



Maura T. Healey  
Governor

Kimberley Driscoll  
Lieutenant Governor

Commonwealth of Massachusetts  
Executive Office of Energy & Environmental Affairs

---

## Department of Environmental Protection

100 Cambridge Street Suite 900 Boston, MA 02114 • 617-292-5500

Rebecca L. Tepper  
Secretary

Bonnie Heiple  
Commissioner

August 15, 2023  
Martine Wong  
U.S. EPA Region 1  
5 Post Office Square, Suite 100  
Boston, MA 02109-3912

RE: Massachusetts Certified Operator Program Annual Report for 2022

Dear Ms. Wong:

Attached is MassDEP's Annual Report for the Massachusetts Certified Operator Program for the Calendar Year from January 1, 2022 through December 31, 2022. If you have any questions on this report, please contact Michael Celona by email at [michael.celona@mass.gov](mailto:michael.celona@mass.gov).

Sincerely,

Yvette DePeiza  
Program Director  
MassDEP Drinking Water Program

Enclosure

cc: DEP: Kathleen Baskin  
USEPA: Jane Downing, Denise Springborg, Kevin Reilly, Andrea Travaglia

File: Y/DWPArchive/Boston/EPA Certified Operator Program Annual Report for 2022 -2023-8-15



# Massachusetts Certified Operator Program 2022 Annual Report

## Table of Contents

1. Authorization .....	3
2. Classification of Systems, Facilities, and Operators .....	3
3. Operator Qualifications .....	7
4. Enforcement.....	11
5. Certification Renewal.....	12
6. Resources Needed to Implement Program .....	15
7. Stakeholder Involvement.....	16
8. Program Review.....	17
9. Implementation Schedule Update.....	17

## Massachusetts Certified Operator Program 2022 Annual Report

The following certified operator annual report covers the reporting period for the calendar year from January 1, 2022, through December 31, 2022.

The EPA approved Massachusetts Operator Certification Program meets the public health objectives (as per EPA guidelines) and is designed to ensure that:

1. Customers of public water systems are provided with an adequate supply of safe, potable drinking water.
2. Public water system operators are trained and meet certification standards and have knowledge of public health protection requirements and the reasons for drinking water standards.

### 1. Authorization

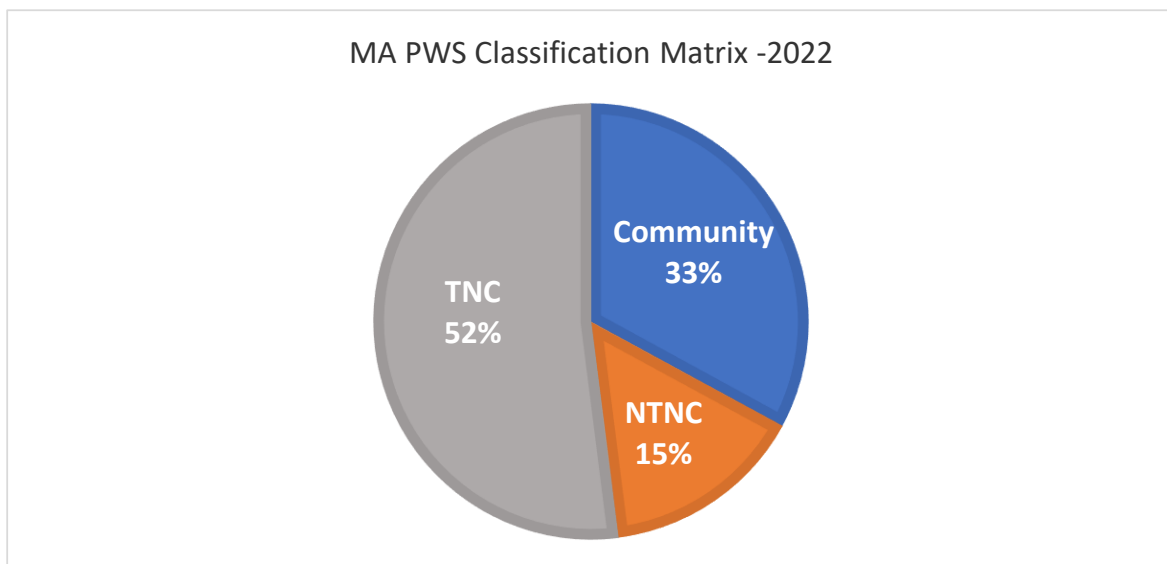
Massachusetts is authorized to operate a certified operator program. No statutory or regulatory changes were made during the period covered by this report.

