

New Jersey Drinking Water Quality Institute (DWQI)

December 19th, 2018, 11 AM

Members Present (11):

Keith Cooper
Daniel Salvito
Jessie Gleason
Sandy Krietzman

Patricia Gardner
Norm Nelson
Judith Klotz
Tina Fan

Gloria Post
Anthony Matarazzo
David Prinitis

Members Absent (1): George Van Orden

Public Attendees:

Linda Bonnette, Gary Buchanan, Chelsea Brook, Brandon Carreno, Perry Cohn, Ryan Compton, Sandra Goodrow, Patricia Ingelido, Lee Lippincott, Filina Poonolly, Kristin Tedesco, Alaina Ungarini (New Jersey Department of Environmental Protection)
John Kuehne (New Jersey Department of Law)
Eric G. Fooder (City of Gloucester)
Ryan Berger (MDA)
Richard Calbi, Michael Drulis (Ridgewood Water)
Erik Person (Langan)
Mark Theiler, David Brogle (Middlesex Water Company)
Ted Toskas (Woodward & Curran)
Sam Jones (CCNJ)
Lynette Dooley (Somerset CEHA)
Alissa Vanim (Aqua America)
Greg Garvey (Golder)
Jeff Tittel (Sierra Club)
Tracy Carluccio (Delaware Riverkeeper Network)
Joren Harrison, Chris Sall (Suez)
Laura Cummings (SMCMUA)

1. DWQI Chair Remarks

- Introductions – Members of the Drinking Water Quality Institute (DWQI) introduced themselves to the attendees.
- Chairman Cooper opened the meeting at 11:08 AM. He discussed the need for attendees to sign in and other procedural steps for the meeting. He discussed using 11 AM as a new meeting time going forward, based on the transportation needed to get to the meeting location.

2. Review of May 15, 2018 Minutes

The DWQI members took several minutes to review the minutes from the previous meeting. Gloria Post had previously submitted some grammatical and formatting edits on the draft minutes. No substantive changes were proposed by members. Daniel Salvito made a motion to approve the minutes, and Judith Klotz seconded the motion. The minutes were approved unanimously by the members who were present.

3. Status of DWQI Vacancies

Chairman Cooper discussed current DWQI vacancies. The law that established the DWQI identifies a number of seats that are not currently filled. Specifically, open seats currently exist for a Water Purveyor, an Academic, and an Environmental Health expert. Two of these seats must be appointed by the NJ Senate, and one must be appointed by the NJ Assembly. Chairman Cooper encouraged anyone who is interested to submit their resume. Patricia Gardner added that resumes may be sent to the Legislative Liaison at the New Jersey Department of Environmental Protection (NJDEP), who would forward the applicant's information to the legislature for consideration. Alternatively, individuals may send application materials to the legislature (Senate and/or Assembly) directly.

4. Previous DWQI MCL Recommendations

Chairman Cooper discussed that a great deal of national attention has been placed on PFAS recently. Several other governmental agencies and organizations have begun to issue recommendations for these substances.

Gloria Post gave a brief update on recent national developments related to PFAS. She focused on the four specific updates discussed below. However, she noted that additional PFAS evaluations from other organizations are constantly becoming available.

In June, the U.S. Agency for Toxic Substances and Disease Registry (ATSDR) developed a draft Toxicological Profile for Perfluoroalkyl Acids for public comment. This document includes intermediate Minimal Risk Levels (MRLs), similar to subchronic Reference Doses, for non-carcinogenic effects of PFAS. ATSDR has been working on this document study for nearly 10 years. NJDOH and NJDEP submitted comments on the earlier 2009 and 2015 drafts. Initially, ATSDR excluded consideration of rodent data in developing MRLs, which the NJDEP disagreed with. The recent June 2018 draft changes their methodology to consider rodent data. The draft Minimum Risk Levels are 3 ng/kg/day for PFOA (DWQI is 2 ng/kg/day), 2 ng/kg/day for PFOS (DWQI is 1.8 ng/kg/day), and 3 ng/kg/day for PFNA. The link to the ATSDR minimum risk level worksheets is: <https://www.atsdr.cdc.gov/toxprofiles/tp200-a.pdf>

