,074	1,469,980	1,492,030	1,517,395	1,546,225
EFFICIENCY ELECTRIFICATION	2,733,116	3,330,573	3,373,870	3,424,478	3,475,845	3,534,935	3,602,099
GAW REVENUE							
NYPA	(1,133,940)	(1,144,145)	(1,159,019)	(1,176,404)	(1,194,050)	(1,214,349)	(1,237,422)
TOTAL OPERATING REVENUES	115,008,570	122,262,689	121,511,543	127,072,706	130,182,374	136,225,383	138,813,665
	70,678,689	72,210,848	69,862,456	73,178,901	75,480,163	80,593,234	82,124,505
OPERATING EXPENSES							
PURCHASED POWER - FUEL	33,549,002	35,140,174	34,612,265	35,393,730	36,680,111	38,050,039	38,772,989
PURCHASED POWER - CAPACITY	14,359,191	14,179,191	12,416,738	13,148,887	13,041,515	13,171,167	13,421,419
PURCHASED POWER - TRANSMISSION	21,181,651	24,035,627	23,992,472	25,812,689	26,952,588	30,586,377	31,167,518
EFFICIENCY AND ELECTRIFICATION EXPENSE	3,955,708	3,991,310	4,043,197	4,103,845	4,165,402	4,236,214	4,316,702
OPERATING & MAINTENANCE EXPENSE	8,141,983	8,589,792	8,630,502	9,126,654	9,191,485	9,742,703	9,811,910
GENERAL & ADMINISTRATIVE EXPENSE	16,505,257	17,413,046	17,495,572	18,501,361	18,632,784	19,750,203	19,890,497
DEPRECIATION EXPENSE	5,972,893	7,510,866	8,091,516	8,575,326	9,005,166	9,326,106	9,326,106
TOWN PAYMENTS - 2% NET PLANT	2,889,432	2,668,884	2,921,009	3,090,961	3,215,256	3,258,355	3,227,995
TOTAL OPERATING EXPENSES	106,555,117	113,528,890	112,203,270	117,753,452	120,884,307	128,121,164	129,935,137
OPERATING INCOME	8,453,453	8,733,798	9,308,273	9,319,254	9,298,068	8,104,219	8,878,528
NON-OPERATING REVENUES (EXPENSES)							
INTEREST INCOME	300,000	300,000	300,000	300,000	300,000	300,000	300,000
OTHER INCOME	850,000	850,000	850,000	850,000	850,000	850,000	850,000
VOLUNTARY PAYMENT TO READING	(2,528,587)	(2,571,781)	(2,574,663)	(2,584,705)	(2,616,638)	(2,654,167)	(2,695,775)
LOSS ON DISPOSAL OF ASSETS	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)
CUSTOMER DEPOSIT INTEREST EXP	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)	(10,000)
TOTAL NON-OPERATING REVENUES (EXPENSES)	(1,398,587)	(1,441,781)	(1,444,663)	(1,454,705)	(1,486,638)	(1,524,167)	(1,565,775)
NET INCOME	$ 7,054,866	$ 7,292,017	$ 7,863,610	$ 7,864,549	$ 7,811,430	$ 6,580,052	$ 7,312,753
Rate of Return	**6.93%**	**6.52%**	**6.53%**	**6.29%**	**6.19%**	**5.51%**	**5.99%**

Reading Municipal Light Department
Operating Budget Supplemental Information
Budgeted and Actual Fixed and Semi-Variable Costs