### 2. Classification of Systems, Facilities, and Operators

Massachusetts’s regulations require that all PWSs be operated by a Massachusetts certified operator. As of the end of this reporting period, there were 1,596 PWSs in Massachusetts of which 526 are community systems (COM), 240 are non-transient non-community systems (NTNC), and 830 are transient non-community systems (TNC). See Table A:

Table A- Massachusetts Water System Classification Matrix

Year	Community	NTNC	TNC	Total # of PWS
2022	526	240	830	1,596



The PWS listed in Table A are further classified in Table B by the type of Distribution and Treatment license necessary to operate the system.

Table B - Type of Distribution and Treatment Licenses Necessary to Operate MA PWS			
Type	Distribution Class	Treatment Class	Number of PWS
COM	I-D		7
COM	I-D	II-T	3
COM	I-D	I-T	22
COM	II-D		21
COM	II-D	III-T	13
COM	II-D	II-T	45
COM	II-D	I-T	73
COM	II-D	IV-T	3
COM	III-D		20
COM	III-D	III-T	25
COM	III-D	II-T	31
COM	III-D	I-T	16
COM	III-D	IV-T	14
COM	IV-D		11
COM	IV-D	III-T	2
COM	IV-D	II-T	2
COM	IV-D	IV-T	16
COM	VSS		80
COM	VSS	III-T	1
COM	VSS	II-T	6
COM	VSS	I-T	115
NC	VSS		508
NC	VSS	II-T	2
NC	VSS	I-T	281
NC	VSS	VND-I-T	39
NTNC	VSS		101
NTNC	VSS	II-T	3
NTNC	VSS	I-T	136

The Massachusetts Regulations that pertain to certified operators are 310 CMR 22.11B: Public Water Systems Certified Operator Staffing Requirements, which can be found at <https://www.mass.gov/doc/310-cmr-2200-the-massachusetts-drinking-water-regulations/download> The regulations and policies in 310 CMR 22.11B (1) Operation & (2) Staffing Requirements ensure that certified operators are making process control decisions and that a designated certified operator is available for each operating shift.

During this reporting period, no changes were made regarding classification of public water systems (PWSs).

PWSs are classified by MassDEP as:

- VND (Water Vending Machines),
- VSS (Very Small Systems),
- Distribution (1D, 2D, 3D, and 4D), or
- Treatment (1T, 2T, 3T and 4T).

The increasing numerical class for distribution and treatment indicates an increasing complexity of operation, and a higher level of training, knowledge, and experience required for operation.

PWSs with treatment processes are categorized using a point rating system that reflects the complexity of the operation for units that are present in the facility.

Distribution systems are categorized according to the population served as follows, except for non-community public water systems:

- systems serving 500 people or less are classified as a VSS system;
- systems serving 501-1,500 people are classified as a 1D system;
- systems serving 1,501 to 15,000 people are classified as a 2D system;
- systems serving 15,001 to 50,000 people are classified as a 3D system; and
- systems serving over 50,000 people are classified as a 4D system.

All non-community water systems are classified as VSS (Very Small Systems) regardless of the population served. VSS systems may also have a treatment process rating in addition to their VSS classification. A disinfection process is considered an integral part of the distribution system and is not rated as a treatment facility. Free standing vending machines consisting of filters and/or ultra-violet disinfection systems with no chemical addition are classified as follows: 500 gallons per day or less (VND-ID); 501 gallons per day and more (VND-IID).

