Clean Water Council Meeting Agenda

Monday, December 18, 2023

9:00 a.m. to 2 p.m.

IN PERSON with Webex Available (Hybrid Meeting)

9:00 Regular Clean Water Council Business

- **(INFORMATION ITEM)** Introductions
- **(ACTION ITEM)** Agenda - comments/additions and approve agenda
- **(ACTION ITEM)** Meeting Minutes - comments/additions and approve meeting minutes
- **(INFORMATION ITEM**) Chair and Council Staff update
    - Policy & Budget and Outcomes Committee Updates
    - Staff update
- **(ACTION ITEM)** 2024 Meeting calendar
    - Request for an additional full Council meeting in 2024

9:30 Strategic Planning: Review and Comment on Second Draft

10:30 BREAK

10:45 Supplemental Clean Water Fund Requests & Latest State Revenue Estimate/Forecast

12:00 LUNCH

12:30 Continue Discussion on Supplemental Clean Water Fund Requests

1:45 Public Comments

2:00 Adjourn

Immediately after: Steering Committee

Clean Water Council
November 20, 2023, Meeting Summary

Members present: John Barten (Chair), Steve Besser, Rich Biske (Vice Chair), Dick Brainerd, Gary Burdorf, Gail Cederberg, Steve Christenson, Tannie Eshenaur, Warren Formo, Brad Gausman, Kelly Gribauval-Hite, Justin Hanson, Holly Hatlewick, Annie Knight, Jason Moeckel, Ole Olmanson, Jeff Peterson, Victoria Reinhardt, Peter Schwagerl, Marcie Weinandt, and Jessica Wilson.
Members absent: Rep. Josh Heintzeman, Sen. Nicole Mitchell, Rep. Kristi Pursell, Dan Sparks, and Sen. Nathan Wesenberg, Glenn Skuta, Peter Kjeseth
Others present: Frieda vonQualen (MDH), Jen Kader (Met Council), Heather Johnson (MPCA), Kim Kaiser (MDA), Margaret Wagner (MDA), Julie Westerlund (BWSR), Jim Stark (Subcommittee on Minnesota Water Policy), Dan Huff (MDH), Janelle Kuznia, Annie Felix-Gerth (BWSR), Tony Kwilas (MN Chamber of Commerce), Chengtao Wang, Anne Nelson (MDH), Alex Trunnell (Corn Growers), Jesse Krzenski, Joel Larson (U of M), Jeff Broberg (MN Wells Owners Organization), Amanda Bilek (Corn Growers), Angelica Anderson (Nature Conservancy), Catherine Neuschler (EQB), Emily Zanon (MPCA), Sheila Vanney (MASWCD), Shona Langseth (Olmsted SWCD), Lauri Clements, Skip Langer, Michelle Stockness (Freshwater), Leigh Currie (MCEA), Dave Wall (MPCA), Carly Griffith (MCEA), Caitlin Meyer (Olmsted County/Tap In), Randy Hukriede (MPCA), Justin Watkins (MPCA), Chris O'Brien (Freshwater), Jackson Miller, Elizabeth Foster

To watch the Webex video recording of this meeting, please go to https://www.pca.state.mn.us/clean-water-council/meetings, or contact Brianna Frisch.

Regular Clean Water Council Business

- Introductions
- Approval of the November 20th meeting agenda and October 16th meeting summary, motion by Steve Christenson, and seconded by Dick Brainerd. Motion carries.
- Chair and Council Staff update:
  - Policy & Budget and Outcomes Committee Updates
  - Staff update:
    - November 27 in Fairmont, MN, there is a significant Clean Water Fund (CWF) grant going into the Fairmont Chain of Lakes Nutrient Treatment Train project. Members are welcome to attend.
    - The Impaired Waters List draft is out for public comment. Paul has been working with the Minnesota Pollution Control Agency (MPCA) Communications Team, which produced two impactful articles in the packet. A CWF Communications Plan is almost done.
    - Council member applications begin November 2023. Seven seats are open for reappointment.
    - Potential for a supplemental Clean Water Fund appropriation
      - There will be a budget forecast released December 6. The Council may want to provide recommendations for any supplemental request. The BOC could have a more intense discussion and bring forward possible recommendations to the full Council meeting in December.
  - The 2024 meeting calendar dates motion for approval by Dick Brainerd, seconded by Marcie Weinandt. Motion carries.

Strategic Planning: Review and Comment on First Draft *(Webex 00:50:00)*

- The packet has two versions. One is with collapsed headers to view actions and measures easily.
- Prior members helped to start this process earlier this year. After working on those initial drafts, more work was done to streamline, and create more consistency.

Discussion:

- Steve Christenson: What has changed since the prior version? *Answer:* There is something between the broad vision and goals and the action steps. We didn't really have the strategy to explain why we do what we do. There are more steps with measures. The last plan was the first one and done in a hurry.
- Tannie Eshenaur: What happened to the goal about how Minnesotans value water and act to protect it. I think the equity piece and social science piece could work well there. *Answer:* When it came to norms, there

is a lot under the surface water part in the last two pages. *Response from Tannie Eshenaur:* From a public health perspective we need to elevate it. It will help produce long lasting change.

- Jessica Wilson: Regarding fishable, swimmable, shallow lakes are often full of plants and people think the lake should be swimmable. People say they can't swim there because it is so full of plants, but we know the plants are important for water quality, so the swimmable gets confusing for people.
- Jessica Wilson: Under the first groundwater vision, under goal 1, one of the measures to reduce the risk of stormwater contaminants entering the water is for a measure of enhanced compliance provided for NPDES/MS4 permittees. I think we should strike this item. We should lean more into the stormwater research that is protective of groundwater. A key strategy for stormwater management right now is infiltration, which is blind to the groundwater risk. If you are compliant and being a rockstar with your MS4 permit, it does not mean anything for groundwater protection because there is a gap between those two programs right now, and they are not talking to each other. People can be fully complaint with an MS4 permit, and potentially cause groundwater contamination. Those are not aligned right now. It is a poor measure for reducing risk of stormwater contaminants. The permit also focuses on things that are typically surface water pollutants. There is also a spatial component to the MS4 permit. The compliance for this permit is a way away from focusing on the right activities for groundwater, that it should not be used as a measure. It is measurable, but it is the wrong measure. *Response from Paul:* We will work on that together before the next meeting.
- Tannie Eshenaur: The fish consumption issue is an ongoing one. Fishable does not mean that the fish are safe to eat, or for Tribal Nations to be able eat as much fish as they would like and protect children.
- Dan Huff, Minnesota Department of Health (MDH): I wanted to highlight the need for drinkable. One of the major selling points when this amendment was passed was providing safe drinking water in the state. We should prioritize it. Nitrate discussions are important. The two largest cities (Minneapolis and Saint Paul) use surface water, along with other cities. Most drinking water in Minnesota is groundwater. There are significant issues with our water regarding nitrates, PFAS, along with geological impacts like arsenic. Focus on drinking water is something that is paramount to the MDH, because it is a health driver to protect Minnesotans. Water is precious, and it is about drinkability.
- Rich Biske: Regarding process, having the measures are important for people to look at. We have visions and goals. Would there be an expectation to have desired outcomes in this document? How would we describe those outcomes in a way for actions? So, the actions could achieve the stated goal. Should we be reviewing this with that mindset? There are ambitious visions and goals within this document. I don't know if the actions add up to it. How do we want to interpret it as reviewers for the next round.
    - Dick Brainerd: We need to have the measurements and outcomes. We need to know how we are accomplishing these issues that we have noted.
    - Victoria Reinhardt: One of the reasons we changed the way we measured things and placed them into buckets, was to help legislators, and the public, understand what we were trying to accomplish. It has been successful, especially with the legislators. It is a more streamlined way to provide an evaluation. You want to be able to show where the money is going, and where the outcome is. One reason for the amendment's passage was for drinking water. We had to fight for the MDH to be at the table on drinking water. It didn't happen automatically. People are paying more attention to it now, but it was not an easy task. I agree with Dick, we need to have evaluation. We need to show where the progress has been made. It is ongoing work. and we need to show the successes.
    - Dan Huff: I appreciate the conversations on measurement. We cannot measure progress without a baseline. One of the great things about the CWFs we have used it to get a more robust surface water monitoring program in the state that gives us this baseline, to help measure. What we have not done is measure groundwater, especially drinking water wells, the private wells. About twenty percent of Minnesotans drink water out of wells. It is an equity issue. We have no clue what people are drinking because we don't regularly monitor. We have done a lot for surface water, but we are in the dark on the private well water. We don't know what they are drinking. To measure progress, we need to start now, to know what people are drinking.