	CY23 BUDGET	CY23 ACTUAL	CY24 BUDGET	CY24 8 MOS ACTUAL 4 MOS BUDGET	CY25 BUDGET	CY25 % OF BUDGET
FIXED COSTS						
Purchased Power - Fuel	$ 39,944,033	$ 26,960,712	$ 33,549,002	$ 30,504,338	$ 35,140,174	30.9%
Purchased Power - Capacity	$ 15,469,599	$ 14,741,068	$ 16,100,402	$ 17,220,203	$ 14,359,191	12.6%
Purchased Power - Transmission	$ 19,226,389	$ 14,477,921	$ 21,181,651	$ 13,540,145	$ 24,035,627	21.1%
						64.50%
Depreciation Expense	$ 5,445,000	$ 5,224,241	$ 5,798,925	$ 5,339,428	$ 5,972,893	5.2%
Return on Investment Payment to Reading	$ 2,548,972	$ 2,533,024	$ 2,528,587	$ 2,327,056	$ 2,604,445	2.3%
Town Payments - 2% of Net Plant	$ 1,772,440	$ 1,826,606	$ 2,023,689	$ 2,805,274	$ 2,889,432	2.5%
Loss on Disposal of Assets	$ 10,000	$ 67,540	$ 10,000	$ 67,688	$ 100,000	0.1%
TOTAL FIXED COSTS	84,416,433	65,831,111	81,192,255	71,804,132	85,101,762	**74.8%**
SEMI-VARIABLE COSTS						
Labor Expense	10,928,640	10,219,300	11,651,926	10,238,982	12,123,045	10.7%
Labor - Capital	(2,692,323)	(2,118,894)	(2,692,323)	(1,575,758)	(2,993,621)	-2.6%
						8.20%
Overtime Expense	1,063,560	1,902,634	1,226,560	1,694,707	1,564,600	1.4%
Overtime - Capital	(263,974)	(666,547)	(263,974)	(202,154)	(630,774)	-0.6%
						0.70%
Employee Benefits/Pension	5,649,100	5,301,751	6,305,000	5,003,607	6,723,640	5.9%
Employee Benefits/Pension - Capital	(1,080,474)	(671,193)	(1,188,521)	(657,904)	(1,259,833)	-1.1%
						4.90%
Other Operating and Maintenance Expense	3,400,525	3,072,699	3,468,334	3,101,341	3,622,794	3.2%
Efficiency and Electrification Expense	3,064,243	2,321,189	3,450,478	2,150,995	3,955,708	3.5%
Tree Trimming Services	1,589,788	1,412,306	829,901	1,677,189	1,596,424	1.4%
Contract/Consulting Services	740,100	557,714	822,400	487,603	859,000	0.8%
Software/Hardware Maintenance	668,767	767,071	700,000	632,954	725,000	0.6%
Property Insurance	541,550	484,865	595,705	489,969	676,692	0.6%
Legal Expense	785,800	365,693	600,800	357,027	676,000	0.6%
Vehicle Expense	389,000	381,033	389,000	368,547	393,000	0.3%
Vehicle Expense - Capital	(510,268)	(415,373)	(510,268)	(321,383)	(510,268)	-0.4%
Transformer Maintenance (Hazardous Material)	350,000	100,165	350,000	87,580	350,000	0.3%
Training & Tuition Reimbursement Expense	329,150	217,615	338,450	259,439	387,850	0.3%
Rent Expense	212,000	211,393	233,200	246,256	260,000	0.2%
Bad Debt Expense	75,000	52,476	75,000	62,476	80,000	0.1%
Injuries & Damages	25,600	81,811	25,600	3,684	27,100	0.0%
RMLB/CAB	30,000	7,537	30,000	12,344	30,000	0.0%
Office Supplies	20,000	18,472	20,000	15,238	20,000	0.0%
TOTAL SEMI-VARIABLE COSTS	25,315,783	23,603,718	26,457,267	24,132,740	28,676,358	**25.2%**
TOTAL	$ 109,732,215	$ 89,434,830	$ 107,649,522	$ 95,936,872	$ 113,778,120	**100.0%**

Town of Reading, Massachusetts
Municipal Light Department
Statement of Budgeted and Actual Revenues and Expenses

