

Massachusetts Drought Management Task Force – Meeting Summary

May 7, 2025, 1:00 pm – 3:00 pm conducted remotely via Zoom

Attendees, Drought Management Task Force Members:

Vandana Rao, Co-Chair, Executive Office of Energy and Environmental Affairs (EEA)
Benjamin Hiltunen, Co-Chair, Massachusetts Emergency Management Agency (MEMA)
Brian Loving, United States Geological Survey (USGS)
Duane LeVangie, Department of Environmental Protection (MassDEP), Water Management Act
Tom Maguire, MassDEP, Wetlands
Kate Bentsen, Department of Fish and Game (DFG)
Jennifer Pederson, Massachusetts Water Works Association (MWWA)
Lydia Olson, Massachusetts Rivers Alliance (MRA)
Viki Zoltay, Department of Conservation and Recreation (DCR), Office of Water Resources (OWR)
Karyn Lothrop, DCR Fire
Anne Carroll, DCR OWR
Dalene LaPointe, Department of Public Health (DPH)
John Gregoir, Massachusetts Water Resources Authority (MWRA)
Robert Megnia, NOAA – National Weather Service
Abe Farley, NOAA – Northeast River Forecasting Center
Marcos Pareto, Department of Public Utilities (DPU)
Michael Botelho, Department of Agricultural Resources (MDAR)
Moussa Siri, Water Supply Citizens Advisory Committee (WSCAC)

Other Attendees:

Aisha Revolus	EEA	Erin Graham	DCR OWR
Alan Taubert	SBWSB	Giovanna Recinos	City of Salem
Alex Taylor	DPU	Jack Collins	General Counsel, Oak Bluffs Water District
Anthony Comeau	Town of Natick	Jason Duff	DCR OWR
Bailey Mullins	DCR OWR	Jennifer Durso	MassDEP
Brittany Segill	MassDEP	John Scannell	DCR
Bruce Broisman	DPH	Joseph Pellegrino	Wellesley Water and Sewer
Caitlin LeDuc	Town of Natick	Kate England	City of Boston
Caitlin Messer	Town of Concord	Matt Comeau	Lynn Water & Sewer Commission
Carys Lustig	Town of Needham	Melissa Simoncini	Town of Concord
Casey Ciapciak	Town of Natick	Michael Scott	Town of Holden
Christine Hatch	UMass Amherst	Nathan Mousseau	SBWSB
Dave Epstein	GBH	Patrick Cunningham	Worcester DPW&P
Dave Michaluk	Town of Seekonk	Purvi Patel	EEA
Don Cooper	Town of Seekonk	Richard Bradley	Superscapes
Edwin Sumargo	EEA	Rob Faley	Town of Chatham
Elise Tarnauskas	Springfield Water and Sewer Commission	Ron Strohsahl	Oxbow Associates, Inc.
Elizabeth McCann	MassDEP		

Sam Banas	USGS	Todd Melanson	MWWA
Sara Cohen	DCR OWR	Toni Stewart	DCR OWR
Sharon Clement	Town of Danvers	Vanessa Curran	DCR OWR
Thomas Trainor	Town of Sherborn		
Tim Pasakarnis	Cape Cod Commission		

1. Introductions: EEA, MEMA & Announcements

Rao called the meeting to order at 1:04 pm, asked everybody to enter their names and affiliations in the chat, and reminded attendees that the meeting would be recorded for the purposes of meeting notes. She introduced herself and her co-chair from MEMA, Ben Hiltunen. Hiltunen welcomed attendees and thanked them for their time on the Task Force.

Rao explained that staff are working on new messaging methods to help communicate the current drought situation, acknowledging that residents will be very reactive to the recent rain the state has experienced. However, monitoring data still shows that we are not out of drought yet. Carroll added that Jen Pederson is coordinating a focus group to further discuss this topic which suppliers are welcome to join. Staff have been working on an updated FAQ document to answer some of the recent most common questions. The hope is to develop something that can be updated. Pederson noted that a lot of the new questions are arising as a response to the new MassDEP regulations.

