CHAPTER 1

EXECUTIVE SUMMARY

MCAN
Mass Climate
Action Network

Assessing Progress of Municipal Light Plants in Mitigating Climate Change

Municipal light plants (MLPs) are a critical part of the Commonwealth's efforts to mitigate the worst effects of the climate crisis and transition to a just energy future. The Commonwealth is home to 41 MLPs which serve 50 municipalities and account for approximately 14% of the state's total distributed energy. MLPs' investment in energy efficiency and clean energy directly affects the rate at which the Commonwealth meets statewide climate goals and reductions in greenhouse gas emissions.

While MLPs play a critical role in the state's energy sector, they differ from other types of utilities across the state both in how they operate and how they are regulated. As such, historically, the understanding of MLPs' roles in and progress towards transitioning to clean energy and combating the climate crisis has been limited. Little had been done to assess their progress in mitigating climate change until 2019, when Massachusetts Climate Action Network (MCAN) published its first Scorecard titled "What's the Score: A Comparative Analysis of Massachusetts Municipal Light Plants' Clean Energy and Climate Action Performance." MCAN's Scorecard was a rapid assessment of MLPs' performance in four categories: clean energy, energy efficiency, transparency/leadership, and dirty energy. Each MLP's progress in these categories was scored out of 100. The Scorecard provided advocates in MLP districts with general knowledge of plant operations and programs. Armed with this information, advocates organized themselves and worked with MLP staff to improve MLPs' performance.

Now, more than two years after publishing our first Scorecard, MCAN is releasing the second iteration. This Scorecard takes lessons learned during and after the publication of the initial report, along with recommendations from advocates and experts, to build upon the work done in 2019. To provide a tool that is effective for advocates and useful to MLP staff, this iteration of the Scorecard has improved data collection

processes and enhanced scoring methods to present a more comprehensive analysis. The outcome is a thorough and detailed report assessing MLPs' progress in addressing the climate crisis and transitioning to clean, renewable energy.

MCAN's Data Collection and Scoring Methods for this Report

Data for this Scorecard primarily came from MLP reports and documents submitted to the state government, MLPs' responses to MCAN questionnaires, and MLPs' websites. MLPs were given several opportunities to provide information and to revise the data used in this report. Thirty-two of 40 MLPs provided some form of information or feedback for the purposes of this Scorecard.

MCAN evaluated MLPs across four categories:
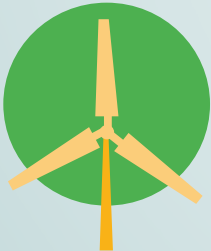
Energy Transition
50 Points

Energy Efficiency
25 Points

Transparency and Community Engagement
15 points

Policy Context
10 points

MLPs could earn up to 100 points across all categories. Bonus points worth 21 points (with the potential for additional points) were also allocated across these categories.

This report covers 40 of the 41 MLPs across the Commonwealth. Gosnold Electric Light Company was not considered due to its small number of customers and limited energy distribution relative even to other small MLPs.

Results and Conclusions

MCAN's analysis revealed several observations that can help advocates and other stakeholders to advance climate mitigation and clean energy adoption in MLP districts. The conclusions below reflect our primary findings:

① **Several MLPs demonstrate leadership and ambition in energy transition and energy efficiency.** While much remains to be done to transition MLPs, several are leading the way by taking bold steps to mitigate climate change and transition to clean energy (relative to other MLPs as well as investor-owned utilities [IOUs]). Their efforts are proof that MLPs' unique structure as community-based, non-profit utilities can serve as an important asset in mitigating climate change when clean energy and energy efficiency are prioritized.

② **Many MLPs have yet to recognize the importance of Class I Renewable Energy Credit (REC) retirement and are not meeting the Renewable Portfolio Standard (RPS).** Our analysis found that two MLPs (Concord and Belmont) have met, and exceeded, clean energy targets set forth in the RPS by retiring Class I RECs. Seven additional MLPs retired Class I RECs to some extent but have yet to meet the RPS. Thirty-one of the 40 MLPs had *no* clean energy in their energy mix because they were not retiring Class I RECs. Many of these MLPs used energy derived from clean energy sources; however, they could not take credit for doing so in their energy mix because they did not retire the Class I RECs associated with that energy.

③ **Many MLPs provide a wide variety of programs that support customers in adopting clean energy technology. However, these programs must be enhanced.** From 100% renewable opt-in programs to the MLP Solar Rebate Program and net metering policies, MLPs provide a wide variety of programs and policies to support their customers in transitioning to clean energy. However, our results indicate that more

is needed to ensure that these policies are strong enough to effectively incentivize this shift. For example, many MLP net metering policies fall short of enabling customers to benefit from installing renewable energy by limiting the size of eligible systems and offering an inadequate price for the excess energy generated. To better encourage clean energy adoption and provide programs that are comparable to policies available in non-MLP communities, these programs and policies must be strengthened.