	CY23 BUDGET	CY23 ACTUAL	CY23 BUDGET/ACTUAL % CHANGE	CY24 BUDGET	CY24 8 MOS ACTUAL 4 MOS BUDGET	CY24 BUDGET/ACTUAL % CHANGE	CY25 BUDGET
Operating Revenues							
Base Revenue	$ 32,116,223	$ 36,405,953	13.36%	$ 40,385,209	$ 40,642,721	0.64%	$ 45,360,454
Fuel Revenue	41,106,033	30,969,565	(24.66%)	33,549,002	33,473,043	(0.23%)	35,140,174
Purchased Power Capacity & Transmission	34,515,988	32,568,572	(5.64%)	38,263,627	33,237,939	(13.13%)	38,214,819
Forfeited Discounts	963,487	913,041	(5.24%)	1,211,556	1,037,841	(14.34%)	1,360,814
Energy Conservation Revenue	2,001,000	2,427,092	21.29%	2,733,116	2,964,015	8.45%	3,330,573
NYPA Credit	(1,162,000)	(1,219,499)	4.95%	(1,133,940)	(1,354,227)	19.43%	(1,144,145)
Total Operating Revenues	109,540,730	102,064,724	(6.82%)	115,008,570	110,001,331	(4.35%)	122,262,688
Expenses							
Power Expenses							
555 Purchased Power - Fuel	39,944,033	26,960,712	(32.50%)	33,549,002	30,504,338	(9.08%)	35,140,174
555 Purchased Power - Capacity	15,469,599	14,741,068	(4.71%)	16,100,402	17,220,203	6.96%	14,359,191
565 Purchased Power - Transmission	19,226,389	14,477,921	(24.70%)	21,181,651	13,540,145	(36.08%)	24,035,627
Total Purchased Power	74,640,021	56,179,700	(24.73%)	70,831,054	61,264,686	(13.51%)	73,534,993
Operating and Maintenance Expenses							
580 Supervision and Engineering	978,439	1,489,688	52.25%	945,126	1,784,167	88.78%	1,236,775
581 Station/Control Room Operators	508,095	604,812	19.04%	526,168	569,743	8.28%	583,629
582 Station Technicians	1,337,458	944,818	(29.36%)	1,310,897	1,033,366	(21.17%)	1,344,546
583 Line General Labor	598,755	1,009,937	68.67%	813,453	1,094,174	34.51%	753,743
585 Street Lighting	2,000	628	(68.62%)	6,355	628	(90.13%)	6,565
586 Meter General	270,245	190,996	(29.32%)	267,117	238,514	(10.71%)	342,121
588 Materials Management	588,589	571,509	(2.90%)	611,890	615,361	0.57%	668,459
593 Maintenance of Lines - Overhead	568,743	860,173	51.24%	732,300	875,372	19.54%	641,194
593 Maintenance of Lines - Tree Trimming	1,589,788	1,412,306	(11.16%)	829,901	1,677,189	102.09%	1,596,424
594 Maintenance of Lines - Underground	194,974	84,149	(56.84%)	185,192	83,753	(54.78%)	184,804
595 Maintenance of Lines - Transformers	355,040	101,668	(71.36%)	351,742	89,083	(74.67%)	351,826
598 Line General Leave Time Labor	215,963	608,808	181.90%	453,565	671,074	47.96%	431,897
Total Operating and Maintenance Expenses	7,208,088	7,879,493	9.31%	7,033,708	8,732,423	24.15%	8,141,983
General & Administrative Expenses							
903 Customer Collection	1,299,608	1,352,238	4.05%	1,466,599	1,280,653	(12.68%)	1,607,394
904 Uncollectible Accounts	75,000	52,476	(30.03%)	75,000	62,476	(16.70%)	80,000
916 Efficiency and Electrification Expense	3,064,243	2,321,189	(24.25%)	3,450,478	2,150,995	(37.66%)	3,955,708
916 Integrated Resources	1,071,429	915,027	(14.60%)	996,716	1,192,128	19.61%	915,784
920 Administrative and General Salaries	3,224,132	2,388,426	(25.92%)	3,416,126	2,248,542	(34.18%)	3,243,382
921 Office Supplies	20,000	55,906	179.53%	20,000	56,863	184.31%	20,000
923 Outside Services - Contract	740,100	557,714	(24.64%)	642,400	487,603	(24.10%)	679,000
923 Outside Services - Education	329,150	192,151	(41.62%)	338,450	234,303	(30.77%)	387,850
923 Outside Services - Legal	785,800	365,693	(53.46%)	600,800	357,027	(40.57%)	676,000
924 Property Insurance	541,550	484,865	(10.47%)	595,705	489,969	(17.75%)	676,692
925 Injuries and Damages	25,600	81,811	219.58%	25,600	3,684	(85.61%)	27,100
926 Employee Pensions and Benefits	4,568,626	4,630,558	1.36%	5,116,479	4,345,704	(15.06%)	5,463,807
930 Miscellaneous General Expense	601,400	473,959	(21.19%)	555,522	625,376	12.57%	670,158
931 Rent Expense	212,000	211,393	(0.29%)	233,200	246,256	5.60%	260,000
932 Maintenance of Building & Garage	991,558	859,464	(13.32%)	1,301,753	867,349	(33.37%)	1,190,357
933 Vehicle Expense	389,000	381,033	(2.05%)	389,000	368,547	(5.26%)	393,000
933 Vehicle Expense - Capital	(510,268)	(415,373)	(18.60%)	(510,268)	(321,383)	(37.02%)	(510,268)
935 Maintenance of General Plant - Technology	668,767	767,071	14.70%	700,000	632,954	(9.58%)	725,000
Total General & Administrative Expenses	18,097,695	15,675,601	(13.38%)	19,413,560	15,329,046	(21.04%)	20,460,965
Other Operating Expenses							
403 Depreciation	5,445,000	5,224,241	(4.05%)	5,798,925	5,339,428	(7.92%)	5,972,893
408 Voluntary Payments to Towns	1,772,440	1,826,606	3.06%	2,023,689	2,805,274	38.62%	2,889,432
Total Other Expenses	7,217,440	7,050,847	(2.31%)	7,822,614	8,144,703	4.12%	8,862,325
Operating Income	2,377,487	15,279,083	542.66%	9,907,635	16,530,473	66.85%	11,262,422
Non-operating Revenues (Expenses)							
415 Contributions in Aid of Construction	-	-	0.00%	50,000	-	0.00%	-
419 Interest Income	300,000	48,625	(83.79%)	300,000	71,271	(76.24%)	300,000
419 Other Income	710,000	479,579	(32.45%)	710,000	479,590	(32.45%)	710,000
421 Intergovernmental Grants	90,000	-	0.00%	90,000	-	0.00%	90,000
426 Return on Investment Payment to Reading	(2,548,972)	(2,533,024)	(0.63%)	(2,528,587)	(2,327,056)	(7.97%)	(2,604,445)
426 Loss on Disposal	(10,000)	(67,540)	575.40%	(10,000)	(67,688)	576.88%	(100,000)
431 Interest Expense	(10,000)	(48,625)	386.25%	(10,000)	(71,271)	612.71%	(73,410)
Total Non-operating Revenues (Expenses)	(1,468,972)	(2,120,985)	44.39%	(1,398,587)	(1,915,153)	36.93%	(1,677,854)
Net Income	$ 908,515	$ 13,158,099	1348.31%	$ 8,509,048	$ 14,615,320	71.76%	$ 9,584,568

