

February 14, 2019

Vandana Rao, Executive Director

Massachusetts Water Resources Commission

100 Cambridge Street

Boston, MA 02109

Dear Ms. Rao:

I am writing today on behalf of the Green Industry Alliance of Massachusetts, which is comprised of the Massachusetts Arborists Association (MAA), the Massachusetts Association of Landscape Professionals (MLP), the Massachusetts Association of Lawn Care Professionals (MALCP), the Irrigation Association of New England (IANE), and the Golf Course Superintendents Association of New England (GCSANE). Our mission is to promote awareness and educate the public, elected and appointed officials in the Commonwealth on best practices and professional standards in landscape, lawn care, irrigation, and integrated pest management.

The GIA would like to respectfully submit the following comments in response to reading the Draft Drought Management Plan.

We believe the draft plan successfully lays out a comprehensive set of actions to be taken by a variety of stakeholders to adequately prepare for and respond to drought conditions. We do not have any substantive comments of the draft plan itself but in going through the plan we had to follow through to other guidelines and recommendations as prescribed in the plan. Specifically, with Table 9: State Preparedness, the following items caught our attention:

* Water Conservation – Implement the standards and recommendations of the Massachusetts Water Conservation Standards at state facilities.
* Technical Assistance - Assist state facilities in implementing the standards and recommendations of the Massachusetts Water Conservation Standards, particularly in Chapters 5 (Residential/Indoor Water Use), 6 (Public Sector Water Use), Chapter 7 (Industrial, Commercial, and Institutional Water use) and 9 (Outdoor Water Use).
* Policy and Regulatory Action – Develop recommendations for legislation to implement statewide outdoor water-use controls. We would like to be included in this process.
* Policy and Regulatory Action – Evaluate barriers to and opportunities for reuse of graywater and reclaimed water. Review regulations an update, if needed. We would like to be included in this process

Section 8: Drought Preparedness and Response actions – Guidance for Communities, Action1: Develop a Water Conservation Program, item (2) Implement and Outdoor Water Use Program. We agree with the stated premise, that “A key factor in improving efficiency is proper design, installation and auditing (change auditing to: management) by professionals holding the appropriate certifications (by nationally recognized certification programs, such as EPA WaterSense-labeled certification programs).”

However, this section then refers to MassDEP’s Model Outdoor Water Use By-law/Ordinance, which includes inconsistencies with existing law (System interruption devices, MGL Chapter 21, Section 67) and the most recent Water Conservation Standards (Sections 9.1, 9.2), and Draft DMP itself as referenced above (Section 8). While we support the efforts of the DMTF and agree with the draft plan, we cannot support the direction to follow the Model Bylaw as written.

**MGL CHAPTER 21, SECTION 67**

This section defines ''irrigation system'' as any assemblage of components, materials or special equipment, which are constructed and installed underground or on the surface, for controlled dispersion of water from any safe and suitable source for the purpose of irrigating landscape vegetation or the control of dust and erosion on landscaped areas and shall include integral pumping systems and required wiring within that system and connections to a public or private water supply system; provided, however, that an irrigation system shall not include plumbing, as defined in section 1 of chapter 142, or a plumbing system.

We would recommend that the DEP Model Bylaw incorporate this definition to keep the terms consistent across the MGL, by-laws, and Water Conservation Standards. This definition and the requirement that the DEP develop regulations to require “system interruption devices for newly installed or renovated irrigation systems to override and suspend the programmed operation of the irrigation system during periods of sufficient moisture.” are found throughout the latest version of the WCS.

**WATER CONSERVATION STANDARDS**

We agree with the vast majority or recommendations found in Section 9 of the Water Conservation Standards that were updated in 2018. Under Section 9.1 (Standards) (3) Maximize the efficiency of irrigation, we wholeheartedly support the idea to “use best management practices (see Appendix I) and the best available technology along with regular system evaluation to ensure maximum efficiency of water use.”

Section 9.2 (6) recommends that Municipal Governments and Water Suppliers should adopt bylaws/ordinances, policies, or regulations that include a comprehensive and well thought out list of options that fit the description in Section 9.1. This list is also inconsistent with the DEP Model Bylaw and we strongly recommend that the bylaw be updated to reflect this more robust set of provisions.