All PWSs must have a full status certified operator whose grade at least matches that of the system classification. MassDEP reviews the status of PWSs throughout the year to ensure that they have the required operators. During this reporting period (as of 12/31/22), there were 26 PWSs in Massachusetts that did not have an appropriately licensed certified operator as identified in the sanitary survey scheduled actions and those that had been issued and certified operator compliance notices. This included six (6) COM, seven (7) NTNC, and thirteen (13) TNC systems. Regional staff are continually working to verify the status of the operators for these systems. MassDEP takes compliance (including technical assistance) and enforcement actions to require these systems to obtain the appropriate grade of operator. Table 1 compares the number of PWS without appropriately licensed operators and/or PWS lacking and operator for 2016-2022.

Year	Table 1 PWS lacking appropriately licensed operator or without an operator			
	COM	NTNC	NC	Total
2022	6	7	13	26
2021	22	10	12	44
2020	7	5	16	28
2019	2	1	1	4
2018	6	1	23	30
2017	13	2	18	33
2016	3	2	40	45

The Primary and/or Secondary Treatment Operator and/or the Primary and/or Secondary Distribution Operators are in direct supervision (responsible charge) of the water system. Drinking water licenses are issued and tracked by the Massachusetts Division of Occupational Licensure (DOL) (formerly the Division of Professional Licensure). All licensing information is periodically exchanged between DOL and MassDEP via electronic file transfers.

#### Technical Assistance

Massachusetts continued to use MassDEP capacity development staff and small system third party technical assistance providers to assist systems come into compliance.

#### Temporary Emergency Certification/ Provision Certification

Massachusetts has temporary/provisional options for certification on an emergency basis. If there is an emergency situation facing a system such as an unforeseen operator departure or a newly registered system that does not yet have an operator, the PWS may allow for temporary/provisional certification.

- Systems may apply to the Board for a Temporary Emergency Certificate (TEC) stating the reason for the emergency, the name of the person who is going to temporarily run the system, and the system's plan to relieve the emergency situation.
- The Board reviews the application and either approves or denies it.
- If approved, the TEC automatically expires in 6 months. In that 6-month period, the system is expected to find a permanent operator for the system.
- When a TEC is going to expire and the system has not been able to hire a properly certified operator, the system may apply for a Provisional Certificate (PRO). The PRO is good for a 6-month period and may not be renewed.

**During this reporting period, Massachusetts approved 12 TECs and 0 PROs.**

Year	Table 2 Number of Temporary Emergency Certificates and Provisional Certificates Issued by the Board of Certification of Operators of Drinking Water Supply Facilities				
	VSS TEC	Distribution TEC	Treatment TEC	Provisional Certificates (PRO)	Total
2022	2	5	5	0	12
2021	0	8	5	1	14
2020	1	5	8	0	14
2019	0	2	1	0	3
2018	2	2	6	0	10
2017	3	8	3	0	14
2016	3	1	4	0	8
2015	0	1	0	0	1
2014	5	1	1	0	7
Totals	14	20	23	0	57

After the system is temporarily in compliance, MassDEP and/or water organization staff will work with the system, instructing them how to obtain a permanent certified operator. MassDEP staff has compiled a certified operator directory that lists all operators in the state that are willing to work on a contract basis. This directory is available at <https://www.mass.gov/info-details/certified-operator-directory>. If the system wants to hire an operator, they consult the listing and choose a compatible operator for their system. If a system delegate/employee wants to become an operator, the MassDEP and/or water organization staff will work with the system in getting the person training and applying for the state exam for operator certification.

### 3. Operator Qualifications

**During this reporting period, there have been no changes to the qualifications for certified operators.** Massachusetts does not have a grandparenting clause.