2025 POWER SUPPLY

Bulk Power Projections
Reading Municipal Light Department
Total 2025 (Jan-Dec)

RESOURCES	MWH	RESOURCES	MWH
NYPA	27,628	Solar - Altus	1,518
Millstone Mix 1	23,125	Solar - Marina	2,788
Millstone Project 3	16,482	Solar - Kearsarge	2,303
Seabrook Mix 1	2,570	Quinebaug Hydro	7,231
Seabrook Project 4	58,354	RoxWind	25,617
Seabrook Project 5	7,198	Gravel Pit Solar III	14,116
Saddleback Wind	14,373	Cabot/Tuners	34,179
Indian River Hydro	2,692	Dahowa	35,795
Pepperell Hydro	6,884	NextEra (LFG)	8,760
Turners Falls Hydro	1,454	NextEra (Seabrook)	127,886
Woronoco Hydro	6,953	DG NH Seabrook #3	7,850
Collins Hydro	4,587	DG NH Seabrook #4	4,951
Pioneer Hydro	6,856	NextEra (Seabrook-Flat)	37,417
Wyre Wind Hydro	7,447	Gravel Pit Solar V	5,225
Jericho Wind	7,164	H.Q. Energy Services	49,257
NextEra	5,381	Moscow Wind	59,991
Shepaug	18,267	StonyBrook Inter	13,031
Stevenson	9,177	StonyBrook Peaking	344
	TOTAL	**664,850**	**MWH**