2. Approval of April 8, 2024 DMTF Meeting Notes

Rao asked for a motion to approve the April 8 meeting notes. Zoltay made the motion to approve and Broisman seconded the motion. The vote to approve was unanimous of those present, except for Siri who abstained due to not being present at the April meeting.

3. Updates on Current Conditions and Impacts

Presentations for the updates below can be found on the mass.gov website [here](#); a summary of each presentation is below.

Weather & Forecast: Rob Megnia - National Weather Service (also representing the Northeast River Forecasting Center)

In April, the state experienced mostly near normal temperatures. There was above normal precipitation for Western, Central, and eastern MA (1-2" above normal), but below normal precipitation for southeast MA, Cape, and Islands (0.5 to 1.5" below normal). 3-month and 6-month departures are near normal for most of the state. Sections of western MA, the Cape, and Islands are still below normal (40-80% of normal). Forecasts show 1 to 2" of new precipitation possible through next Tuesday with the best chances away from southeast MA. The outlook is leaning toward below normal precipitation for the second week of May, and odds favor above normal precipitation through July.

Hydrologic: Bring Loving- USGS

Other than runoff from one significant precipitation event around April 26-27, streamflow generally declined during April across Massachusetts. April streamflow percentiles were lower in April than March at nearly all sites, with exceptions at a few sites in the Northeast Region and the Quinebaug. The Cape continues to be the region with the lowest flows relative to normal. Groundwater conditions in April were generally better than March, as March had more precipitation than other recent months and

groundwater tends to lag behind precipitation. There are still “below” to “much below” normal conditions for most wells in Middlesex County and the Cape and Islands.

Rao noted that the groundwater levels on the Cape are low compared to the period of record. Zoltay commented that it could be due to depth of the wells and recommended investigating this. Loving replied that he could have a groundwater specialist from USGS come to a Task Force meeting to comment on the groundwater patterns.

Water Supply: Duane LeVangie – MassDEP

LeVangie reminded the Task Force of the PWS permit requirements. He reviewed specific streamflow triggers for applicable communities, as well as the groundwater-driven community requirements. LeVangie also reviewed the non-essential outdoor water use restrictions based on calendar and streamflow. He explained the new watering restrictions requirements for registrations based on drought declarations, as well as restrictions for golf courses. 80 public water systems have reported current restrictions to MassDEP (3 voluntary, 46 mandatory of 2 days or less, and 31 mandatory of 1 day or less).

Pederson asked for clarification on which suppliers should be notifying MassDEP of restrictions, and wanted confirmation that not all systems need to have restrictions in place right now. LeVangie confirmed that if public water suppliers implement restrictions, they are supposed to notify MassDEP. She also asked for clarification on a possible discrepancy between wording in the table that summarizes watering restrictions that LeVangie showed and what is outlined in the DMP. LeVangie noted that the WMA regulations state that at Level 2- "All nonessential water uses banned, except that watering of ornamentals and flower gardens with drip irrigation, hand-held hose or watering cans may be permitted."

Water Supply: John Gregoire – MWRA

The Quabbin is at 89% full and has gained about 1.2 ft in elevation since the last Task Force meeting. It is still just below normal according to the old drought plan but would be in the normal range according to the new drought plan which has not been published yet. The levels will also go lower once the Wachusett transfers begin. This is the lowest the reservoir has been in May since 2017. The Wachusett is a little higher than they would like it to be when starting the transfer but should not be a significant issue. Sudbury and Foss are both in their normal operating bands and responded well to recent rains.

Water Supply: Jennifer Pederson – MWWA

Pederson gave several updates from members. Multiple members reported that the new MassDEP Water Management Act regulations that went into effect for PWS with registrations who have not traditionally had restrictions has been challenging. Imposition of these restrictions has been particularly challenging for surface water systems who in many cases are overflowing. Customers do not understand why they cannot water when reservoirs have excess capacity. There were no concerns regarding supply from any members.