Last week, the European Food Safety Authority released Tolerable Daily Intakes for PFOA and PFOS based on human data. These are similar to Reference Doses. They recommended a tolerable daily intake of 0.8 ng/kg/day for PFOA (DWQI Reference Dose is 2 ng/kg/day), and 1.9 ng/kg/day for PFOS (DWQI Reference Dose is 1.8 ng/kg/day). A link to the report is here: <https://www.efsa.europa.eu/en/efsajournal/pub/653>

Yesterday, two states released conclusions on PFAS. The Michigan PFAS Science Advisory board did not release a specific number, but they did conclude that the EPA Health Advisory (70 ng/L for combined PFOA/PFOS) was likely to be insufficiently protective. Their concerns about use of animal data on liver weight in PFAS risk assessment and the increase in blood serum PFAS levels from consuming contaminated drinking water were in line with DWQI conclusions. Their report is posted at: https://www.michigan.gov/documents/pfasresponse/Science_Advisory_Board_Report_641294_7.pdf

Draft Deliberative

The NY Drinking Water Quality Council, which was modelled after the DWQI, recommended MCLs for PFOA and PFOS of 10 ng/L (10 ppt) for each compound. These MCLs are slightly lower than, but similar to, the DWQI's MCL recommendations (14 ppt and 13 ppt respectively) and generally agreed with the DWQI's approach to PFOA and PFOS risk assessment. The Drinking Water Council also recommended an MCL of 1 µg/L (1 ppb) for 1,4-dioxane. More details can be found at:

https://www.health.ny.gov/press/releases/2018/2018-12-18_drinking_water_quality_council_recommendations.htm
<https://www.health.ny.gov/environmental/water/drinking/dwqc/>

Chairman Cooper concluded this portion by noting that DWQI's approach appears to be supported by other agencies' recommendations.

4. Status of MCLs

Chairman Cooper asked for a representative from NJDEP to provide an update on the Department's actions for PFNA, 123-TCP, PFOA, and PFOS.

Kristen Tedesco responded that the MCLs recommended by the DWQI for PFNA and 1,2,3-TCP were adopted on September 9, 2018. NJDEP has been conducting a great deal of outreach to water systems throughout the fall including letters, training sessions, including a webinar. The first round of required monitoring for these two contaminants will take place in the first quarter 2019. Those interested in seeing water systems' monitoring schedules may access them on NJ Drinking Water Watch.

The DWQI's MCL recommendations for PFOS and PFOA were sent to the NJDEP Commissioner. NJDEP will begin holding stakeholder meetings early in 2019. NJDEP has recommended that water systems also report PFOA and PFOS data when submitting PFNA data. If MCLs for PFOA and PFOS are adopted, this grandfathered data will be evaluated to potentially allow eligible systems to receive reduced monitoring schedules. NJDEP is still receiving comments from the public on this topic.

5. 1,4-Dioxane

Chairman Cooper stated that in a poll of the members of DWQI, 1,4-dioxane was the most frequent choice as the next contaminant to receive DWQI evaluation. He is eager to evaluate the NY Drinking Water Council approach. He then asked representatives from NJDEP to discuss previous NJDEP work on regulation of 1,4-dioxane.

Gloria Post gave a presentation on how NJDEP determined the health-based criterion used as the basis for the Ground Water Quality Standard for 1,4-dioxane. The presentation is posted at:

<https://www.state.nj.us/dep/watersupply/pdf/12c4-dioxane-dwqi-11-18-18.pdf>

Lee Lippincott presented on how the PQL used as the bases for the Ground Water Quality Standard for 1,4-dioxane was determined. The presentation is posted at:

<https://www.state.nj.us/dep/watersupply/pdf/14dioxane-dwqi-pql.pdf>

6. Public Comments

Jeff Tittel asked about the status of the reevaluation of the 1,2,3-trichloropropane MCL.

Draft Deliberative

Pat Gardner responded that Lee Lippincott of NJDEP had discussed the PQL for 1,2,3-trichloropropane of 30 ppt at the previous DWQI meeting. The Testing Subcommittee drafted a letter to the NJDEP Commissioner recommending a reevaluation of the MCL based on revision of the PQL. This letter will be passed along to the Commissioner. If this recommendation is accepted by the Commissioner, NJDEP will need to go through the full rulemaking process to update the MCL, which will take time.