Purchased Power Capacity Expense	$	14,359,191
Purchased Power Energy Expense	$	35,140,174
Purchased Power Transmission Expense	$	24,035,627
Total	**$**	**73,534,992**

Description of RMLD's Power Supply Resources for 2025

New York Power Authority (NYPA)

RMLD receives inexpensive hydroelectric power from NYPA at its generating stations in Niagara and St. Lawrence NY. RMLD receives capacity and energy from this contract. The Massachusetts Department of Public Utilities (DPU) has appointed MMWEC as the administrator of this contract. The current contract expires in 2025. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

Seabrook Station

Seabrook Station is a 1,244-megawatt nuclear generating plant located in Seabrook, New Hampshire. An operating license for Seabrook was issued in 1986, but the plant did not begin commercial operation until 1990. The principal owner and operator of Seabrook Station is NextEra Energy Resources LLC, a subsidiary of Florida based FPL Group, Inc. NextEra owns 88.2% of Seabrook Station. The other owners are MMWEC (11.59%) and two Massachusetts municipal utilities, the Taunton Municipal Lighting Plant (0.13%) and Hudson Light & Power Department (0.08%).

On March 12, 2019, NextEra received an extension of its Seabrook operating license from the current license expiration of 2030 out to March 15, 2050. RMLD signed 3 different projects to finance Seabrook; Mix 1, Project 4, and Project 5. The debt service associated with these projects will be paid-off in 2014, 2017 and 2018, respectively.
RMLD has a Life of Unit (LOU) entitlement for 0.635% or approximately 8 MWs of the unit. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

Quick Facts – Seabrook Station

Location	Seabrook, New Hampshire
On-Line Date	1990
Fuel	Nuclear – Pressurized Water Reactor
Principal Owner/Operator	NextEra Energy Resources, LLC Total
Capacity	1,244 MWs

Millstone Unit 3

Millstone Unit 3 is a 1,237-megawatt nuclear generating plant located in Waterford, Connecticut. Millstone Unit 3, which began operation in 1986, is the newest and largest of the Millstone Station's three nuclear units, one of which is retired from service. The principal owner and operator of Millstone Station is Dominion Nuclear Connecticut, Inc., a subsidiary of Virginia-based Dominion Resources, Inc. Dominion Connecticut owns 93.4% of Millstone Unit 3.

The Nuclear Regulatory Commission (NRC) on November 28, 2005, approved Dominion Nuclear Connecticut's request for a 20-year operating license extension for Millstone's Unit 3 reactor. The license now expires in November 2045. RMLD signed two different projects to finance Millstone #3, Mix 1 and Project 3. The debt service associated with these projects has been paid off as of 2018. RMLD has a LOU agreement for 0.404% of the units which equates to approximately 4.6 MWs. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

Quick Facts – Millstone Station

Location	Waterford, Connecticut
On-Line Date	1986
Fuel	Nuclear – Pressurized Water Reactor
Principal Owner/Operator	Dominion Nuclear Connecticut, Inc.
Total Capacity	1,237 MWs

Hydro-Quebec Interconnection

The Hydro-Quebec Interconnection Phase 1 is an approximate 2,000 MW, DC electric transmission line connecting central New England with the Canadian utility Hydro Quebec. Construction of the U.S. portion of the interconnection, which stretches from Groton/Ayer, in Massachusetts to the Canadian border in northern Vermont, was a joint effort of many New England electric utilities. RMLD has an entitlement of approximately 0.47% of the capacity of the facility from this contract. Currently, RMLD sells it share of the facility's capacity.

The Hydro-Quebec Interconnection Phase 2 is a 450 kV DC electric transmission line connecting the Canadian utility, Hydro Quebec's hydro facilities at La Grande in James Bay with Sandy Pond in Massachusetts. This was a joint effort between Hydro Quebec and a number of New England electric utilities. RMLD receives approximately 0.48% of the capacity of the facility from this contract. Beginning in 2024 RMLD entered into an agreement with Hydro-Quebec to sell the transmission rights in exchange for a firm supply of 49,000 MWh per year for five years.

Eagle Creek Energy Holdings - Hydro

In March 2011 RMLD signed purchase power agreements with Swift River Hydro, LLC for the output of four hydro systems located in Massachusetts that are effective from February 1, 2011, through January 31, 2026. Swift River Trading Company is the lead market participant for and represents these hydroelectric generators with a total nameplate capacity of approximately 7 MWs and average annual generation of 25,000 megawatt-hours per year.