Review and Discussion of U.S. EPA Response Letter to State Agencies *(Webex 01:41:00)*

- Clean Water Council Staff

- A group of non-governmental organizations in Minnesota submitted a petition to the Environmental Protection Agency (EPA) for emergency declaration to resolve issues related to nitrates in private wells in Southeastern Minnesota. The Council is familiar with nitrates in agriculture. There is no need to have a debate on what farmers are, and are not doing, because we are investing a lot of money in farmers reducing in this area, and it is paying off, but is a long-range issue. The EPA has responded to state agencies with specific requests for a workplan to deal with the immediacy of getting people safe drinking water. It does not talk about the source, but rather what to do right now.
- Carly Griffith and Leigh Currie from the Minnesota Center for Environmental Advocacy have been invited here today to present on the petition to the EPA. Then, we can have the state agencies respond with what is being done in response to this item.
- We have a state-of-the-art facility for testing. There is a lot of data being collected in Minnesota on this area, which may be one of the reasons we have the petition in the first place.

- Agencies *(Webex 02:08:00)*
  - Dan Huff, MDH: The MDH is very committed to protecting drinking water for all Minnesotans. Twenty percent of Minnesotans drink water from wells. It is important that they have safe drinking water.
  - Tannie Eshenaur, MDH: We see three clear timelines outlined. 1) An immediate response, where EPA is asking for providing notification to people where we know the wells have tested at higher levels of nitrates and complete a mass media campaign to alert people of the issue. This is also to provide an alternative to the water. They do not define a way to provide the alternative to water, which could be bottled water or perhaps a tank. We have begun looking at the logistics and costs with the Minnesota Department of Agriculture (MDA) and MPCA, we are. Nitrate is an acute health risk. 2) A public health timeline. The EPA outlines seven steps. We have been meeting regarding a response within thirty days (the first week of December) that provides the longer workplan. One task is to identify private wells within those eight counties. There are good records for wells constructed after the 1974 well code. There are possibly 50 percent of wells not included in the well index, and they could be contaminated with nitrates. It is a reasonable EPA request to identify those wells. They also ask to provide free testing and free remediation where needed. They want us to have public access to records. They also want to have quarterly reporting. For the public health timeline, we would like to take what has been learned from the CWF funded pilot test in Olmsted County and use the strategies in all eight counties. This would be expanded from nitrate t, bacteria, arsenic, manganese, and lead at slightly more expense. They want to offer a range of responses when contamination is above health risk limit, including bottled water, repairing a well, new well, connecting to a community water supply, etc. They want to be wise in how they spend their public dollars. They want to work through local partners.
  - Margaret Wagner, MDA: MDA has made significant investments to address and accelerate this work. First, they updated the statewide strategy or blueprint to address nitrates in groundwater to make sure they have identified the community's capacity for updated and accurate information. This foundational science prioritizes the work needed. Free nitrate testing was offered to 90,000 private well owners statewide. In the southeast, there were 21,000 well owners and over 8,700 completed a well test through that program as recently as 2016-2019. MDA developed and are implementing the groundwater protection rule to restrict fall application of commercial fertilizer on about 1.1 million acres in the southeast (about 70 percent). They use groundwater modeling to work on solutions at the local level. There is a call to accelerate this work. This work takes resources, but we are making sure we are matching the need with the most vulnerable populations as well. They are in a good position to work with the local partners.

Presentation on Petition to U.S. EPA on Private Wells in SE Minnesota, by Carly Griffith & Leigh Currie, Minnesota Center for Environmental Advocacy *(Webex 01:48:00)*

- Nitrate concentration in Minnesota is concentrated in groundwater areas, like those in karst bedrock or sandy soils, in particular Southeastern Minnesota and central sands. Today, they emphasize that current resources and regulatory support available for private well users is inadequate.
- The federal limit of nitrates is 10mg/L set in 1962 to protect against blue baby syndrome. The increased risk for various cancers (i.e., colorectal, thyroid, ovarian) and adverse birth outcomes (neural tube defects, premature birth) can be from levels as low as 3-5 mg/L. The EPA has recently announced it will undertake a human health assessment of nitrate and nitrite that was suspended in 2018 under the Trump Administration.

This updated assessment by late 2023 will widen the scope beyond blue baby syndrome to look at both the cancer risk and the effects on the reproductive systems, metabolism, development, thyroid, and blood.

- Due to the hydrogeological sensitivity of the karst region, we know that surface land use quickly shapes what contaminants are present in the groundwater supply. There is a high concentration of feedlots and corn and soybean production in these eight counties. There are approximately 3,200 feedlots of different sizes. The state permits those with over 1,000 animal units. The graphic reveals those feedlots. Inspections can be few (with a goal of one time a year for individual permits, and two times every five years for the general permit). There are no requirements to monitor groundwater for subsurface discharges in land application areas in the permit. We would support additional staff and resources if it gets us to clean water. There may be a need to broader transition to best management practices (BMPs) across the landscape that incorporate those smaller and mid-size operations and could be supported through targeted grant programs for cost share tied to nutrient management requirements.
- There are different state agencies involved in this area. The quality falls to the MDH (i.e., public water supply, well construction, and health risk assessments), the MPCA (Chemical release, industrial pollutants, chemicals from consumer products), and the MDA (pesticides and fertilizer). The Minnesota Department of Natural Resources (DNR) looks at water supply/availability, along with the natural resources and ecosystem functions.
- Under the Safe Drinking Water Act Section 1431, the EPA retains emergency power to abate present or likely contamination of a public water system or underground source of drinking water if it received "information" that the contamination "may present an imminent and substantial endangerment to the health of persons" and "appropriate State and local authorities have not acted to protect the health of such persons." Any underground aquifer could be protected under this authority.
- The EPA response:
  - Create a plan to communicate among the state and local governments to ensure a coordinated response.
  - Identify all private wells in karst region, including pre-code wells.
  - Provide education and outreach to impacted well owners and residents about contamination and testing.
  - Provide free alternative drinking water when wells test above the MCL for nitrate.
  - Maintain public records about the problem and the plan to address it.
  - Provide quarterly progress reports to the EPA.
- Regarding public health, the EPA leaves it to state and local governments to respond. At the state and local level things that can be done include:
  - Coordinated communications plan to inform residents of health risks and how to test.
  - Hazard assessment with a focus on pre-code wells.
  - Education and outreach partnership with local health care providers.
  - Laboratory analysis of water samples
  - Permanent fund source for private well mitigation. This fund source should be tied to an input that is one of the drivers of the contamination that is seen. This is an area that the CWFs could be included.
- The EPA was not as explicit in prevention. However, some input on prevention:
  - Revise feedlot rules for vulnerable groundwater areas like the karst.
  - CAFO General Permit
  - Township-scale nutrient management recommendations under NFMP
  - Local controls like animal unit caps to limit the growth of feedlot operations.
  - Broader adoption of BMPs like cover crop and diverse crop rotation.
  - Grant programs to increase manure storage capacity, incentivize AMMPs for small to midsize feedlots.

Discussion:

- John Barten: In terms of the monitoring costs, do we have to do that much monitoring to define a regional problem? Is it possible to do that and how much monitoring? Looking at 21,000 private wells, can we monitor some of them? *Answer:* I would not want to speculate on the modeling that would need to be done, but from a policy side, if I am going to invest public dollars in some sort of treatment, I would want the results from an accredited lab to tell me the nitrate level before investing public dollars. A reverse osmosis installment is not a slam dunk of a solution, because they need to be maintained. It also takes training to properly maintain a reverse osmosis system. The MDH's virus study revealed associations between pathogens in the source water and people having gastro-intestinal illness. There was a conclusive relationship between having a water softener or having a reverse osmosis system and having gastro-intestinal illness. Those treatment devices are

serving as incubators for viruses. So, I would be careful about having a public health intervention based on general aquifer nitrate concentrations. From an environmental perspective, the improvement over time, it would be appropriate. There is variability in the landscape, some geologic features, so it is important for individuals to know the water from their well is tested.