A summary and description of the drinking water certification process is available at <https://www.mass.gov/how-to/apply-for-a-drinking-water-operator-in-training-certificate> and is detailed in 236 CMR 4.01- 4.06; Board of Certification of Operators of Drinking Water Supply Facilities.

The distribution and treatment exams are provided and validated by Water Professionals International (formerly the Association of Boards of Certification) [http://www.abccert.org/abc\\_certification\\_program/operator\\_certification.asp](http://www.abccert.org/abc_certification_program/operator_certification.asp) and administered electronically by PSI Exams testing company. See web site at <http://online.goamp.com/CandidateHome/CandidateInformation.aspx>

Examinations are administered at numerous PSI testing centers throughout Massachusetts and in New Hampshire and Rhode Island.

In order to become certified in Massachusetts, a person must pass the appropriate certification exam and meet education and experience requirements. Education beyond the minimum requirements or possession of a lower grade certificate with appropriate experience in a lower classified system can reduce the amount of experience required. The following reflects the minimum education requirements and corresponding experience for each grade of certification:

- VSS - A high school diploma or GED and 6 months experience in the operation of a VSS or higher system.
- 1T - A high school diploma or GED and 2 years of experience in the operation of a 1T or higher treatment system.
- 1D - A high school diploma or GED and 2 years of experience in the operation of a 1D or higher distribution system.
- 2T - A high school diploma or GED and 3 years of experience in the operation of a 2T or higher treatment system.
- 2D - A high school diploma or GED and 3 years of experience in the operation of a 2D or higher distribution system.
- 3T - A high school diploma or GED and 5 years of experience in the operation of a 3T or higher treatment system.
- 3D - A high school diploma or GED and 5 years of experience in the operation of a 3D or higher distribution system.
- 4T - One year of college and 5 years of experience in the operation of a 4T or higher treatment system.
- 4D - One year of college and 5 years of experience in the operation of a 4D or higher distribution system.

Reciprocity Applications are received and processed by the Board of Certification of Operators of Drinking Water Supply Facilities. All applicants must meet the requirements of 236 CMR 4.05 (5) & (6); Board of Certification of Operators of Drinking Water Supply Facilities Section.

In 2010, the Board adopted two significant policy changes that impacted how drinking water exams are administered in Massachusetts. These policies, which went into effect on January 1, 2011, included requirements that exams must be taken sequentially and that applicants must complete training requirements to sit for Grade 2 or higher-level exams. These policies were intended to “raise the bar” for operators by ensuring that operators are properly trained to perform their duties and protect public health. A review of the passing rates since the Board implemented the new policies show significant improvements in the passing rates for Grade 2 and higher-level exams. Although there are many factors which impact exam passing rates, the Board continues to be encouraged by these results and feels a clear pathway is being provided for the next generation of drinking water operators. Below in Table 3a (2018) and 3b (2020) are the Pass/Fail rates for ABC exam for each license type. Table 3c is a synopsis of the 2018-2020 pass/fail rates by license type.



<b>Table 3(a)</b> <b>Board of Certification of Operators of Drinking Water Supply Facilities</b> <b>2020</b> <b>Summary Report of ABC Exams Results in Massachusetts</b>					
License Type	Total #	Total # Pass	Total # Fail	% Pass	% Fail
VSS	19	17	2	89%	11%
D1	257	170	87	66%	34%
D2	150	91	59	61%	39%
D3	79	44	35	56%	44%
D4	53	22	31	42%	58%
T1	228	135	93	59%	31%
T2	122	73	49	60%	40%
T3	54	37	17	69%	31%
T4	44	14	30	32%	68%
<b>Total</b>	<b>1006</b>	<b>603</b>	<b>403</b>	<b>60%</b>	<b>40%</b>