These facilities include the Woronoco Hydro facility in Russell, MA, Pepperell Hydro in Pepperell, MA; Indian River Power Supply in Russell, MA; and Turners Falls Hydro in Turners Falls, MA. Each of these facilities is owned by a special purpose entity, e.g., the Woronoco facility is owned by Woronoco Hydro, LLC. In 2016, Swift River Trading Company assigned the projects to Eagle Creek Energy Holdings. The four facilities are now managed by the Eagle Creek Energy Holdings as the lead market participant for each of the facilities. RMLD is the only buyer. These are non-carbon generating resources and RMLD is entitled to the associated output certificates for its share of the facilities.

- **Pepperell Hydro:** 15-year term beginning on February 1, 2011, and ending January 31, 2026. RMLD is purchasing all of the products produced by or attributable to the facility. The facility has a nameplate capacity of 1.9 MWs. The products include, but are not limited to, Energy, Installed Capacity, Ancillary Services, Renewable Energy Certificates, and Environmental Attributes (to the extent not included in the RECs).

- **Woronoco Hydro:** 15-year term beginning on February 1, 2011, and ending January 31, 2026. RMLD is purchasing all the products produced by or attributable to the facility. The facility has a nameplate capacity of 2.7 MWs. The products include, but are not limited to, Energy, Installed Capacity, Ancillary Services, Renewable Energy Certificates, and Environmental Attributes (to the extent not included in the RECs).

- **Turners Falls Hydro:** 15-year term beginning on February 1, 2011, and ending January 31, 2026. RMLD is purchasing all the products produced by or attributable to the facility. The facility has a nameplate capacity of 1 MW. The products include, but are not limited to, Energy, Installed Capacity, Ancillary Services, Renewable Energy Certificates and Environmental Attributes (to the extent not included in the RECs).

- **Indian River Hydro:** 15-year term beginning on February 1, 2011, and ending January 31, 2026. RMLD is purchasing all the products produced by or attributable to the facility. The facility has a nameplate capacity of 1.4 MWs. The products include, but are not limited to, Energy, Installed Capacity, Ancillary Services, Renewable Energy Certificates and Environmental Attributes (to the extent not included in the RECs).

Collins Hydro

In August 2013, RMLD signed a purchase power agreement with Swift River Hydro LLC. for the output of Collins Hydro located in between Ludlow and Wilbraham Massachusetts. The contract with Swift River Hydro is effective from September 1, 2013, through August 31, 2028. RMLD receives energy only from this contract. The average annual generation is approximately 5,667 MWHs per year. This is a non- carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility.

Pioneer Hydro

In August 2013, RMLD signed a purchase power agreement with Ware River Power Inc. for the output of Pioneer Hydro located in Ware, Massachusetts. The contract for Pioneer Hydro is effective from September 1, 2013, through August 31, 2028. RMLD receives energy only from this contract. The average annual generation is approximately 4,480 MWHs per year. This is a non-carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility.

Saddleback Ridge Wind

In December 2013, RMLD signed a purchase power agreement with Saddleback Ridge Wind, LLC for the output of Saddleback Ridge Wind located in Carthage, Maine. The contract for Saddleback Ridge Wind is effective from January 1, 2015, through December 31, 2035. RMLD receives energy plus all attributes under this contract. The average annual generation is estimated to be 15,820 MWHs per year. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

Jericho Wind

In November 2014, RMLD signed a purchase power agreement with Jericho Power, LLC for the output of Jericho Wind located in Berlin, New Hampshire. The contract for Jericho Wind is for 20 years. The project went into commercial operation in December 2015. RMLD receives energy plus all attributes from this contract. The average annual generation is estimated to be 10,788 MWHs per year. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

RoxWind - Wind

RMLD has contracted for 50% of the output from four wind turbines in Maine. RMLD's receives 25,600 MWHs per year, starting at the end of 2021, continuing for 20 years, through 2041. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

One Burlington - Solar

In March 2015, RMLD signed a purchase power agreement with CREECA Energy, LLC for the output of 2 MW AC solar array located at One Burlington Ave., Wilmington, Massachusetts. The solar array went on-line in November 2015. The term of the contract for One Burlington is effective for ten years. The average annual generation is estimated to be 3,450 MWHs per year. This is a non-carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility, once the forty quarters of Solar (SRECs) has run its course.