- Steve Christenson: Could you recap the thinking on the solutions for those 1,058 wells in the zone for the next ninety days. *Answer:* So far, we have talked about the three broad principles outlined in having some kind of menu of options addressing. We have not gotten to a decision yet, looking at reverse osmosis systems versus bottled water. The vulnerable populations are expectant parents and infants under one year of age. There is a need to have a short-term solution for bottled water and follow with a long-term solution that will be most effected for them long term. In a way, you may be kicking the can further down the road.

Discussion on Private Well Initiatives, by Michelle Stockness, Executive Director, Freshwater, and Jeff Broberg, Minnesota Well Owners Organization *(Webex 02:53:00)*

- We understand this is complicated. There is multi-agency jurisdiction. We are here to encourage putting the big picture together. There are many people working on this landscape: state agencies, statewide initiatives, county and townships, as well as individuals.
- The US water alliance looked at three pillars for advancing water equity. 1) Ensure all people have access to clean, safe, affordable water service. 2) Maximize the community and economic benefits of water infrastructure investment, and 3) Foster community resilience in the face of a changing climate.
- Call to action: We challenge you to grow and coordinate current private well policies and program to show national leadership for public health and safe drinking water in rural communities.
- I recommend reading the petition, and EPA letter, as well as the Safe Drinking Water Act. Water is a responsibility, not a right. There are two significant colliding trends. The rising level of nitrates in southeast Minnesota, which is conflicting with good work being done with nitrates as well. Additionally, we have a better understanding of the karst region, with dye tracing. However, we lack the groundwater monitoring currently. Safe drinking water is an immediate need, and there is empathy needed for those people affected. Looking at what we can do for them is appropriate. There is a need to place billboards, bring communities together to work on this well testing. We need to test and treat. Minnesota needs to be a leader in this area.
- Proposed Ideas:
  - Program management:
    - Create a new Clean Water Council program to help with coordination, tracking, funding.
    - Collaborate and clearly delineate roles, responsibilities, and budget needs for a permanent program.
    - The MDH should be the lead agency due to public health.
    - Hire outside entities to help manage the process, fill staffing needs, grow in size and speed.
  - Policy:
    - Strengthen MDH authority to lead communication of public health risks for aquifers.
    - Include regional karst areas as GWPAs and DWSMAs in statute.
  - Education:
    - Community-based education via community partners such as U of M Extension, Soil and Water Conservation Districts (SWCD), Minnesota Well Owners Organization (MNWOO), or Minnesota Water Stewards.
    - Communicate with tribal governments, cities, county and townships boards, civic groups, faith groups, local public health officials.
  - Inventory:
    - Work with community partners to locate wells and owners.
    - Communicate with tribal governments, cities, county and township boards, civic groups, faith groups, and local public health officials.
  - Testing:
    - Tests to all in one-year.
    - Organize free well screening and testing with local partners.
    - Lead with public health view.
    - Offer technical guidance and follow-up resources (i.e., simplelab).
  - Treatment and support:

        - Community-based education to interpret water quality results, treatment needs, ongoing well operation, and maintenance.
        - Provide grants for treatment or alternate water supply.
    - In summary, we would like to see coordination and clarifying roles and responsibilities with the MDH leading. We want to see the use of outside entities to speed up and grow the process. We also would like to see work being done with local community partners to provide trusted information.

Discussion:

- Steve Christenson: I am curious on your perspective on rural water systems and their role in addressing this issue? *Answer:* There should be a strategic plan to see what are the most economically options available. The inventory and impact analysis are needed first. We cannot drill out of this problem for many households. We need to find the safe drinking water option that is going to work for these households. The rural water is probably the top tier of protection.
- Dick Brainerd: We react to crisis, and we have one. It is in the press. The expectation is there to have something happen. What can the Council do to help today?
- Brad Gausman: The health of children is a priority to many. Is there an opportunity for schools to get involved? The conversations around the table, may bring these ideas forward. *Answer:* Yes, it is well known about the kids bringing home the ideas (i.e., recycling).
- John Barten: What degree are you envisioning for the efforts here. *Answer:* I would like to see a permanent program, where there are hand-offs, and roles and responsibilities are laid out well. It needs to start with the message the EPA put out there: imminent health risk in the aquifers.
- Victoria Reinhardt: When we talk about the state giving the responsibility to counties, there is not money that comes with that. A lot of what is being talked about here regarding the wells, and the biggest problem – including testing the well, if you find out something is wrong with the well it will cost money to fix. Even folks on the median income levels are totally blindsided by the cost. There must be some way of encouraging upfront funding or a revolving fund account to borrow at a lower interest rate. The problem is not something you can plan for, because you find out that day. If the state is serious about it, they need to pony up some funding. If we are serious about it, we need to know where the money is to help fund it. The state can act, but if there is no money attached, it is an unfunded mandate. It is about the money.
- John Barten: If there is going to be an investment, there should be some mechanism to make sure the systems are properly used, maintained, and replaced. What assurance does the public have that we are not just throwing the funds down the well? *Answer:* This is so important and requires communication from those that trusted. Our initiative is to communicate to the health care groups. We want to set up meetings to share this update, so they can communicate with their people.
- Rich Biske: This is a complex issue. It has been building a long time. I am wondering about social costs. Does this merit an effort to consolidate information and put choices together. It may be a point in time to really focus and invest on something comprehensive. *Answer*: Some of you might remember some legislative proposals did not make it over the finish line. One was to fund more well screening clinics, one was to do testing for lead in private wells, as well as the House File 1806, where over a ten-year period the MDH tests for contaminants and offer income-based support. The Council at that time asked the MDH to build their pilot work into a ten-year plan. The two pilot grants have been analyzed, and we are on a second round of grants now for a phase two. These are things we have learned, included in the new RFP, and working towards building that sustainable system. Parts of this are included in our drinking water action plan. It may not line up with the EPA timeline. There needs to be a reasonable step by step action, working with local governments, building that capacity, to set up long term success.
- Kelly Gribauval-Hite: Some people cannot afford the maintenance or even the initial cost. *Answer:* We hear people spend money on bottled water, and it is not good. It is expensive.
- Steve Christenson: We should do something. Traditionally the CWFs have been used for water testing items. You talked about the need to test wells. If we had supplemental appropriations available, is it something the MDH could use to do more work. *Answer:* I think so, we are currently working on our budget with our state agency colleagues. We have between $4-5 million, and we need to sharpen our pencils to get more done. This is only for the first year. So, additional funds would be helpful.

Public Comments *(Webex 03:53:00)*

- Rylee Hince: Working in southeast Minnesota, I have a lot of knowledge of this issue and of water. I brought my baby with to an event and stayed at an Airbnb. This was on karst area. I knew the property had high nitrates. It was the first time that I thought I cannot drink this water, I cannot have this pass along to my baby. I have never had that experience before because I have always lived on city water. As a recent homeowner, with all the things that go into that and family impacts, if you didn't know to check the water, how you could be impacting your family, especially babies and young children. Wisconsin did have a baby that died from high concentrations of nitrates. If I didn't have this knowledge, what impact it could have on my child's life. Thinking about the point of sale and testing at that time, especially if they have children. Knowing ahead if you can pay for fixing the water, would impact buying that property. Also, the residence time, and do we have a backup plan if we cannot afford the remediation costs, if the nitrate levels continue to go up. We need to make sure we have clean water for the long term.