<b>Table 3(b)</b> <b>Board of Certification of Operators of Drinking Water Supply Facilities</b> <b>2021</b> <b>Summary Report of ABC Exams Results in Massachusetts</b>					
License Type	Total #	Total # Pass	Total # Fail	% Pass	% Fail
VSS	13	11	2	85%	15%
D1	289	176	113	61%	39%
D2	163	94	69	58%	42%
D3	111	54	57	49%	51%
D4	60	24	36	40%	60%
T1	271	156	115	58%	42%
T2	150	86	64	57%	43%
T3	72	46	26	64%	36%
T4	56	24	32	43%	57%
<b>Total</b>	<b>1185</b>	<b>671</b>	<b>514</b>	<b>57%</b>	<b>43%</b>

<b>Table 3(c)</b> <b>Board of Certification of Operators of Drinking Water Supply Facilities</b> <b>2022</b> <b>Summary Report of ABC Exams Results in Massachusetts</b>					
License Type	Total #	Total # Pass	Total # Fail	% Pass	% Fail
VSS	24	20	4	83%	17%
D1	333	172	161	52%	48%
D2	206	92	114	45%	55%
D3	127	56	71	44%	56%
D4	78	34	44	44%	56%
T1	300	149	151	50%	50%
T2	118	73	45	62%	38%
T3	82	46	36	56%	44%
T4	88	24	64	27%	73%
<b>Total</b>	<b>1356</b>	<b>666</b>	<b>690</b>	<b>49%</b>	<b>51%</b>

<b>Table 3(d)</b> <b>Massachusetts Board of Certification of Drinking Water Operators</b> <b>Comparison of 2019-2022 Pass Rates</b>				
	2019	2020	2021	2022
License Type	% Pass	% Pass	% Pass	%Pass
VSS	89%	89%	85%	83%
D1	63%	66%	61%	52%
D2	69%	61%	58%	45%
D3	48%	56%	49%	44%
D4	53%	42%	40%	44%
T1	64%	59%	58%	50%
T2	67%	60%	57%	62%
T3	67%	69%	64%	56%
T4	39%	32%	43%	27%

Table 4 is a listing of the number of licensed operators in Massachusetts from 2018 to 2022.

<b>Table 4</b> Total Number and Types of Drinking Water Licenses in Massachusetts 2018 - 2022 (Note: Combined (C) licenses include both treatment and distribution certification)					
License Type	2018 Licenses	2019 Licenses	2020 Licenses	2021 Licenses	2022 Licenses
C1	25	17	17	13	13
C2	47	30	31	22	22
C3	22	12	13	9	9
C4	80	56	62	36	36
D1	447	324	398	356	409
D2	668	570	618	568	628
D3	478	431	470	431	464
D4	250	230	247	240	257
D1- OIT	452	371	462	438	509
D2- OIT	295	256	310	289	295
D3- OIT	181	169	193	206	209
D4- OIT	201	180	195	198	208
T1	442	357	406	371	421
T2	371	331	368	335	387
T3	258	231	262	252	277
T4	278	256	277	267	286
T1- OIT	507	418	508	468	521
T2- OIT	312	272	337	343	356
T3- OIT	206	179	210	227	230
T4- OIT	196	173	188	184	183
VSS/VS/VT	232	186	211	166	181
<b>Total Number</b>	<b>5,970</b>	<b>5,049</b>	<b>5,783</b>	<b>5,419</b>	<b>5,901</b>

Notes: Data extracted from Board of Certification of Operators of Drinking Water Supply Facilities data set. Some individuals hold multiple licenses.

#### 4. Enforcement

MassDEP has a very active compliance and enforcement strategy for systems that fail to comply with the MassDEP standards, guidelines and policies. MassDEP issues a Notice of Noncompliance (NON) or notice of noncompliance and Compliance Schedule Approval (NONCSA) to any system that does not have a certified operator or that does not have an operator with the appropriate grade license. **During this reporting period, MassDEP issued seven (7) NONs to systems that did not meet the certified operator requirements.**

Higher-level enforcement (HLE), with penalties in certain cases, is issued to those systems that are chronic offenders. The types of HLEs include a Unilateral Administrative Order (UAO), Administrative Consent Order

(ACO), and Administrative Consent Order with Penalty (ACP). **During this reporting period, MassDEP issued 0 HLEs to systems that did not meet the certified operator requirements as identified in the sanitary survey scheduled actions.** MassDEP staff works closely with public officials and/or owners to bring the public water system into compliance.