Altus Power – Community Solar

In March 2016, RMLD signed a purchase power agreement with ECA Solar, LLC for the output of a 1MW AC solar array located at 326 Ballardvale Street, Wilmington, Massachusetts. The solar array went on-line in June 2017. In May 2017, the contract was assigned to Altus Power America, Inc. DBA WL MA Solar LLC. The term of the contract for WL MA Solar LLC is twenty years. The average annual generation is estimated to be 1,700 MWHs per year. RMLD has developed a Community Shared Solar program called Solar Choice. This project is RMLD's first Solar Choice project and is fully subscribed by 500 residential customers. This is a non-carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility, once the 40 quarters of Solar (SRECs) has run its course.

Kearsarge – Community Solar

In October 2017, RMLD signed a purchase power agreement with Kearsage Wilmington, LLC for the output of 1.8MW AC solar array located at 40-50 Fordham Road, Wilmington, Massachusetts. The solar array went on-line in February 2018. The term of the contract for Kearsage Wilmington LLC is twenty years. The average annual generation is estimated to be 2,376 MWHs per year. This project is RMLD's second Solar Choice project and is fully subscribed by 617 residential and commercial customers. This is a non-carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility, once the 40 quarters of Solar (SRECs) has run its course.

Battery Energy Storage System – NextEra

In December 2017, RMLD was awarded a $1 million grant for the installation of an energy storage unit at its North Reading substation. The grant is funded by the Massachusetts Department of Energy Resources (DOER). RMLD's project consists of a 5 MW Lithium-Ion Battery unit with 10 MWHs of storage capacity at its North Reading substation to reduce peak demand, thereby lowering future transmission and capacity costs related to the purchase of wholesale electricity. The battery unit will be co-located with RMLD's new 2.5-megawatt Distributed Generator. RMLD is negotiating a Battery Energy Storage System (BESS) Agreement with NextEra. BESS was placed in service on June 1, 2019.

FirstLight Hydro

RLMD has multiple contracts with FirstLight Hydro. All contracted FirstLight hydro plants are non-carbon generating resources and RMLD is entitled to the associated output certificates for its share of the output.

- **Shepaug & Stevenson**: In March 2019, RMLD signed a purchase power agreement with FirstLight Power Resources Management, LLC. for 10.3% and 7.3% of the output of the Shepaug and the Stevenson Hydroelectric Station, respectively, from May 2019 through December 2023. The average annual generation is approximately 12,000 MWHs per year on-peak and 8,000 MWHs per year off-peak. In June 2022, RMLD executed an extension of the Shepaug and Stevenson hydroelectric contract, starting in January 2024 through to 2030. RMLD will receive 13.49% of Shepaug and 9.53% of the Stevenson output. The average combined production is approximately 27,500 MWH per year.
- **Cabot-Turners Falls**: RMLD executed a contract with FirstLight in 2020 for two hydroelectric generating stations along a 2.7 mile stretch of the Connecticut River, Cabot and Turners Falls Generating Stations. Together, they are anticipated to deliver 22,250 MWHs in 2022, 42,000 MWHs in 2023, and 34,000 MWHs from 2024 through 2030.
- **Falls Village**: RLMD is in active negotiations to receive 100% of the output from Falls Village, a hydroelectric plant in on the Housatonic River that generates 38,000 MWH annually. The contract will begin in 2025, running through 2040.

Gravity Renewables - Hydro

- **Quinebaug:** In February 2020, RMLD signed an agreement with Gravity to receive approximately 10,700 MWH per year from 2021 to 2030. The Quinebaug hydroelectric plant is located in northeastern Connecticut, near the confluence of Five Mile and Quinebaug Rivers. The facility is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the output.
- **WyreWynd Hydro:** RMLD has been receiving power from the WyreWynd (Aspinhook) hydro facility since 2016. The contract expired in June 2022, and RMLD

and Gravity extended the contract in the spring of 2022; RMLD will continue to receive approximately 10,000 MWHs per year in 2022, 2023, 2024, and likely 2025. This is a non-carbon generating resource and RMLD is exploring acquisition of the associated output certificates for the facility

- **Dahowa:** In July 2021, RMLD entered into an agreement with Gravity to purchase approximately 35,000 MWH per year, from 2022 to 2045, from the Dahowa Plant in Upstate New York. The facility is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the output.