Adjournment *(Webex 04:02:53)*

Meeting Dates for Clean Water Council for 2024

DRAFT As Proposed on December 18, 2023

Full Council (3rd Monday with Exceptions for Holidays)	Budget & Outcomes Committee (1st Friday) with Exceptions for Holidays	Policy Committee (4th Fridays) with Exceptions for Holidays)
9 am to 12:30 pm (if by WebEx) 9 am to 2 pm (if in person)	9:30 am to 12:30 pm (if WebEx) 9:30 am to 2 pm (if in person)	9:30 am to 12:30 pm (if WebEx) 9:30 am to 2 pm (if in person)
January 22 (MLK Day 1/15)	January 5	January 26
February 26 (Prez Day 2/19)	February 2	February 23
March 18	March 1	March 22 (during Ramadan)
April 15	April 5	April 26 (during Passover)
May 20	May 3	May 17 (Memorial Day is 5/27)
EXTRA DAY HERE June 3		
June 17	June 7	June 21
July 15	July 12 (Avoids 7/4 holiday)	July 26
August 19	August 2	August 23
September 16	September 6	September 27
October 21	October 4 (note: Rosh Hashana is 10/3-4)	October 25
November 18 (Thxgvg is 11/28)	November 1	November 22
December 16	December 6	December 20 (1 week early)

Key changes incorporated into second draft of CWC Strategic Plan

December 18, 2023

- Added fourth section on how Minnesotans can protect their water (requested by Council)
- Clarified the role of the Council and Clean Water Fund on "enhanced compliance" for stormwater (with Council member input)
- Some measures for drinkability standards added (MDH suggestion
- More refined language on groundwater sustainability (DNR input)
- Dropped groundwater recharge items from Met Council (Met Council input)
- Language added to note that CWC/CWF activities support a goal but may not be the only source to meet the goal (compared to regulation, for example) (Council member question)
- Re-vamping of private well mitigation (should require Council discussion today)
- Water storage added (Council member input)
- BWSR will still do its own revised Nonpoint Priority Funding Plan (BWSR input)

Would the Council like to discuss the following finishing touches?

- Private well mitigation—need some guidance on precedent, scope, etc.
    - Current role: Testing of tens of thousands of private wells in vulnerable areas, 10-year plan for offering testing for all private well users for five contaminants.
    - Pilot project: Provide mitigation for selected households based on income.
    - Potential role:
        - Provide mitigation for selected households statewide based on income or on risk (e.g., families with infants)
        - Seek additional funding sources (or at least put limits on use of the CWF)
- How do we decide what receives "enhanced compliance"? Examples:
    - Buffer implementation funds to help landowners get in compliance with buffer law
    - Assistance to municipalities to better comply with stormwater permits
    - Increased SSTS inspection by counties
    - Support of the Groundwater Protection Rule
    - Listed in allowable use of the CWF in statute as "providing funds to state agencies to carry out their responsibilities, including enhanced compliance and enforcement."
- Does the Council want a say in how BWSR sets the funding formula for Watershed-Based Implementation Funding (WBIF) and other nonpoint priority funding since the amounts are now so large?
- BWSR indicates that project tracking of comprehensive watershed management plans will be done by local partners, not the state. Would you like to discuss?

Draft Clean Water Council Strategic Plan for 2024-2028

18 December 2023

The Clean Water Council is a state advisory council created as part of the Clean Water Legacy Act[i] (CWLA) in 2006. The Council's purpose is to advise on the implementation of the CWLA, and to foster coordination and cooperation among state agencies and other stakeholders and partners. In addition, in 2009, the Council was assigned the task of recommending how to use the Clean Water Fund, which is one-third of the dedicated sales tax revenue generated from the Clean Water, Land and Legacy Amendment.

This strategic plan is not a comprehensive plan for all water activities in Minnesota. It focuses on activities within the Council's statutorily defined roles for the Clean Water Legacy Act and the Clean Water Fund. Purposely left out of the plan are most point source activities that are governed by permits or other requirements or are supported by other major funding sources (landfills, large feedlots, manure management plans, leaking storage tanks, PFAS work funded by 3M settlement, etc.) Therefore, the strategies and actions listed under each goal in the plan below will not be the only activities in Minnesota to meet the goals.

Several previous efforts provide the foundation for this plan, including Minnesota's *Nutrient Reduction Strategy* (NRS), the 2014 *Clean Water Road Map*, the 2011 *Minnesota Water Management Framework*, and the *Nonpoint Priority Funding Plan* produced by the Board of Water and Soil Resources, and others.

Much of the plan focuses on priorities for using the Clean Water Fund (CWF). In January of odd-numbered years, the Council must submit recommendations for the use of the CWF to the Legislature.

Statutory guidance and planning since 2008 have outlined several criteria for prioritizing the use of the CWF. Primary among them is constitutional language that the CWF must *supplement* existing funding and not *supplant* it.

Groundwater Vision: Groundwater is clean and available to all in Minnesota.

Goal 1: Protect groundwater from degradation and support effective measures to restore degraded groundwater.

- Strategy: Develop baseline data on Minnesota's groundwater quality, including areas of high pollution sensitivity.
    - *Action: Complete groundwater atlases for all Minnesota counties.*
        - Measure: All Part B atlases completed by 2038.

- *Action: Monitor ambient groundwater quality throughout the state.*
  - Measure: Updates from MPCA Groundwater Monitoring Program.
- *Action: Characterize nitrate and pesticide contamination in vulnerable aquifers.*
  - Measure: Vulnerable aquifers mapped via Township Testing Program, Central Sands Private Well Network, and Southeast Minnesota Volunteer Nitrate Monitoring Network.
- *Action: Characterize natural and synthetic contaminants in groundwater.*
  - Measure: Locations with high concentrations of natural contaminants mapped.
  - Measure: Groundwater monitoring performed as appropriate for contaminants of emerging concern.

- Strategy: Develop and carry out strategies that will protect and restore groundwater statewide.
  - *Action: Complete plans and fund activities for protection and restoration of groundwater statewide using a major watershed scale*
    - Measure: Groundwater Restoration and Protection Strategies (GRAPS) completed for all 60 One Watershed One Plan boundaries by YEAR.
  - *Action: Reduce risk of bacteria in groundwater.*
    - Measure: 80 percent compliance rate maintained for subsurface septic treatment (SSTS) systems with a stretch goal of 90 percent, as recorded in MPCA's annual SSTS report.
    - Measure: Financial assistance provided for low-income households to replace and repair individual SSTSs.
    - Measure: Demand met for under-sewered or unsewered small communities for long term solutions using Small Community Wastewater Treatment Program's intended use plan.
  - *Action: Reduce nitrate contamination of groundwater.*
    - Measure: Nitrogen Fertilizer Management Plan implemented in priority townships with vulnerable groundwater by assessing agricultural practices, forming local advisory teams, and publishing recommended practices that are adopted on 80% of row crop acres excluding soybean by year 2030, and implemented in all remaining townships by year 2034.
    - Measure: Alternative land management activities supported that protect groundwater such as easements, perennials, and continuous living cover.
    - Measure: Guidelines regularly updated to understand impacts of nitrogen application.
    - Measure: Support provided for irrigation management outreach, update to state irrigation BMPs, and irrigation water management endorsement from Minnesota Agricultural Certification Program (MAWQCP).
    - Measure: No additional wells exceed maximum concentration levels.
    - Measure: Nitrate levels declining in private well testing by 2034.
    - Measure: Nitrate levels declining in 100% of public water wells by 2030.

- *Action: Reduce risk of pesticide contamination in groundwater.*
  - Measure: Ambient groundwater quality wells maintained through MDA pesticide monitoring program.
  - Measure: Outreach, demonstration sites, and technical assistance provided for recommended pesticide BMPs.
- *Action: Reduce risk of stormwater contaminants entering groundwater.*
  - Measure: Stormwater research that is protective of groundwater supported, with findings scaled to meet state needs.
  - Measure: Assistance provided to NPDES/MS4 permittees to enhance compliance.
  - Measure: Priority unused groundwater wells that present a risk to drinking water aquifers are sealed.