### **The Board**

The Board continued to review complaints against operators and take appropriate actions. **During this reporting period, there were 2 new cases opened; 5 were closed, 0 are pending board action (waiting for a response from the licensee), 0 are pending prosecutions, and 0 are pending investigation. There were no licenses revoked or suspended or in the process of being revoked or suspended during the period.**

The Board continues to enter into consent agreements with operators with criminal records.

In December 2004 the Massachusetts legislature enacted House Bill 5074, effective April 1, 2005. This bill provided new enforcement powers to boards under the former Division of Professional Licensure. The Board has the authority to suspend licenses immediately for serious infractions such as intentional falsification of reports that are confirmed by investigation. The Board also has the ability to fine individuals for infractions. The fines are \$100, \$250, \$1,500 and \$2,500 based on first through fourth offense. Operating without a license or a suspended license will cost \$1,500 for the first offense and \$2,500 for the second offense.

### **5. Certification Renewal**

Massachusetts's operator licenses run on a two-year cycle. The two-year cycle, which included this reporting period, began on January 1, 2021, and expires on December 31, 2022. Operators will be sent renewal notices prior to expiration of their licenses. In order to renew a license, operators must submit an online renewal application and pay a fee. The Board periodically audits approximately 5% of all renewal applications to make sure applicants have obtained the required training contact hours (TCHs). The license is good for two years until 12/31/24. Applicants that fail to renew their licenses by the end of the two-year license period may renew their license during the next two-year renewal cycle by paying the application fee plus a late fee. Applicants that fail to renew their licenses by the end of the next two-year license period must re-take the exam and re-apply for a license.

Table 5 below identifies the change in the number of licensed operators from 2021 to 2022. It includes both renewed licenses and new operators for each operator category. All licenses required online renewal on 12/31/22, which led to a large number of licenses expiring as individuals either had difficulty renewing online or let old licenses lapse.

**Table 5**

Changes in Total Number of Drinking Water Licenses  
(Includes both renewals and new licenses)  
2021 vs 2022

(Note: Combined (C) licenses include both treatment and  
distribution certification)

License Type	Change in Number of Licenses
C1	0
C2	0
C3	0
C4	0
D1	+53
D2	+60
D3	+33
D4	+17
D1- OIT	+71
D2- OIT	+6
D3- OIT	+3
D4- OIT	+10
T1	+50
T2	+52
T3	+25
T4	+19
T1- OIT	+53
T2- OIT	+13+6
T3- OIT	+3
T4- OIT	-1
VSS/VS/VT	+15
<b>Total Change in Number of Licenses</b>	<b>+562*</b>

\*Note: The change in drinking water operator licenses (+562) shows an increase in 2022 compared to 2021.

In order to renew their certification, all operators, including operators-in-training, must demonstrate to the satisfaction of the Board that they have completed training during the previous two years in accordance with the following requirements:

- VSS and VND operators need 5 TCHs or more
- Grade 1 and 2 operators need 10 TCHs or more

- Grade 3 operators need 15 TCHs or more
- Grade 4 operators need 20 TCHs or more

To obtain TCHs, operators must take training courses approved or accepted by the Board. These courses are given by New England Water Works Association, Mass Rural Water Association, Massachusetts Water Works Association, Rural Community Assistance Program, EPA, MassDEP and various other organizations individually approved by the Board. MassDEP also co-sponsors courses at various times throughout the year. Appropriate college and university credits are accepted as well. There are also Board approved on-line training courses that operators can take for TCHs. During this reporting period, the Board approved 89 training courses for TCHs. Listed in Table 6 are the training classes that were approved by the Board.