④ On average, the percentage of total revenue that MLPs spend on energy efficiency is approximately one-twelfth of the revenue percentage that IOUs allocate towards Mass Save. Although many MLPs provide comparable programs to IOUs, the incentives and energy savings (when tracked) are lower, and the additional incentives available to income-eligible residents are more limited. While these discrepancies are partly due to MLPs not prioritizing energy efficiency programs, the primary cause of this disparity is that the state provides more funding to IOUs and the Mass Save program than it does to MLP energy efficiency programs. The level of state oversight is also considerably lower for MLPs than it is for IOUs and Mass Save. Advocates, MLP staff, light boards, MLP associations, state officials, and legislators need to address these gaps. If they do not, the Commonwealth faces the immediate risk of some MLP communities falling well behind the rest of the state in receiving the benefits of energy efficiency.

⑤ More attention is needed to increase access to MLPs' energy efficiency programs. Our analysis found that opportunities exist across MLPs to increase access to energy efficiency programs. MLPs' implementation of practices and policies that enhance access to energy efficiency has been neither mandated nor closely tracked. Our findings suggest that, even considering voluntary efforts, MLPs can implement additional policies and practices that improve residents' access to energy efficiency programs.

⑥ The state can do more to support MLPs in the areas of energy transition and energy efficiency. While MLPs have much work to do individually to mitigate climate change and transition to clean energy, there are multiple avenues that the state could and should take to support them in this process. State-provided financial and technical assistance is paramount and should focus on clean energy adoption and energy efficiency. Regulations and incentives should further support MLPs in pursuing these initiatives.

(7) **Justice and equity in the energy sector need to be at the center of MLP policy, programs, and operations.** Utility policies and operations carry major implications for issues of justice and equity. Integral aspects of utility operations, such as setting energy rates, investing in energy infrastructure, and developing programs for ratepayers, have the potential to exacerbate or alleviate existing injustices within our communities, state, and country. In the energy sector, these implications span a range of issues including but not limited to environmental justice, environmental racism, energy justice, and equity. As public utilities focused on delivering services to their communities, issues of justice in the energy sector are critical for MLPs. At present, however, these issues are rarely emphasized in MLP policy and advocacy. This relative lack of attention to justice-related issues has led to bad investments in dirty energy and infrastructure that exacerbate injustices and disproportionately harm low-income communities, communities of color, non-English speaking households, and renters. MLP staff, light boards, industry associations, and advocates have a responsibility to center justice and equity in all MLP policy, programs, and operations. In particular, MLP policy designed to mitigate climate change and transition to clean energy must center justice. Failing to do so will only exacerbate existing disparities in clean air and health outcomes, while perpetuating the concentration of environmental burdens in frontline communities.

Recommendations for Future Action

Based on the results of each section in the Scorecard, MCAN recommends steps to strengthen climate change mitigation efforts across MLP districts. These recommendations are intended to support advocates in identifying actions that their MLPs can prioritize to bring about a clean energy, net zero emissions future in their communities. The public utility model is based on the power of residents, as ratepayers, to guide and influence MLP light boards and plants. Public power is ideally about people power.

Most recommendations focus on changes that MLP staff, light board members, and associations can adopt within specific MLP districts. Other recommendations suggest changes to state policies and regulations which would better enable MLPs to achieve climate targets and become leaders in the energy transition. The advancement of climate mitigation in individual MLP districts and at the state level is equally important to ensuring that MLPs effectively transition to clean energy and increase energy efficiency.
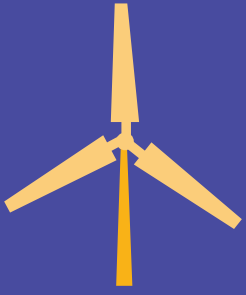
Recommendations to Enhance MLPs' Energy Transition

(1) **Incorporate Class I REC retirement into long- and short-term MLP strategies**

a) Adopt plans to strategically accelerate Class I REC retirement
b) Meet or exceed the RPS over time
c) Adopt 100% renewable energy opt-in programs for residents
d) Expand state involvement in REC retirement through incentives or mandates

(2) **Strengthen and enhance policies that enable residents to transition to clean energy**

a) Strengthen net metering policies
b) Leverage MLP innovation to enhance battery storage, advanced metering infrastructure (AMI), electric vehicle adoption and infrastructure, and other clean energy technology
c) Strengthen and expand services that assist low- and moderate-income households in transitioning to clean energy
d) Increase state investment in MLP clean energy innovation