Goal 2: Ensure groundwater use is sustainable and avoid adverse impacts to surface water features due to groundwater use

- Strategy: Support ongoing monitoring of groundwater quantity.
  - *Action: Maintain network of long-term groundwater monitoring wells and add wells as needed.*
    - Measure: 50 monitoring wells installed annually.
  - *Action: Identify groundwater-dependent lakes; streams; calcareous fens, and wetland complexes.*
    - Measure: Data provided to water planners for development of WRAPS, GRAPS, and comprehensive watershed management plans.
- Strategy: Develop a cumulative impact assessment and support planning efforts to achieve a sustainability standard for groundwater.
  - *Action: Prioritize areas of high water use intensity.*
    - Measure: Groundwater Management Areas (GWMA), highly sensitive areas, and areas of high water use intensity from agricultural irrigation are designated.
  - *Action: Implement water efficiency BMPs, water use reduction, and irrigation water management in areas of high water use intensity by agricultural irrigators, highly sensitive areas, Groundwater Management Areas (GWMAs), and highly vulnerable Drinking Water Source Management Areas (DWSMAs).*
    - Measure: DNR has tools needed to address conflicts on use of groundwater for economic and ecological purposes.
    - Measure: Monitoring wells have upward trend or no change in all six groundwater provinces.

- Strategy: Identify policy options that will accelerate progress to achieving a sustainable groundwater standard.
    - *Action: Clean Water Council Policy Committee biennial policy recommendations.*

Drinking Water Source Protection Vision: Drinking water is safe for everyone, everywhere in Minnesota.

Goal 1: Public Water Systems--Ensure that users of public water systems have safe, sufficient, and equitable drinking water.

- Strategy: Identify and reduce risks to drinking water sources by investing in technical training, planning, coordination, and source water protection grants.
    - *Action: Assist public water suppliers in completing Drinking Water Source Protection Plans (DWSPPs) and support implementation projects listed in the plans.*
        - Measure: All 900+ DWSPPs complete for groundwater public water systems.
        - Measure: All source water assessments for 23 surface water systems complete.
        - Measure: Source water protection plans complete for non-community public water systems.
        - Measure: Funding available for half of budget requests in DWSPPs.
    - *Action: Provide goals for drinking water protection.*
        - Measure: Statewide drinking water plan complete.
- Strategy: Support the Ground Water Protection Rule (G).
    - *Action: Support implementation funding and technical assistance to reduce nitrate in DWSMAs that are Level 1 and Level 2 under the GPR.*
        - Measure: Public water suppliers at Level 1 or Level 2 under the GPR do not exceed the drinking water standard for nitrate by 2034.
- Strategy: Support prevention efforts to protect groundwater in DWSMAs.
    - *Action: Fund protective actions that assist public water suppliers in meeting safe drinking water levels.*
        - Measure: Approximately 400,000 acres of vulnerable land surrounding drinking water wellhead areas statewide are protected by 2034.

        - Measure: Landowner adoption of practices that protect drinking water through technical assistance, conservation equipment support, financial assistance, easements, drinking water protection/restoration grants, targeted wellhead protection grants, continuous living cover, soil health grants, etc.
- Strategy: Support prevention and management of newly identified contaminant risks.
    - *Action: Fund Contaminants of Emerging Concern (CEC) program.*
        - Measure: At least 20 chemicals are screened each biennium.
    - *Action: Fund adequate monitoring and assessment activities to examine emerging risks.*
        - Measure: River and lake monitoring assessment, ambient groundwater and drinking water monitoring supported, with enough contingency for rapid response.
- Strategy: Identify policy options that will accelerate progress to achieving federal safe drinking water standards.
    - *Action: Clean Water Council Policy Committee will make annual policy recommendations.*

Goal 2: Private Water Supply Wells—Ensure that private well users have safe, sufficient, and equitable access to drinking water.

- Strategy: Identify risks to and fund testing of private well water.
    - *Action: Support a ten-year effort to give every private well user the opportunity to test for five major contaminants, with an initial focus on areas most vulnerable to contamination.*
        - Measure: Private well testing offered for 10 percent of private well users each year for 10 years.
- Strategy: Support selected mitigation activities for private well users.
    - *Action: Assist all well users with information on how to achieve safe drinking water.*
        - Measure: All private well users offered education on mitigation options as needed.
    - *Action: Assist qualifying low-income households and households with vulnerable populations to mitigate contaminants, such as well replacement, water treatment systems, etc..*
        - Measure: Grant program reports from MDH.
    - *Action: Provide favorable financing to qualified households to mitigate contaminants.*
        - Measure: Loan program report from Agricultural Best Management Practices Loan Program from MDA.
- Strategy: Identify policy options that will accelerate the reduction in the number of unsafe private wells.
    - *Action: Clean Water Council Policy Committee will make annual policy recommendations.*

Surface Water Protection and Restoration Vision: Minnesotans will have fishable and swimmable waters throughout the state.

Goal 1: Monitor, assess, and characterize Minnesota's surface waters.

- Strategy: Maintain consistent funding for a statewide monitoring system.
  - *Action: Continue to monitor and assess on 10-year cycle and for emerging contaminants.*
    - Measure: Completion of second monitoring and assessment cycle.
    - Measure: Reports on contaminants of emerging concern as needed or requested.
  - *Action: Complete Total Maximum Daily Load (TMDL) reports as needed.*
    - Measure: Publication of TMDL reports by the MPCA.

Goal 2: Protect and restore surface waters to achieve 70% swimmable and 67% fishable waters by 2034[ii] via by prioritizing and targeting resources by major watershed.

- Strategy: Identify and refine strategies required to meet water quality standards in each HUC-8 watershed.
  - *Action: Review and revise previously completed Watershed Restoration and Protection Strategies (WRAPS)*
    - Measure: Completion of second generation of WRAPS.
  - Action: Quantify water storage needs and opportunities within each HUC 8 watershed.
    - Measure: Acre feet storage goals are set for each watershed by 2026.
    - Measure: Storage opportunities and hydrograph estimates are complete by 2028.

- Strategy: Prioritize waters for protection and restoration using comprehensive watershed management plans (One Watershed One Plan or other approved plans)[iii] updated every ten years.
  - *Action: Support local efforts to support those impaired waters that are closest to meeting state water quality standards.*
    - Measure: Lists of "barely impaired" waters shared with local watersheds as they prepare comprehensive watershed management plans or other approved plans.
    - Measure: List of "barely impaired" waters that show improving trends on an annual basis.
    - Measure: Percentage of lakes meeting goal for recreation activities reaches 70 percent by 2034.
    - Measure: Percentage of rivers and streams meeting healthy fish community values reach 67 percent by 2034.

- *Action: Support efforts to protect those high-quality unimpaired waters at greatest risk of becoming impaired.*
  - Measure: Comparison of "nearly impaired" waters from across the state identified by WRAPS.
  - Measure: Comparison of "nearly impaired" waters list with prioritized waters in comprehensive watershed management plans or other approved plans.
  - Measure: List of "nearly impaired waters" as well as healthy waters that see no change or no degradation on an annual basis.

- *Action: Restore and protect water resources for public use and public health, including drinking water.*
  - Measure: List of waters with high public use that show improving trends or no degradation over time.
  - Measure: List of projects that show connection to Drinking Water Supply Management Areas (DWSMAs).

- *Action: Track completion of activities for priorities in each comprehensive watershed management plan*
  - Measure: Pilot tracker tool developed to show implementation progress against goals, followed by regional and then statewide deployment.

Goal 3: Protect and restore surface waters to achieve 70% swimmable and 67% fishable waters by 2034 via through statewide, regional, or issue-specific programs that help meet water quality goals but are not necessarily prioritized and targeted according to geography.

- Strategy: Enhance compliance for regulatory programs to accelerate progress
  - *Action: Maintain compliance rates for subsurface sewage treatment systems (SSTS) at 80 percent with a stretch goal of 90 percent.*
    - Measure: MPCA Annual SSTS Report.

  - *Action:Reduce risk of stormwater contaminants entering surface water.*
    - Measure: Point source discharge permits incorporate gains from stormwater pollutant reductions.
    - Measure: Minnesota Stormwater Manual updated regularly.

  - *Action: Support small unsewered or under-sewered communities for long-term wastewater solutions.*
    - Measure: Small or no backlog for Small Community Wastewater Treatment.