**Table 6  
Training Classes Approved for TCHs by the Board of Certification in 2022**

CPR/FA/AED	Emergency Response Operations Training
DOT Drug & Alcohol Safety Training	Power of Partnership: Sharing Resources
Ransomware Experiences, Defense, and Response	Emergency Procurement
Controlling Lead & Copper in PWS	Procurement Best Practices
Management & Finance for Small Water Systems	Public Sector Ethics
Water Sector- ICS 400	Contract Administration
Tour A: Worcester Water Treatment Plant, Holden, MA	Advanced Topics
Distribution - Session 1	IFB & RFP Workshop
Water Treatment 1- Session 2	Vendor/Contractor Responsibility and Eligibility Determinations
Dams- Session 3	Emergency Response Operations Training
Emergency Preparedness - Session 4	GW Rule & Water Resources - Session A
Customer Service- Session 5	Asset Management & Data- Session B
Distribution 2 - Session 6	Distribution - Session C
Water Treatment 2- Session 7	Management & Finance- Session D
Young Professionals - Session 8:	Water Treatment - Session E
Supply Train Disruptions - Session 9	Stormy Awards for New England - Session F
Water Resources- Session 10	PFAS- Session G
Tour B: Worcester Water Treatment Plant, Holden, MA	Pipe Locating & Leak Detection
Distribution/ Storage Session 11	Emergency Response Plan Training
Water Treatment 3- Session 12	Maintaining Compliance w/ SDWA
Asset Management - Session 13	Water Utility Management
Workforce Challenges- Session 14	Corrosion Control
Regulatory- Session 15	Distribution System Water Quality Issues
Distribution III- Session 16	Electrical Safety (NFPA 70E 2021)
Water Treatment 3- Session 17	Groundwater Wells
Management & Finance- Session 18	Meters Valves and Hydrants
Cross Connections - Session 19	Piping Systems Part 1
Ground Water- Session 20	Piping Systems Part 2
Diversity & Allyship Breakfast	Pipelines
2022 Water Quality Symposium	Pump Installation and Maintenance
Risk Assessment and Management, Resiliency Planning, and Emergency Preparedness	Pumps and Motors
Maintenance and Installation of Fire Hydrants	Source Water Issues and Pre-Treatment
Public Contracting Overview	Surface Water Treatment Plant Operations
Supplies and Services Contracting	Valve Maintenance and Piping System Protection
MCPPO - Designation Renewal	Water Distribution System Operation Overview
Design and Construction Contracting	Coagulation and Flocculation
DEP Updates	IT & Asset Management Fair
Lead & Copper Panel Discussion	Water Resource Symposium
Trenching & Excavation Safety	NEWWA December 2022 Membership Meeting
OSHA 10	Cyber Security- Recognizing and Reporting Phishing
Work Zone Safety	Historical use & monitoring of chlorine as a disinfection agent.
Red Cross/ First Aid Certification	NEWWA/NHWWA January-2023 Membership Meeting- NH
Flagger Certification	Backflow Basics of Potable Water Systems
Confined Space Entry Training	Financial Basics for Small Water Systems
Cyber Security Planning	
Source Water Protection in Massachusetts	

## 6. Resources Needed to Implement Program

The operator certification program in Massachusetts has been working successfully for many years. The Board continues to utilize the resources of the Division of Occupational Licensure to implement the licensing and operator enforcement portion of the operator certification program. MassDEP chairs the Board and MassDEP Drinking Water Program staff provides training, compliance and technical assistance to certified operators.

MassDEP also refers certified operators with compliance issues to the Board for review and potential disciplinary action.