(3) **Implement plans to transition away from nuclear energy and gas services**

a) Implement policies and plans specifying no new nuclear energy and establishing a clear timeline for replacing current nuclear sources with safe and clean alternatives
b) Phase out gas services and accelerate electrification

(4) **Stop investing in new fossil fuel infrastructure and dirty energy projects**

a) Commit to making no new investments in coal, oil, and natural gas projects or infrastructure
b) Commit to making no investments in dirty biomass energy
c) Commit to making no investments in projects that exacerbate environmental injustice

Recommendations to Enhance MLPs' Energy Efficiency

1 Increase the size of energy efficiency programs and rebates

a) Increase the size of weatherization and heat pump rebates for residents
b) Work with the state to create and adopt a 0% interest loan program for energy efficiency retrofits
c) Implement and expand commercial energy efficiency programs and offerings
d) Increase the percentage of overall revenue allocated to energy efficiency programs

2 Increase equity and access to energy efficiency programs

a) Provide increased energy efficiency rebates for low- and moderate-income home-owners and renters
b) Conduct specific outreach to low-income residents and renters who stand to benefit the most from energy efficiency programs
c) Identify households in MLP districts based on income, race, and language isolation; develop outreach strategies to reduce barriers and raise awareness of program offerings

3 Track savings and progress of energy efficiency programs

a) Track and report kWh savings from energy efficiency programs in annual Municipal Action Plans (MAPs)
b) Track and make public energy savings in a way that enables MLPs to be accountable for equity
c) Set ambitious energy savings goals based on kWh savings and other metrics
d) Track energy efficiency using additional metrics that account for electrification

4 Increase state support for MLP energy efficiency

a) Mitigate disparities in energy efficiency programs between MLPs and IOUs
b) Provide more funding for MLP energy efficiency programs
c) Allocate funding specifically for MLPs to enhance their energy efficiency incentives
d) Allocate funding for innovative programs and pilot projects in MLP districts

Recommendations to Enhance Transparency and Community Engagement

① Ensure that MLPs' websites contain updated information for residents to engage in decision making

a) Consistently post and update light board meeting times, meeting minutes, and contact information
b) Make it standard practice to post policies, reports, and other operations-related information on websites
c) Work towards increasing transparency and educating residents about MLPs' decision-making processes and internal operations

② Increase opportunities for community involvement in decision making

a) Conduct surveys and community forums regularly on issues related to MLP policy and long-term strategies
b) Solicit feedback and support from community members on proposed energy projects and long-term policies
c) Develop clear protocols and procedures to substantively incorporate community input into MLPs' policies and strategies

③ Be transparent about clean energy and REC retirement

a) Post updated power supply charts on websites
b) Be transparent about REC retirement strategies and explain the implications of REC retirement for the energy mix
c) Post charts that clearly identify the percentages of energy sources based on the number of RECs retired

Recommendations to Enhance MLP Policy Context

① Work with towns to establish climate action plans

a) Work with town government and community members to implement climate action plans
b) Conduct an inventory of MLP emissions and develop a long-term plan for reducing emissions to net zero by or before 2050

② Participate in statewide programs focused on increasing efficiency and transitioning to clean energy

a) Work with towns to attain Green Community Designation
b) Participate in the Renewable Energy Trust Fund (RETF)
c) Opt into the Property Assessed Clean Energy (PACE) program

③ Reduce barriers for MLPs to participate in statewide programs

a) Ensure there are no additional barriers to MLP towns attaining Green Community status
b) Reduce the barriers and requirements for MLP participation in the Renewable Energy Trust Fund (RETF)
c) Develop new state-sponsored programs to support MLPs in addressing climate change and increasing energy efficiency

MUNICIPAL LIGHT PLANT SCORES

	MUNICIPALITIES BY RANK	ENERGY TRANSITION 50 PTS	ENERGY EFFICIENCY 25 PTS	TRANSPARENCY + ENGAGEMENT 15 PTS	POLICY CONTEXT 10 PTS	TOTAL SCORE 100 PTS
1	CONCORD	43	24	21	10	98
2	BELMONT	41	26	21	9	97
3	HOLYOKE	31	24	17	7	79
4	MIDDLEBOROUGH	33	21	17	4	75
5	BRAINTREE	37	16	12	4	69
6	IPSWICH	16	17	21	11	65
6	TAUNTON	29	15	17	4	65
8	WEST BOYLSTON	22	14	21	3	60
9	READING	15	21	13	5	54
9	WELLESLEY	31	9	9	5	54
11	SHREWSBURY	21	16	13	3	53
12	CHICOPEE	17	18	12	5	52
12	WAKEFIELD	19	18	13	2	52
14	NORWOOD	19	14	12	6	51
15	SOUTH HADLEY	19	13	15	1	48
16	WESTFIELD*	15	18	11	3	47
17	STERLING	21	13	8	2	44
18	GROVELAND	25	10	6	0	41
19	HUDSON*	22	13	2	3	40
19	TEMPLETON	21	10	4	5	40
21	ASHBURNHAM	17	11	6	5	39