NextEra Transaction Facilitation Agreement (TFA)

In December 2017 RMLD signed a Master Supply Agreement, as well as a Transaction Facilitation Agreement with NextEra that enables RMLD to leverage NextEra's trade floor. RMLD approved a Risk Management Strategy that secures transactions based on price and time triggers. The Risk Management Strategy will permit RMLD to take advantage of price opportunities consistently over the next several years and beyond. This strategy will allow RMLD to secure monthly quantities that are below the four-year average versus locking in annual quantities. Additionally, the strategy of utilizing time triggers will smooth out variations in the market over time. The TFA has prompted RMLD to purchase on-peak and off-peak energy blocks out to the year 2025. Under the TFA, RMLD has currently secured 284,947 MWHs for 2022, 174,373 MWHs for 2023, 82,300 MWHs for 2024 and 5,363 MWHs for 2025.

NextEra LFG & Seabrook

In June 2020, NextEra entered into an agreement with RMLD to provide firm around- the-clock power from 2022 through 2030. RMLD will receive 100% of the output of a landfill gas power generating station in Woburn, MA, while the remainder of the energy will come from Seabrook Nuclear Generating Station. Together, these facilities will provide approximately 43,800 MWH per year of firm, around-the-clock power. These two facilities are non-carbon generating resources and RMLD is entitled to the associated output certificates.

NextEra Swap & Swap Shape Option

In July 2021, NextEra entered into an agreement with RMLD to provide approximately 93,000 MWH per year of power from the Seabrook Nuclear Generating Station, starting April 2023. This is a non-carbon generating resource and RMLD is entitled to the associated output certificates for its share of the facility.

Stony Brook Intermediate Unit

The Stony Brook Intermediate Unit is a 354-megawatt, combined-cycle power plant that entered commercial operation in 1981.

The unit's three gas turbines generate electricity using either No. 2 oil or natural gas, with additional electricity produced using a single steam turbine in the combined-cycle process. MMWEC completed construction of a natural gas pipeline to serve the Intermediate Unit in September 2002. RMLD has a Life of Unit (LOU) entitlement for 14.453% of the unit or approximately 51 MWs. RMLD has paid off the debt service associated with this project.

Quick Facts – Stonybrook Intermediate Unit

Location	Ludlow, Massachusetts
On-Line Date	1981
Fuel	No. 2 oil/natural gas
Principal Owner/Operator	MMWEC
Total Capacity	354 MWs

Stony Brook Peaking Unit

The Stony Brook Peaking Unit is a 172-megawatt peaking plant that entered commercial operation in 1982. The unit's two turbines generate electricity using No. 2 oil. RMLD has a Life of Unit (LOU) entitlement for 19.516% of the unit which is equivalent to approximately 33 MWs. RMLD has paid off the debt service associated with this project.

Quick Facts – Stonybrook Peaking Unit Location

	Ludlow, Massachusetts
On-Line Date	1982
Fuel	No. 2 oil
Principal Owner/Operator	MMWEC
Total Capacity	172 MWs

Braintree Electric Light Department - Watson Unit

The simple-cycle gas fired plant is powered by the first two Rolls-Royce Trent 60 gas turbines built for the U.S. power generation market – known as Watson Units #1 and #2. The units entered commercial operation on June 23, 2009.

Both Watson Units are bid into the ISO New England market system daily and are dispatched based on their bid price.

The units two turbines generate electricity using natural gas, with No. 2 oil as backup fuel. RMLD has a 20-year entitlement for 10% of the unit which is equivalent to about 10 MWs.

Quick Facts – Watson Unit

Location	Braintree, Massachusetts
On-Line Date	2009
Fuel	Natural gas/No. 2 oil
Principal Owner/Operator	BELD
Total Capacity	100 MWs