We ask the WRC to note that it appears that Section 9.2 (6) is contradicted by item (5) of Section 9.1, which also suggests the adoption and implementation of a bylaw, ordinance or regulation that should limit the number of watering days per week and hours per day. While we agree it makes sense to limit the hours of the day to avoid watering during times with high evapotranspiration and increase watering efficiency, we do not support the idea of limiting ~~that~~ the number of days per week unless further qualified.

A bylaw that limits the number of days does not achieve the goal of reducing the total amount of water used for landscape watering, Instead, consumers tend to overwater on the days allowed, regularly exceeding the soils’ ability to store water and for the landscape to use the moisture efficiently. This goal of reducing overall water use in the landscape would be better achieved by using Best Management Practices and the best available technology as suggested in 9.1 (3).

We respectfully request that the WRC and DEP consider developing a more specific and functional metric to limit outdoor water use by using a combination of number of days and an overall limit. For example, something like the statement below recognizes the technological capabilities of modern irrigation systems.

Further, we recommend that the DEP Model Bylaw be amended as follows:

Section 4 (Definitions) – Nonessential outdoor water uses that are subject to mandatory restrictions include:

* Irrigation of lawns via sprinklers or ~~automatic~~ irrigation systems **that are not programmed to limit the hours and days of operation and to not exceed the net application of 1-inch per week to the landscape over a period of no more than three days per week**:

Section 4 (Definitions) - Exceptions to nonessential outdoor water uses are:

* **Irrigation systems programmed to limit the hours and days of operation and to not exceed the net application of 1-inch per week to the landscape which may be applied** **over a period no of more than three days per week**:

Section 8 (Restricted Water Uses)

(c) Nonessential outdoor water use method restriction: Nonessential outdoor water use is restricted to a bucket or hand-held hose controlled by a nozzle**, or an irrigation system programmed to limit the hours and days of operation and to not exceed the net application of 1-inch per week to the landscape which may be applied** **over a period no of more than three days per week**

Section 15: Controls on In-Ground Irrigation Systems (Subsection xx.1 Registration and Installation)

We support the idea that all newly installed irrigation systems be registered with the Town and that the Board of Water Commissioners may require inspection of the systems. This is also consistent with Section 67 of Chapter 21 of the MGL, see below.

b) The department of environmental protection shall promulgate regulations that require system interruption devices for newly installed or renovated irrigation systems to override and suspend the programmed operation of the irrigation system during periods of sufficient moisture. The department shall specify the criteria for the system interruption devices. The regulations shall: (i) be in accordance with generally accepted standards of irrigation practice; (ii) include a requirement that system interruption devices be inspected at least every 3 years by an irrigation contractor certified and in good standing with a nationally recognized association; and (iii) require each irrigation contractor to complete and submit documentation, along with a reasonable fee, which shall reflect the costs of accepting and processing such documentation, to the municipality for each newly installed or renovated irrigation system within the municipality. The department may impose reasonable fines on an irrigation contractor for a violation of the regulations promulgated under this section.

(c) This section shall not apply to systems operating on agricultural lands.

Section 15: Controls on In-Ground Irrigation Systems (Subsection xx.2 Soil Moisture Sensor Devices)

Soil moisture sensor technology is expensive and difficult to understand from both an installation and programming standpoint. One soil moisture sensor installed on an irrigation system as suggested in the language is not practical as different plant types and exposures each require their own sensor. Additionally, many soil moisture sensors on the market do not work. This section should be amended as System Interruption Devices and made consistent with the Section 67 of Chapter 21 of the MGL.

Section 15: Controls on In-Ground Irrigation Systems (Subsection xx.3 Backflow Prevention)

We believe these devices are already required and fully defined under Chapter 142 of the MGL and the Plumbing Code (310 CMR), and is also referenced in the definition of an irrigation system, pursuant to Section 67 of Chapter 21 of the MGL. These sections do not appear necessary.

As always, we appreciate the opportunity to share our perspective on these important policy developments a remain eager to engage in further discussions as this process moves ahead.

Sincerely,

Stephen A. Boksanski, Executive and Legislative Agent

Green Industry Alliance