  - *Action: Support wastewater treatment plants and stormwater projects seeking to meet tighter Total Maximum Daily Load requirements.*
    - Measure: Adequate support of Point Source Implementation Grant (PSIG) program.
  - Action: Ensure adequate monitoring of NPDES permits.

- Strategy: Support competitive grants for protection and restoration activities.
    - *Action: Provide opportunities for competitive grants that meet statewide priorities.*
        - Measure: Annual grant funding round by BWSR for competitive grants to address statewide priorities.
- Strategy: Identify policy options that will accelerate the protection and restoration of surface waters.
    - *Action: Clean Water Council Policy Committee will make annual policy recommendations.*
        - Measure: Biennial policy recommendations.

Vision: All Minnesotans value water and take actions to sustain and protect it.

Goal 1: Build capacity of local communities to protect and sustain water resources.

Goal 2:

- Strategy: Maintain and increase capacity of Minnesotans to improve water quality.
    - *Action: Support local efforts to engage farmers in water quality efforts.*
        - Measure: Number of farmers and acres enrolled in Minnesota Agricultural Water Quality Certification Program, with a target of 5,100 farms and 6.5 million acres by 2030.
        - Measure: Number of acres with continuous living cover, with a target of five million acres by 2034.
        - Measure: Targets for nutrients in the state's Nutrient Reduction Strategy.
        - Measure: Number of acres enrolled in permanent easements.
        - Measure: Increasing number of renters and non-operating landowners participating in water quality efforts.
        - Measure: Net increase in number of structural conservation practices.
    - Action: Engage private well users to test their wells for five major contaminants.
        - Measure: Higher percentage of private well users choose to test their wells and mitigate any issues.
    - *Action: Engage non-traditional audiences with water planning and implementation.*
        - Measure: Collaborations with state agencies and their equity efforts.
        - Measure: Evaluation of We Are Water exhibit and its outreach.
        - Measure: Non-state or local government interested parties participating in local water management planning and watershed implementation funding requests.

- *Action: Support local efforts to engage lakeshore property owners and private landowners.*
  - Measure: Number of property owners enrolled in Lake Steward program.
  - Measure: We Are Water annual report.
  - Measure: Additional in-lake treatment and restoration projects proposed and funded for competitive grants.
  - Measure: Protection of 100,000 acres and restoration of 100,000 acres in the Upper Mississippi River headwaters basin by 2034.
  - Measure: Council recommends shoreline protection policy.
- *Action: Engage chloride users.*
  - Measure: Number of snow removal contractors and public works departments who are Smart Salting certified and make measurable reductions in chloride use.
  - Measure: Number of communities educating their residents about inefficient water softeners increases.
  - Measure: No increase in chloride concentration in metro rivers and streams over time.
- *Action: Engage water managers statewide.*
  - Measure: SWCDs, WDs, WMOs, drainage authorities, highway departments, municipalities, and counties have the skills necessary to carry out programs to meet water quality goals.
- *Action: Support innovative efforts that accelerate progress toward clean water goals.*
  - Measure: Acres of income-generating continuous living cover planted.
  - Measure: Stormwater research identifies scalable solutions for pollutant reduction to assist MS4 permittees.
  - mussels, culverts
- *Action: Plan for funding resilience after expiration of Legacy Amendment in 2034.*
  - Measure: New funding sources (e.g., fees, bonding, general fund) identified that would be required to maintain support of critical programs.

[i] Minn. Stat. 114D.30.

[ii] The 2014 Clean Water Road Map is the source of these targets.

[iii] While most watersheds in the state now use One Watershed One Plan, there are also approved plans used under previous statutes, especially in the metro area. "Comprehensive local water management plan," "comprehensive water plan," "local water plan," and "local water management plan" mean the plan adopted by a county under sections 103B.311 and 103B.315. “Watershed management plan” is defined in sections 103D.401.

MINNESOTA

December 1, 2023

Debra Shore
Regional Administrator and
Great Lakes National Program Manager
U.S. EPA Region 5
77 West Jackson Boulevard
Chicago, IL 60604

Dear Ms. Shore:

Safe drinking water is essential for the health and well-being of all Minnesotans, and while we have made great strides in recent decades to ensure the safety of drinking water in our state, there are a variety of threats that must be acknowledged and addressed by all levels of government. With that in mind, we thank you for your letter dated November 3, 2023. In this response, we outline Minnesota's collaborative plan to address nitrate contamination in aquifers in southeast Minnesota that serve as sources of drinking water and identify opportunities for federal-state partnership to accelerate that work.

In Minnesota, authorities and responsibilities for water are shared across several agencies in the Executive branch. The Minnesota Department of Health (MDH) is the lead public health agency and holds primacy for the federal Safe Drinking Water Act. Implementation of the Clean Water Act is the shared work of the Minnesota Department of Agriculture (MDA) and the Minnesota Pollution Control Agency (MPCA). Together with other state agencies and boards, these three agencies work in close collaboration to ensure actions are based on a deep understanding of water-related sciences and available data to ensure maximum effectiveness and efficiency. This collaboration has increased substantially since the advent of the Clean Water Fund in 2008, which enables the agencies to go above and beyond previous efforts to protect and restore Minnesota's waters for future generations.

We appreciate the work your agency has done to understand current state efforts to reduce inputs to, and concentrations of nitrate in, drinking water aquifers in southeast Minnesota. In discussions with your staff and in reading your letter, we understand that you are affirming the actions and programs currently in place, while directing the agencies to accelerate and expand the set of tools used to reduce nitrate inputs to groundwater.

We agree that nitrate in drinking water is an acute health risk for some Minnesotans. The majority of Minnesotans get their drinking water from community drinking water systems, and the news on this front is encouraging. Our implementation of the Safe Drinking Water Act with regard to public water systems focuses on going beyond compliance through education and technical support to prevent nitrate concentrations from reaching the level of a violation. In cases where this was not possible, the system notifies the public, and the MDH works with the system to return to compliance. However, there is ongoing concern about the 1.1 million Minnesotans who get their drinking water from private wells. As you are aware, aside from the Minnesota Well Code, which regulates the construction and sealing of wells, there are fewer statutory protections for Minnesotans who depend on these private wells.

As outlined in your letter, we intend to address nitrate contamination in three phases:

1. An immediate outreach program to again notify affected residents using private wells with known nitrate concentrations above the Maximum Contaminant Level and to provide alternate water to vulnerable populations,
2. A public health intervention to ensure safe drinking water for private wells users in the mid-term in which well owner participation is voluntary; and
3. Enhanced long-term environmental and conservation strategies to reduce nitrate concentrations in the aquifers that provide drinking water.

It should be noted that this increased level of activities will require redirection of current, limited resources and significant additional resources in the coming years. In the coming weeks, we will be reaching out to U.S. EPA Region 5 to discuss potential federal resources that can be provided to the State of Minnesota to support these efforts.

For the immediate response, MDH is working in partnership with MDA, MPCA, and local government partners to craft an outreach and public education program with consistent messaging, multiple delivery channels, and trustworthy messengers, all based on risk communication science. The communication program will include social media; news releases; paid advertisements; and brochures at childcare facilities, clinics, and Women Infants and Children program offices. Through a Clean Water Fund pilot grant to Olmsted County Soil and Water Conservation District (SWCD), a “Tap-in” collaborative of SWCDs and local public health agencies was developed in six of the eight counties included in the petition. We will work through this established local network to include the additional counties and strengthen their outreach and testing activities.

In addition, the agencies will use existing data from MDA’s Township Testing results, the initial water quality post-construction sample, and/or a local public health laboratory to identify private wells that exceed the health risk limit to notify affected residents and provide guidance

on appropriate treatment options. For vulnerable populations, pregnant people and infants under 1 year of age, we will provide vouchers for bottled water through clinics, faith communities, and other local partners as appropriate.

The details of the public health intervention are currently in discussion with the agencies, the Tap-in Collaborative, and other local partners. We expect to have a complete plan by January 15, 2024. The plan will include strategies to address the seven components outlined in your letter: coordination of government partners; identification of private wells; free testing, alternate water, and remediation where needed; robust communication and outreach; public access to data and plan progress; and quarterly reporting to U.S. EPA Region 5.