MUNICIPAL LIGHT PLANT SCORES

* indicates MLPs that did not submit questionnaires or provide feedback to MCAN for the purpose of this report

MUNICIPALITIES BY RANK		ENERGY TRANSITION 50 PTS	ENERGY EFFICIENCY 25 PTS	TRANSPARENCY + ENGAGEMENT 15 PTS	POLICY CONTEXT 10 PTS	TOTAL SCORE 100 PTS
21	HINGHAM*	17	13	4	5	39
23	HOLDEN	20	12	4	2	38
24	GROTON	16	11	4	5	36
24	PEABODY	13	14	8	1	36
26	MARBLEHEAD	16	12	5	2	35
26	PRINCETON	10	13	10	2	35
28	N. ATTLEBOROUGH	11	11	8	3	33
29	PAXTON	14	12	5	1	32
30	HULL	16	9	4	2	31
30	MANSFIELD	16	7	8	0	31
32	LITTLETON*	12	9	4	4	29
33	GEORGETOWN*	12	10	2	4	28
33	ROWLEY	9	10	9	0	28
35	MIDDLETON*	13	8	6	0	27
36	BOYLSTON	12	12	2	0	26
36	DANVERS*	13	9	4	0	26
38	MERRIMAC*	11	9	2	3	25
39	CHESTER	12	4	5	3	24
40	RUSSELL	9	10	2	2	23
N/A	GOSNOLD	N/A	N/A	N/A	N/A	N/A

* indicates MLPs that did not submit questionnaires or provide feedback to MCAN for the purpose of this report

Scoring Disclaimer

In light of substantial revisions to our scoring methodology, **the results presented in this Scorecard cannot be compared to MLP scores released in MCAN's prior report.** The current findings instead offer a snapshot of progress based on the categories and scoring adopted in this iteration. We will limit methodological changes in future reports to allow for direct comparisons.

To provide additional insight and to increase transparency in MLP scores, MCAN's methods, and our data collection strategy, we present scores for each of the four performance categories assessed in this Scorecard and discuss the methods used to score and evaluate each metric within those categories. Our data collection process is detailed in **Appendix B**.

All metrics, and the points allocated to them, were developed by consulting with experts and engaging with advocates. However, some of our decisions about methods were ultimately based on MCAN's mission and values of what constitutes a just energy transition and which metrics best reflect progress towards that transition. Acknowledging that some MLPs may hold different values and have an alternative vision of how best to mitigate climate change and accelerate clean energy adoption, MCAN has been deliberate and transparent in our discussions of each section in this Scorecard. We hope this intentionality will enable MLP staff and stakeholders to identify differences and, in certain instances, explain these differences to their boards, residents, and customers. There is a diversity of perspectives and opinions across MLPs about what to prioritize. Acknowledging this and the infeasibility of incorporating all possible views into this Scorecard, we have tried to be clear and transparent about what we included and excluded in the report so it may serve as a useful tool for advocates, MLP staff, MLP associations, and state officials.

Future Reports

MCAN will continue to evaluate MLPs' progress in mitigating climate change and adopting clean energy through regular iterations of our

Scorecard. We are confident that the methodological updates made for this report will limit the need for future changes. Even so, we look forward to engaging with MLP advocates, staff, associations, and utility experts to continue refining our methodology to ensure we are producing reports that benefit relevant stakeholders.

Although we anticipate limited changes to the established categories in future Scorecard iterations, MCAN will investigate including metrics that incorporate or further account for (1) the adoption and use of advanced metering infrastructure (AMI), (2) the adoption of integrated resource planning (IRP), (3) commercial energy efficiency programs and incentives, (4) electric vehicle adoption and electric vehicle infrastructure, and (5) the level of MLPs' financial investment and ownership of clean energy generation facilities and infrastructure. MCAN will also introduce a category focusing on energy justice, environmental justice, and equity. MCAN intends to consult with environmental justice advocates and scholars, data scientists, and MLP staff to identify important metrics to include in this category. The environmental justice category will stand on its own and will not alter the data tracked in existing categories or how those categories are scored.