There was discussion on an issue Sharon is having with permitting a sidewalk due to the ongoing drought declaration and MassDEP not accepting photos to demonstrate that a stream that would potentially be impacted is intermittent. Maguire offered to connect with them to discuss the situation further.

Private Water Supply: Alex Taylor- DPU

Taylor gave an update on Aquarion’s current restrictions. Oxford has limited non-essential outdoor water use to one day per week between 5 pm. and 9 am. This is a change from a total water ban from the

previous month. The other distribution areas remain unchanged. Dover is limiting non-essential outdoor water use to two days per week from 9 am. to 5 pm. Pine Hills is limiting non-essential outdoor water use to two days per week from 7 pm. to 7 am. The Ponds of Plymouth are allowing one day per week between 5 pm. and 9 m. Lastly, Sheffield has limited nonessential outdoor water use to one day per week between 5 pm. and 9 am.

Wetlands: Tom Maguire- DEP

No recent updates from conservation commissions.

Fish and Game: Kate Bentsen- DER, Brad Chase- DMF

Bentsen gave an update on several monitoring locations, beginning with Brown's Brook and Parker's Brook in the Central Region. Both have seen good recovery with recent rain and are expected to continue recovering. Chase added that in the Southeast Region, the Jones River has very low flow and is impacting herring migrations. In general, herring migrations are not off to a great start this year, with the most significant impacts in localized water supply watersheds and on Cape Cod.

Massachusetts Rivers Alliance: Lydia Olson

Reports received from the Taunton, South Coastal, and Charles basins. In the Charles, Cress Brook has dropped in flow consistently and was not flowing as of the last report. Olson also reiterated concerns over the Jones River being dry and impacting herring migrations. There were also some concerns over low flows and the possibility of impacted herring migrations from the Taunton River watershed, specifically the Nemasket River.

Water Supply Citizens Advisory Committee: Moussa Siri

Siri reiterated the improvement in the Quabbin levels with the recent rain. He noted that WSCAC had an upcoming meeting (May 13th at 10am) to discuss the updates to the MWRA drought plan. He invited anyone who wanted to attend to send him an email.

Agricultural: Michael Botelho- DAR

No updates to report.

Fire Danger: Karyn Lothrop

Fire was fairly active until the recent rain. The drought conditions likely affected the early season fires. The recent rain has brought fire danger back down and it is expected that with the humidity increasing soon fire danger will remain low for now.

Pederson asked why prescribed burns would be allowed during drought conditions, in relation to the Joint Base Cape Cod brush fire. Lothrop had signed out of the meeting prior to this question getting asked, so it was decided to send the question to DCR Fire for comment after the meeting.

Engineering: John Scannell- DCR

No updates to report.

Public Health: Dalene LaPointe

No updates to report.

4. Presentation of Index Severity Levels as per MA DMP

Zoltay briefly reviewed the DMP indices, how severity levels are calculated, and the drought Regions. She reviewed recent hydrologic history that led to current conditions. The precipitation deficit causing the current drought conditions started in mid-August and continually got worse through mid-October, leading to record low streamflows across much of the state. There was some precipitation toward the end of November which brought temporary relief. December brought normal to above-normal precipitation which helped improve conditions, but January saw below normal precipitation which brought streamflow and groundwater levels down. February had mostly normal precipitation, but there were continued impacts to streamflow and groundwater. March had normal precipitation which brought improvements to streamflow and groundwater except in the Cape and Islands. April brought more normal precipitation, but leaf-out occurred almost 20 days sooner than normal with minor degradation in streamflow and groundwater except for slight improvement on Cape Cod. The most recent U.S. Drought Monitor is also showing improvements since the last meeting.

The Standardized Precipitation Index (SPI) is mostly normal across the state. Precipitation deficits since mid-August are between 3-12 inches. The 6-month lookback is showing improvements, but the 9-month is still showing significant deficits. The evapotranspiration index looks very below normal because of the sunny/windy days, but the actual values are not expected to offset precipitation very much. Streamflow has been showing higher levels after rain events, but the baseflow is still low because the groundwater has not fully recovered. Groundwater is still variable across the state and is somewhat dependent on how deep the water table is, ranging from well below normal to normal. KBDI is in normal ranges across the state in response to the recent rain. The Lakes and Impoundments range from 100% in the west to some below normal values in the northeast.