As EPA notes, Minnesota needs a long-term solution for reducing nitrate in our surface water and groundwater. We do have important elements of this solution in place.

- Minnesota manages surface waters through a robust watershed framework that has been in place since 2008. As of 2023, each watershed in the eight-county area covered by the petition has an approved comprehensive watershed management plan and will receive $9.5 million from July 2023 and through June 2025 to implement local actions to improve water quality. Pending future legislative appropriations, continuing funding may be available to them for several more years. Local government and landowners can apply for millions more in grants and loans to achieve nutrient reductions.
- Minnesota's Nutrient Reduction Strategy (NRS) was released in 2014 as a long-term framework to specifically address nitrate pollution affecting Minnesota water resources. The NRS includes: the state of nutrients in Minnesota; sources of nutrients in state waters; goals for reducing nutrients; specific strategies to promote and advance; and ways to track progress along the way to reaching the goals. The NRS is being updated based on new information, the latest science, and changing climate and land use. The revised NRS will be available in 2025 and will include additional approaches to scale up adoption of key practices for success, many of which are beneficial for reducing groundwater nitrate in geologically vulnerable areas. The NRS has spurred program advancements and investments on many fronts.
- MDA has developed the Nitrogen Fertilizer Management Plan to reduce nitrate levels in areas with vulnerable groundwater. The goal is to work with local farmers, at the township scale, to promote and adopt recommended practices to address local groundwater problems. MDA supports research and demonstration projects to inform the development of fertilizer best management practices (BMPs) and works directly with the agricultural community to adopt these practices.

- MPCA operates feedlot and wastewater permitting programs that regulate water discharges. Each program has recently incorporated permit requirements to address nitrate. The current National Pollutant Discharge Elimination System (NPDES) feedlot general permit (issued on February 1, 2021, and expires on January 31, 2026) includes two requirements that reduce nitrogen loss from soil to water. We are reviewing suggestions made by EPA and petitioners for inclusion in future feedlot permits. Where necessary, for many years wastewater permits have contained nitrogen discharge limits to protect drinking water. In 2024, the wastewater program will implement the Wastewater Nitrogen Reduction Strategy they developed with stakeholders this past year that includes specific action steps to achieve nitrogen reductions from wastewater facilities.
- In 2019, MDA began implementing the Groundwater Protection Rule, prohibiting fall application of commercial fertilizer on 71% of cropland (approximately 1.1 million acres) in southeast Minnesota in response to community water supplies with elevated nitrate. MDA is using state-of-the-art computer modeling tools to evaluate the environmental effects of different agricultural practices in different settings, including for the karst areas of southeast Minnesota. Computer modeling tools are helping to evaluate and select practices most protective of groundwater. MDA has convened local advisory teams and is working with farmers to adopt practices which will positively impact groundwater and drinking water in the region. If this is not successful, MDA could then move to further regulation.

While all these elements are important pieces of the long-term solution, we recognize the need to continue to advance nitrate reduction work. The broad patterns of nitrate that we see in our surface waters and groundwater are caused by a combination of point and nonpoint source pollution. Reducing nitrate contamination of drinking water wells will require overlapping approaches that include both regulatory and voluntary actions that are science-based and will reduce all sources of nitrogen to our waters, and work at both the state and local levels. This is long-term, adaptive management work that is already in progress, and will operate while more immediate assistance is provided to southeastern Minnesota residents.

MDA, MDH, and MPCA are discussing how to conduct stakeholder engagement with an array of partners to explore the petitioners' recommendations, consider suggestions made by EPA, as well as investigate other options. We anticipate these meetings beginning this winter.

Timely and effective actions by state agencies in concert with local partners and the voluntary engagement of private well owners are essential to protect the health of those who depend on groundwater for drinking water. Interventions to provide safe drinking water in the near term and accelerated progress to reduce nitrogen in groundwater both depend on additional

financial resources. We look forward to advancing this work in partnership with EPA, tribal partners, other state and local partners, with stakeholders and the petitioners.

Sincerely,

Brooke Cunningham, MD, PhD
Commissioner
Minnesota Department of Health
P.O. Box 64975
St. Paul, MN 55164-0975

Thom Petersen
Commissioner
Minnesota Department of Agriculture
625 Robert Street North
St. Paul, MN 55155-2474

Katrina Kessler, PE
Commissioner
Minnesota Pollution Control Agency
520 Lafayette Road North
St. Paul, MN 55155-4194

DEPARTMENT OF HEALTH

Talking Points: Nitrate in Southeast Minnesota

DECEMBER 1, 2023

What's happening?

Some groundwater in southeast Minnesota has unsafe concentrations of nitrate; state agencies and local partners are working together to address this issue.

This is not a new issue. There are multiple efforts in place to address nitrate concentrations, but it may be years until the issue is fully resolved. Right now, the main focus is on immediate steps that can reduce the risk for people who get their drinking water from private wells with nitrate contamination.

How did this problem develop?

- The geology and activities on the land surface in southeast Minnesota make it more likely for higher concentrations of nitrate in groundwater.
- Public water systems regularly test and treat for nitrate in drinking water, but there are not the same protections for private well users.
- Nitrate is a particular concern for those who get their drinking water from private wells in eight counties in southeast Minnesota.
    - Those eight counties are: Olmsted, Goodhue, Dodge, Wabasha, Fillmore, Mower, Winona, and Houston.

What's new?

- What's new is that the U.S. Environmental Protection Agency (EPA) used a provision in the Safe Drinking Water Act to direct state agencies to:
- Provide notice and alternate water to people with affected wells,
- Develop a plan to ensure safe drinking water for private wells with unsafe levels of nitrate through seven specific components, and
- Accelerate environmental and conservation activities to reduce nitrate in drinking water aquifers.

Who's at risk?

People who are on city water and many private wells have safe drinking water.

Public water systems regularly test and treat for nitrate. The only way to know if your private well water is safe is to test the water at an accredited lab. Drinking water with nitrate concentrations above 10 parts per million is unsafe, especially for pregnant people and babies under 6 months old.

- Consuming too much nitrate can affect how blood carries oxygen and can cause methemoglobinemia (also known as blue baby syndrome).
- Babies under 6 months old who are bottle-fed formula made with tap water that has nitrate above 10 parts per million are at the highest risk of getting methemoglobinemia.
- There is more information about nitrate and health on the Minnesota Department of Health (MDH) website at Nitrate in Drinking Water (www.health.state.mn.us/communities/environment/water/contaminants/nitrate.html).

How can people protect themselves and their families?

Residents on a city water system can be confident their water meets Safe Drinking Water Act standards.

- You know you are on a city water system if you receive a monthly or quarterly utility bill for water.
- Your public water system regularly tests for nitrate and ensures levels meet the EPA standard. You can find the level of nitrate detected in the system serving where you live by reading the system's Water Quality Report (also known as a Consumer Confidence Report [CCR]). Search for your Consumer Confidence Report (CCR) online or contact your public water system to get a paper copy. See Search for your Consumer Confidence Report (CCR) (https://mnccr.web.health.state.mn.us/index.faces).
- Your public water system will let you know if they detect nitrate at a level above the EPA standard.

Residents who rely on a private well for drinking water should test their well water.

- You cannot taste, smell, or see most contaminants in groundwater, so testing is the only way to know the nitrate concentration in your drinking water.
- We recommend using an accredited laboratory to test your well water. See Accredited Labs in Minnesota Accepting Drinking Water Samples from Private Well Users (PDF) (https://www.health.state.mn.us/communities/environment/water/docs/wells/waterquality/labmap.pdf).
- There is more information on MDH's website about well testing, understanding your test results and treatment options. See Well Testing, Results, and Options (https://www.health.state.mn.us/communities/environment/water/wells/waterquality/tips.html)

Why did the state not take the actions in the EPA letter before now?

- MDH has been working on this issue, and most of the work that EPA is asking for in the letter is already underway. What's different now is EPA is asking that we accelerate progress for those activities and also expand in several areas.
- MDH has offered two pilot grants to local partners to offer free testing and income-based financial support for remediation when needed. The intent of these grants was to develop ways to support private well owners and users in making sure their drinking water is safe. Lessons learned from

those two pilots are being used to offer another set of grants and also formulate the plan that EPA has now asked for.

