

THE COMMONWEALTH OF MASSACHUSETTS WATER RESOURCES COMMISSION

100 CAMBRIDGE STREET, BOSTON MA 02114

Meeting Minutes for September 10, 2015

100 Cambridge Street, Boston, MA, 1:00 p.m.

Minutes approved November 12, 2015

Members in Attendance:

Kathleen Baskin Designee, Executive Office of Energy and Environmental Affairs (EEA)
Linda Balzotti Designee, Department of Housing and Community Development (DHCD)

Jonathan Yeo Designee, Department of Conservation and Recreation (DCR)
Douglas Fine Designee, Department of Environmental Protection (MassDEP)

Catherine deRonde Designee, Department of Agricultural Resources (DAR)

Todd Richards Designee, Department of Fish and Game (DFG)

Raymond Jack Public Member
Paul Matthews Public Member
Bob Zimmerman Public Member

Members Absent

Todd Callaghan Designee, Massachusetts Office of Coastal Zone Management (CZM)

Thomas Cambareri Public Member

Others in Attendance:

Vandana Rao EEA
Marilyn McCrory DCR
Anne Carroll DCR

Peter Weiskel U.S. Geological Survey
Denis LeBlanc U.S. Geological Survey

Linda Hutchins DCR
Michele Drury DCR

Jennifer Pederson Massachusetts Water Works Association

Erin Graham DCR Sara Cohen DCR Becky Weidman MassDEP

Julia Blatt Massachusetts Rivers Alliance

Robert Almy Weston & Sampson

Rao, sitting in for Executive Director Baskin, called the meeting to order at 1:04 p.m.

Agenda Item #1: Executive Director's Report

Rao invited announcements from commission members. Zimmerman extended an invitation to an event to celebrate the fiftieth anniversary of the Charles River Watershed Association on October 2, 2015.

Graham provided an update on the hydrologic conditions for August 2015 (the hydrologic conditions report can be found at http://www.mass.gov/eea/agencies/dcr/water-res-protection/water-data-tracking/precipitation-composite-current-conditions.html). Precipitation was below normal across all regions of the state; however, only one of the seven indicators in the Massachusetts Drought Management Plan, the Standardized Precipitation Index (SPI), was

triggered: the six-month SPI value for one region, Cape Cod & Islands, is at the Advisory level. Streamflows were generally normal, except for the Central region, where streamflows were below normal. Groundwater and reservoir levels were normal. The NOAA Seasonal Drought Outlook indicates that drought development is likely for Massachusetts. It also forecasts abovenormal temperatures and below-normal precipitation.

Yeo leaves.

Т

Agenda Item #2: Vote on the Minutes of June and July 2015

Rao invited a motion to approve the meeting minutes for June 11, 2015.

- V A motion was made by Jack with a second by Balzotti to approve the meeting minutes for June 11, 2015.
- E | The vote to approve was unanimous of those present.

Rao invited a motion to approve the meeting minutes for July 9, 2015.

- A motion was made by Balzotti with a second by Zimmerman to approve the meeting minutes for July 9, 2015.
- T | The vote to approve was unanimous of those present, with one abstention (Jack).

<u>Agenda Item #3: Presentation: Cape Cod Groundwater – Current and Upcoming Studies by the</u> U.S. Geological Survey

Rao introduced Peter Weiskel and Denis LeBlanc of the U.S. Geological Survey to provide an overview of recent and upcoming USGS studies of groundwater on Cape Cod.

Yeo returns.

LeBlanc noted that Cape Cody hydrology is at the forefront of water resources problems the commonwealth faces, in particular, problems related to wastewater disposal through septic systems, resulting in nutrient pollution of groundwater. He described the hydrologic challenges facing Cape Cod and southeastern Massachusetts, including managing water use to sustain water levels and environmental flows, stewardship of water quality and addressing emerging contaminants in groundwater, and restoring the environmental health of coastal waters and lakes. He noted that USGS supports a national research program on Cape Cod.

Baskin arrives.