There was discussion on which lookback period to use for precipitation. The 9-month is more reflective of the earlier months of drought and the continued lag in recovery for groundwater, while 6-month is more reflective of the recent rain and recovery in many parts of the state. Pederson stated her preference is using the 6-month and asked for clarification on the importance of the ET index for this time of year. Zoltay responded that it is not as important as other indices for this time of year since it is very early in the season. Pederson also asked about the representation from reservoirs and natural waterbodies in the L&I index. Graham replied that the Northeast Region does not have any natural waterbodies represented in the network and that one system had implemented a watering ban due to lower than normal levels. Carroll suggested leaving both 6-month and 9-month up for review. Olson agreed with leaving both lookback periods up for review.

Maguire asked if the same lookback period should be used for all indicators. Rao explained that the different indices have different characteristics, so the question over 6-month vs. 9-month should be specific to precipitation. LeVangie said he would prefer using 6-month because it reflects more recent conditions. He also said groundwater tends to reflect the longer-term conditions which could be redundant with using the 9-month precipitation lookback. Pederson agreed and noted that the data being shown are not taking into consideration the last week which has been very rainy and reiterated that residents are complaining about restrictions despite the wet weather. Gregoire, Siri, and Botelho also voiced their support for using the 6-month lookback because it is more reflective of current conditions.

5. Discussion of Drought Level Recommendations for each Region

Central - Conditions have recovered and the staff recommendation is Level 0 – Normal Conditions. There was discussion on the precipitation for this Region and a review of the percentile-based index as described in the DMP. The majority of Task Force members supported moving the Central Region to Level 0.

Cape Cod - Streamflow, groundwater, and precipitation are all clearly still low. The staff recommendation is to hold at Level 2 – Significant Drought. There was unanimous support for holding at Level 2.

Islands - Groundwater has not improved. Precipitation has improved when looking at the 9-month lookback. Conditions overall are trending towards improvement. The staff recommendation is to move to Level 1 – Mild Drought. There was discussion on evaluating the islands separately because conditions might be different between Nantucket and Martha's Vineyard. Zoltay showed additional data showing that wells located further inland on Martha's Vineyard are below normal as well, and that the wells closer to the coast are potentially artificially elevated by sea level rise. The majority of Task Force members agreed to move to Level 1.

Northeast - This Region did not receive the same amount of rain as other Regions and conditions have not improved as much as we would like to see. The staff recommendation is to move to Level 1 – Mild Drought. There was discussion on the Lakes and Impoundments index only being based on five sites which might not be reflective of actual current conditions. Additionally, the other indices have shown recovery and are normal or close to normal. After discussion, the majority of Task Force members voted to move to Level 1 – Mild Drought.

Western, CTRV, Southeast - Staff recommendation was to hold at Level 1 – Mild Drought. Multiple indices including groundwater are still below normal. There was discussion on the need to consider the recent rainfall for expectations of how the indices will change by next month. It was noted that if these Regions were moved to Level 0 and groundwater did not recover as expected before the next meeting, they would likely have to be moved back to Level 1. The majority of Task Force members agreed after discussion to hold these Regions at Level 1 – Mild Drought with some messaging surrounding the trend toward recovery with the recent rain.

Summary of Recommendations:

Central: Level 0 – Normal Conditions

CTRV, Southeast, Western, Northeast, and Islands: Level 1 – Mild Drought

Cape Cod: Level 2 – Significant Drought

6. Recommendations for Drought Level Response Actions

Messaging will focus on improvements with recent rainfall, but despite the rain, groundwater has still not recovered. Precipitation deficits since August also need to be noted. The press release should also emphasize that decisions are based on the prior month of data.

7. Next Steps

The recommendations will be brought to the Secretary for a decision on an updated declaration. The Task Force will meet again in June.

Meeting Ended: The meeting adjourned at 3:18 pm.