Tracy Carluccio commented that the MCLs for PFOA/PFOS were recommended by the DWQI quite some time ago: 21 months for PFOA and 8 months for PFOS. She stated that it is unclear to the public why NJDEP has not yet promulgated these standards. Several other states have begun taking action towards regulating PFAS, and she is worried that NJ will slip behind and lose its lead. She asked why NJDEP fallen short of its obligation towards fulfilling the adoption of the MCL.

Patricia Gardner responded that NJDEP has moved forward with rulemaking for PFOA and that the NJDEP Commissioner has accepted the PFOS recommendation. The process of rulemaking is underway. An initial stakeholder meeting was held last December, and another is planned soon. NJDEP is also encouraging water systems to conduct monitoring for PFOA/PFOS in the interim.

Tracy Carluccio followed up asking how long the process of re-evaluating or rulemaking would take.

Pat Gardner responded that she was unable to say for sure at this time.

Chairman Cooper added that the MCL rules have been moving along. Other states have not yet moved to actually regulate PFAS, even if their advisory groups have begun to provide recommendations. Therefore, NJ is still leading the nation. He noted that treatment to remove PFNA from drinking water will also remove PFOA and PFOS, even if they are not regulated yet.

Anthony Matarazzo stated that from a utility perspective, granular activated carbon (GAC) is showing effectiveness at removal of PFOA and PFOS. They are also finding that GAC has the benefit of removing some other PFAS. However, GAC does not necessarily remove all PFAS compounds including replacement PFAS or other contaminants such as 1,4-dioxane, and removal of these may require other types of treatment. Removal of additional emerging contaminants could require incredibly costly and complicated treatment setups. Proactive utilities are looking to address emerging contaminants prior to their regulation, although other types of long-term solutions are also needed. It may not be feasible to remove contaminants of concern only at the drinking water system, and treatment may also be needed at the wastewater treatment plants and consumer level.

Chairman Cooper then stated that the DWQI recognizes that there are complicated needs behind the regulations. The DWQI will need to evaluate technologies currently under development that can readily address all of the emerging contaminants, and progress is essential.

Tracy Carluccio responded stating that New Jerseyans are drinking water above the health effects level. Therefore, rather than waiting for the “best” technology to remove all contaminants, treatments that are known to be effective should be adopted immediately. GAC is a known technology for removing these and many other dangerous contaminants, and therefore we should move ahead.

Gloria Post noted that EPA has posted draft toxicity evaluations and Reference Doses for Gen X, a replacement for PFOA, and perfluorobutanoic acid (PFBS), a 4-carbon PFAS used as a replacement for PFOS.

Draft Deliberative

Eric Fooder stated that all water utilities are seriously examining the treatments for PFAS and are doing what they can to implement them. From a drinking water perspective, a great deal has been done to address these compounds. However, the rest of the world is still vulnerable to it, as PFAS have been found everywhere. Even dolphins have been found to have elevated PFAS levels. Exposure through foods and baseline environmental exposure to these compounds is also a massive part of the issue. Drinking water cannot be the only regulated pathway for PFAS exposure. A more comprehensive approach to these compounds is necessary. Should dairy farmers be prevented from selling milk containing PFAS in NJ?

Gloria Post agreed that there are multiple exposure pathways for PFAS, However, according to current research, drinking water is the primary way for these compounds to cause elevated exposures when it is contaminated, and it is therefore prioritized.

Eric Fooder suggested that he is aware of a study that PFAS concentrates in fats. He said that he would pass it along to the DWQI for review.

Jeff Tittel concurred that addressing PFAS is not just about drinking water, and that these compounds are all over the country. However, removing them from drinking and ground water eliminates many other sources. Toxic sites must be cleaned up too.

No further public comments followed.

7. New Business and Next Meeting Topics

Chairman Cooper stated that the DWQI will break into individual subcommittees to begin formally evaluating 1,4-dioxane. The DWQI will meet again when the three subcommittees have developed their recommendations to identify the DWQI's MCL recommendation. He hopes to have another meeting in March or April. At minimum, this would be to check in with the subcommittees and identify what kinds of progress they have made. He would like to move along on this contaminant quickly.

The meeting was adjourned at 12:33 PM.