LeBlanc provided an overview of several USGS studies, describing the objectives, activities, and funding sources for each. He highlighted major projects, including the Cape Cod toxics wastewater project; projects done in cooperation with the military base, Joint Base Cape Cod; studies to improve the understanding of groundwater and surface water interactions at Cape Cod kettle ponds; modeling studies to predict the response of the groundwater system to rising sea level on Cape Cod; studies of the groundwater-flow system near the coast; and studies of the fate of nitrate where groundwater discharges into coastal waters. He concluded by noting the four decades of collaboration between Massachusetts water agencies and the USGS and outlined needs for further scientific investigation.

Comments, questions, and responses:

- Jack commended LeBlanc and USGS for their work on Cape Cod groundwater issues, noting the difficulties of educating the public about the connection between wastewater and groundwater.
- Yeo: Is there now enough data and science on which to base decisions about
 wastewater disposal options? LeBlanc responded that decision makers have the tools
 and general concepts needed to proceed. He cautioned that the challenge will be in the
 details, such as in the siting and design of specific technologies.
- Jack commented that the impacts of septic systems on drinking water and the environment are obvious; the argument is about cost.
- Baskin: Can you identify priorities for further investigation? LeBlanc noted the complexities of the behavior of groundwater in coastal areas.
- Zimmerman commented that researchers and policy makers need to look beyond the
 types of infrastructure that have been built in the past. He supported approaches that
 attempt to restore the natural condition. LeBlanc acknowledged that an entirely
 different way of handling wastewater, such as using different technologies in homes,
 may be in order. Rao added that a variety of options, besides sewering, are being
 considered by various communities on Cape Cod.

Baskin conveyed regrets from Commission member Tom Cambareri, who was unable to attend LeBlanc's presentation.

Agenda Item #4: Discussion: Hydrologic Conditions Reporting

Baskin introduced Erin Graham and Linda Hutchins of DCR's Office of Water Resources to discuss proposed revisions to the content and format of the monthly hydrologic conditions report. Graham described the organization of the revised report and summarized major changes. Carroll explained why certain changes were made. Graham invited input on the information commission members would like to see on a monthly basis.

In response to questions and comments, the following points were made:

- Reservoir levels: this section reflects data from the larger group of reservoirs reporting.
- Precipitation amounts: Precipitation is always a combination of rainfall and snowfall melt; it would be difficult to break out data on snowfall melt. The monthly hydrologic conditions report can be tailored in winter to provide information on the snowpack. A national remote sensing center publishes a daily map with snowfall amounts (http://www.nohrsc.noaa.gov). OWR staff plan to make some revisions to DCR's water data tracking website (http://www.mass.gov/eea/agencies/dcr/water-res-protection/water-data-tracking/).

Baskin invited those in attendance to send any other feedback on the report.

Baskin welcomed Todd Richards, who has been appointed as the new designee to the Water Resources Commission by Commissioner George Peterson of the Department of Fish and Game. She also acknowledged the contributions of former designee Mark Tisa, who was one of the longest-standing members of the Water Resources Commission.

Meeting adjourned, 2:09 p.m.

Documents or Exhibits Used at Meeting:

- 1. WRC Meeting Minutes:
 - o June 11, 2015
 - o July 9, 2015
- 2. Draft revision of Hydrologic Conditions Report for discussion:
 - Current Water Conditions in Massachusetts. July 2015 Summary
 - Massachusetts Monthly Precipitation Composite Estimate, July 2015
- 3. Interbasin Transfer Act project status report, August 21, 2015
- 4. Hydrologic Conditions in Massachusetts, August 2015 Summary
- 5. Presentation by Denis LeBlanc: Coastal Groundwater Overview and Cape Cod Hydrology
- 6. Science for the Stewardship of the Groundwater Resources of Cape cod, Massachusetts. September 2014. USGS Fact Sheet 2014-3067.

Agendas, minutes, and meeting documents are available of the web site of the Water Resources Commission at www.mass.gov/eea/wrc under "MA Water Resources Commission Meetings."