- In addition to meeting all our statutory and rule compliance requirements under the Minnesota Well Code, MDH continues to offer robust communications and education supports for private well owners and users:
  - Webpages and translated materials on numerous topics related to private wells.
  - A continuing education module for real estate professionals on private wells.
  - A Private Well Forum for partners who work with private wells.

While some modest current funding can be used, significant additional funding will be needed to carry out the public health intervention plan that will be sent to EPA in January 2024.

Minnesota Department of Health
Water Policy Center
625 North Robert Street
P.O. Box 64975
St. Paul, Minnesota 55164-0975
651-201-4366
health.privatewells@state.mn.us
www.health.state.mn.us

12/01/2023

To obtain this information in a different format, call: 651-201-4366.

Monday, December 11, 2023

Brooke Cunningham, M.D., Commissioner
Minnesota Department of Health
brooke.cunningham@state.mn.us

Katrina Kessler, Commissioner
Minnesota Pollution Control Agency
katrina.kessler@state.mn.us

Thom Petersen, Commissioner
Minnesota Department of Agriculture
thom.petersen@state.mn.us

Dear Commissioners Cunningham, Kessler, and Petersen,

As you know, on Friday, December 1st, the state agencies you lead submitted a work plan to the EPA outlining next steps in addressing nitrate contamination in southeastern Minnesota.

We are encouraged to see state agencies taking additional steps to mitigate this issue. In the Environmental Protection Agency's response, it was noted that state agencies are currently in the process of "discussing how to conduct stakeholder engagement with an array of partners… beginning this winter." Given the Land Stewardship Project's (LSP) extensive membership/stakeholder base in southeastern Minnesota, and state agencies' current discussions on this topic, LSP, on behalf of the undersigned petitioner organizations, proposes the following actions be taken as part of a robust and effective engagement campaign. Under your leadership as agency commissioners, we hope you will include these action steps in the final engagement campaign.

Elements of an Effective Stakeholder Engagement Campaign:

1. <u>Clear goals, outcomes, and evaluations of the nitrate reduction programs already in place.</u>
   The December 1st response to the EPA listed several nitrate reduction programs already in place throughout the state. Unfortunately, the response did not include additional information regarding the measured efficacy of those programs nor any details on the ultimate end-goals of each program. This is critical information for the public to know. If this information is currently unknown, prompt action needs to be taken to gather and report findings from these initiatives.

2. <u>Quarterly meetings between state agencies and petitioner organizations.</u>
   Among our respective membership bases, the 11 petitioner organizations represent a broad swath of Driftless Area Minnesotans. Each group also provides diverse areas of expertise and an intimate working knowledge of the April petition

and water quality problems in southeastern Minnesota more generally. We believe this knowledgebase would be invaluable to your planning process, making for a robust analysis of the issue and a thorough plan of action that would have the intended effects we all desire. We look forward to opportunities to collaborate and strengthen each other's work.

3. Three in-person meetings, led by state agencies, throughout southeastern Minnesota before April 2024 to inform the public about ongoing work and to gather feedback.

   State agencies need to be present and proactive in their engagement with the public. As the people and communities facing nitrate contamination every day, it is critical that the residents of southeastern Minnesota are central to developments moving forward. Community members should be able to meet in-person with state agencies to have their voices heard and to be notified of progress.

4. State agencies meet with at least 20 farmers in southeastern Minnesota before February 2024 to gather ideas on how state agencies can create solutions, rather than burdens, for area farmers.

   Our region's farmers are the solution to cleaning up our region's drinking water. For generations, hundreds, if not thousands, of innovative southeastern Minnesota farmers have implemented a wide array of agricultural practices that keep our water clean and our soils intact. Unfortunately, large-scale economic and policy factors are increasingly making this kind of agriculture less able to remain economically viable. It is imperative that any proposed solutions do not reinforce harmful farming practices and systems in our region. Our public agencies must also support the kinds of innovative, regenerative farming practices that can offer long-term solutions to this problem. Southeastern Minnesota farmers *must* play a foundational role in this work. We propose that your agencies meet with farmers that represent a diverse background of farming operations present within the region. The Land Stewardship would be happy to arrange these meetings. At least 50% of farmers/farms engaged with should meet at least one of the following criteria:

   - Feedlot under 250AU.
   - Acreage under 1,000 acres.
   - Implementing systems involving perennial forage/permanent pasture/rotational grazing.
   - Utilizing multiple known soil health practices such as no-till, cover cropping, diversified crop rotations (3 crops or more), etc.

In the coming days, we plan to seek more input from our members in the Driftless Area. We will keep you updated on their responses. We look forward to collaborating with you and our state agencies to mitigate this critical issue. To contact us, please write to Martin Moore and

Sean Carroll at, respectively, mmoore@landstewardshipproject.org and scarroll@landstewardshipproject.org.

Best,

Land Stewardship Project

Minnesota Center for Environmental Advocacy

Environmental Working Group

Minnesota Well Owners Organization

Center for Food Safety

CURE

Food & Water Watch

Izaak Walton League - Minnesota Division

Minnesota Trout Unlimited

cc:

Debra Shore, Regional Administrator & Great Lakes National Program Manager
shore.debra@epa.gov

Office of Governor Tim Walz & Lt. Governor Peggy Flanagan, attn: Joe Birkholz
joseph.birkholz@state.mn.us

Paul Gardner, Clean Water Council Administrator
paul.gardner@state.mn.us

Tails or one-time			**POSSIBLE supplemental requests for Clean Water Fund for 2024 legislative session (no formal endorsement by agencies implied)**
tails	MDH	5,000,000	(minimum) testing, mitigation and response to elevated nitrate in private wells (EPA petition)
tails	MDA	1,000,000	Accelerate/Implement Nitrogen Fertilizer Management Plan in southeast MN
one-time	MDA	402,000	AgBMP Loan Program--difference between $10 million request and what was eventually appropriated in FY24-25
tails	MDH	384,000	guidance on PFAS in fish
tails	MPCA	326,000	PFAS monitoring to backfill cuts due to RiverWatch direct appropriation
tails	DNR	90,000	PFAS in fish
		$ 7,202,000	firm requests
		$ 18,056,000	Funds available in November forecast (subject to change with Feb forecast)
		$ 10,854,000	Funds remaining to recommend
			Other Council member ideas
one-time	MPCA	1,000,000	SSTS grants--low-income grants to counties
one-time	MPCA	1,000,000	Chloride reduction grants with focus on wastewater
tails?	MPCA	1,000,000	Great Lakes Restoration Initiative LAMP match - $2M requested previously
one-time	BWSR	4,000,000	Critical Shoreland Easements
one-time	BWSR	2,000,000	Working Land and Floodplain Easements--take advantage of RCPP funds
tails?	BWSR	2,000,000	Clean Water Partners Legacy small grants (1/2 tribal gov't; 1/2 NGO)
tails?	MDA	3,000,000	AgBMP Loan program (statewide)
tails?	UMN	500,000	Stormwater research on stormwater pond cleanout and disposal
tails?	MDH	3,000,000	over the minimum $5M for private well response?
		$ 17,500,000	
		$ (6,646,000)	left to allocate

Christensen proposal

1. Upper Mississippi--Critical Shoreland Easements (BWSR)
2. Clean Water Legacy Partners grants (esp. in-lake treatment) (BWSR)
3. Private well response SE MN public health intervention (MDH-MDA-MPCA)
4. PFAS needs (MPCA-MDH-DNR)
5. AgBMP statewide (MDA)
6. Others to hash through

Motion: Adopt this framework today, ask agencies to refine numbers, further refine at January BOC meeting with recommendation, full Council for approval

interest shown by the BOC in:

* What is "shovel-ready" that could deploy extra funds?
* What support could the CWF provide based on a response from the EPA on private well petition?
* What was left on the chopping block from the last cycle?

review policy statements

include Dakota County; scale up soil health work from Olmsted Co; PFAS/PFOS soil testing (Pursell)
PFAS/PFOS response to new tighter HRL/HBVs (MDH) - bonding, responsible party funding possible