MassDEP has a very active operator certification program which has been integrated into the daily activities of drinking water program staff (includes staff in Boston and the four (4) regional offices). Program activities include (but are not limited to) working with the Board of Certification of Operators of Drinking Water Supply Facilities and the Division of Occupational Licensure, providing technical assistance to operators, completing sanitary surveys, assisting in the completion of accurate staffing plans, taking enforcement actions, investigating complaints, providing technical assistance and other operational and administrative tasks. It is estimated that three (3) FTEs are needed to implement the Operator Certification program. The cost per FTE is approximately \$198,030. See table below for cost estimate for implementing the Operator Certification Program. The program and staff are funded through a variety of funding sources; including but not limited to PWSS, State account (0100), Massachusetts Safe Drinking Water Act Assessment funds, and SRF set-asides.

<b>MassDEP Operator Certification Program Expenses SFY 2022</b>	
FTE's to implement Operator Certification Program	3
Cost per FTE	\$198,030
Total Cost	\$594,090

## 7. Stakeholder Involvement

The Board meets monthly to review applications and conduct other business. The Board is comprised of seven members, three of whom are ex-officio members (Department of Environmental Protection, Department of Public Health, and Department of Conservation and Recreation). The four remaining members, who are appointed by the governor, represent a labor organization (vacant), New England Water Works Association, Massachusetts Water Works Association, and the Professional Engineer community. All meetings are open to the public, except when the Board sits in executive session for permitted instances.

The MassDEP Chairman of the Board provides the Board with the opportunity to have direct input in MassDEP policies and programs.

The Chairman also serves on the New England Water Works Association Operator Certification Committee, which has representatives from each of the New England states. This committee meets quarterly to discuss certified operator issues, concerns, policies and programs.

The Board plays an active role at ABC. Board members serve on ABC committees as well as New England Water Works Association and Massachusetts Water Works Association committees. The Board sponsors examination review workshops where certified operators are invited to attend and review examination questions.

The Board Chair and assigned MassDEP Drinking Water Program staff also participate in the USEPA Capacity/Certification program.



## **8. Program Review**

The Board continues to investigate all complaints of impropriety by operators in Massachusetts and take appropriate actions. The Board and MassDEP remain committed to protecting public health by ensuring that drinking water operators are properly trained and certified; and that they properly perform their duties.

In 2014, MassDEP contracted with ABC (now Water Professionals International) to conduct a third-party review of the Massachusetts Operator Certification Program. ABC was provided with copies of MassDEP's drinking water regulations and policies, as well as the Board's regulations and policies. Additionally, ABC visited Massachusetts in June 2014 and conducted interviews with MassDEP staff and Board staff. ABC compared the Massachusetts Operator Certification Program with ABC's Model Standards of Certification, 1st Edition. ABC reported the results of its finding in a report dated September 18, 2014, which included recommendations. The Board and MassDEP used the findings to update appropriate aspects of the program. The Board has updated its applications to require proof that applicants meet the education and experience requirements. Additionally, the Board developed a Code of Conduct that all applicants must agree to sign as part of their application. The Board continues to review issues related to the findings of this report as well as additional issues identified by the Board and its stakeholders.

MassDEP has continued efforts to building a workforce of water quality professionals. The initiative is modeled after a previous initiative entitled "Green Jobs Training Initiative" and includes an environmental justice and diversity component. It is an on-going program. Below is a short list of some of the activities providing support for workforce development:

- Vocational/Technical School Outreach- Provide students with an understanding of drinking water operations and expose them to careers in the field drinking water. Offer information on basic operator certification training classes and certification opportunities.
- Community Colleges- Bristol Community College offers drinking water operator curriculum with operator certifications and onsite training opportunities. Work to build it into the existing Massachusetts Education requirements.
- Continuing Education- Continued efforts to work with and partner with workforce development and night life stakeholders to promote Drinking water careers.
- Work with regional planning organizations/universities to develop a drinking water operator "circuit rider" that could provide services to a number of systems.
- Work with public water systems to facilitate inclusion of technical high school students and others as interns or entry-level part-time operators after completion of basic certified operator training and certificate.

## **9. Implementation Schedule Update**

Implementation of the program is on-going.