

## Clean Water Council Meeting Agenda

Monday, November 17, 2025

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

**IN PERSON at MPCA offices in St. Paul with Webex Available (Hybrid Meeting)**

### 9:00 Regular Clean Water Council Business

- **(INFORMATION ITEM)** Introductions—please declare any perceived or actual conflict of interest
- **(ACTION ITEM)** Agenda - comments/additions and approve agenda
- **(ACTION ITEM)** Meeting Minutes - comments/additions and approve meeting minutes
- **(INFORMATION ITEM)** Chair, Committee, and Council Staff update

### 9:45 Public comment

Any member of the public wishing to address the Council regarding something not on the agenda is invited to do so as a part of this agenda item.

### 10:00 **(ACTION ITEM)** 2026 Meeting Calendar

### 10:15 **(INFORMATION ITEM)** New Microsoft Teams for Clean Water Council activities

### 10:30 Break

### 10:45 **(DISCUSSION ITEM)** Clean Water Council Survey

The Clean Water Council survey was open for approximately two months. In that time, 159 people responded, representing each constituent group on the Council and each region of the state. We are still in early days of survey analysis—this presentation will include preliminary outcomes for discussion.

### 12:00 Lunch

### 12:30 **(INFORMATION ITEM)** Safe Drinking Water for All: A Study of Minnesota private well owners

Over the past 2 years, researchers from the Center for Changing Landscapes at the University of Minnesota have surveyed more than 1000 private well owners across the state about their beliefs, concerns, and water testing behaviors. Our team also conducted 6 focus groups with water professionals across the state to gather input on how to translate survey results into strategic actions in their region. This presentation will present results from both stages of the project with the intention of informing and gathering feedback via discussion.

- Mae Davenport (she/her), Professor, Department of Forest Resources; Director, Center for Changing Landscapes; Chair, University of Minnesota Water Council
- Amit Pradhananga (he/him), Research Associate, Center for Changing Landscapes, University of Minnesota
- Emily Kreiter (she/her), Staff Researcher, Center for Changing Landscapes, University of Minnesota

### 1:45 Next steps

### 2:00 Adjourn

***Steering Committee meets directly after adjournment***

# Proposed 2026 Meeting Dates

## Considerations:

During the budget development process, Full Council meetings are proposed to be extended by one hour and BOC meetings are proposed to return to the 9-2 schedule they have held for previous budget cycles. These extensions are indicated using a " ~ " next to the body name.

Similarly, in order to accommodate the processing time needs between meetings as a part of the new scoring approach, some meetings have been shifted off of their regular dates. Those changes, as well as those resulting from holidays (Federal, Christian, Muslim, Sikh, Jewish, Hindu, Buddhist), are indicated using an " \* " next to the body name.

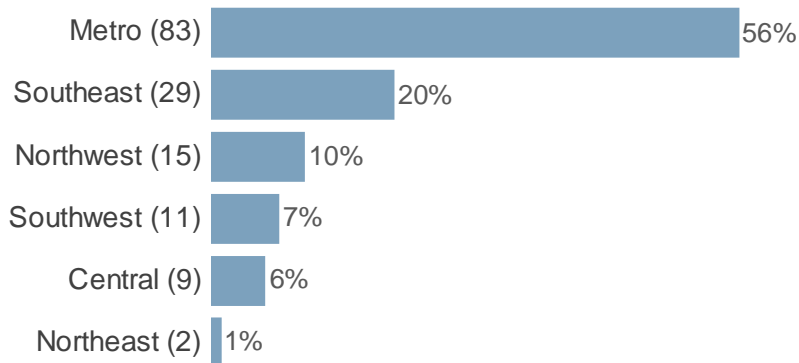
Date	Body	Notes
1/9/2026	BOC*	Proposed date instead of 1/2
1/23/2026	Policy	
1/26/2026	Full Council*	Proposed date due to MLK day
2/6/2026	BOC~	Extended 9-2
2/23/2026	Full Council*~	Proposed date due to Presidents Day, extend 9-3
2/27/2026	Policy	
3/13/2026	BOC*~	2nd Friday due to process timing needs, Extended 9-2
3/23/2026	Full Council*~	4th Monday due to process timing needs, extend 9-3
3/27/2026	Policy	
4/10/2026	BOC*~	Proposed date due to Easter , process timing needs, Extended 9-2
4/20/2026	Full Council~	Extend 9-3
4/24/2026	Policy	
5/8/2026	BOC*~	2nd Friday due to process timing needs, Extended 9-2
5/18/2026	Full Council~	Extend 9-3
5/29/2026	Policy*	Proposed date due to Memorial Day
6/5/2026	BOC~	Extended 9-2
6/15/2026	Full Council~	Extend to 9-3
6/26/2026	Policy	
7/10/2026	BOC*	Proposed date due to July 4
7/20/2026	Full Council	
7/24/2026	Policy	
8/14/2026	BOC*	2nd Friday due to process timing needs
8/24/2026	Full Council*	4th Monday due to process timing needs
8/28/2026	Policy	
9/11/2026	BOC*	Proposed date due to Labor Day
9/28/2026	Full Council*	Proposed date due to Yom Kippur
9/25/2026	Policy	
10/2/2026	BOC	
10/19/2026	Full Council	
10/23/2026	Policy	
11/13/2026	BOC*	Proposed date due to Diwali
11/16/2026	Full Council	
11/20/2026	Policy*	Proposed date due to Thanksgiving holidays
12/4/2026	BOC	
12/14/2026	Full Council*	Proposed date due to winter holidays
12/18/2026	Policy*	Proposed date due to winter holidays

## Clean Water Council 25

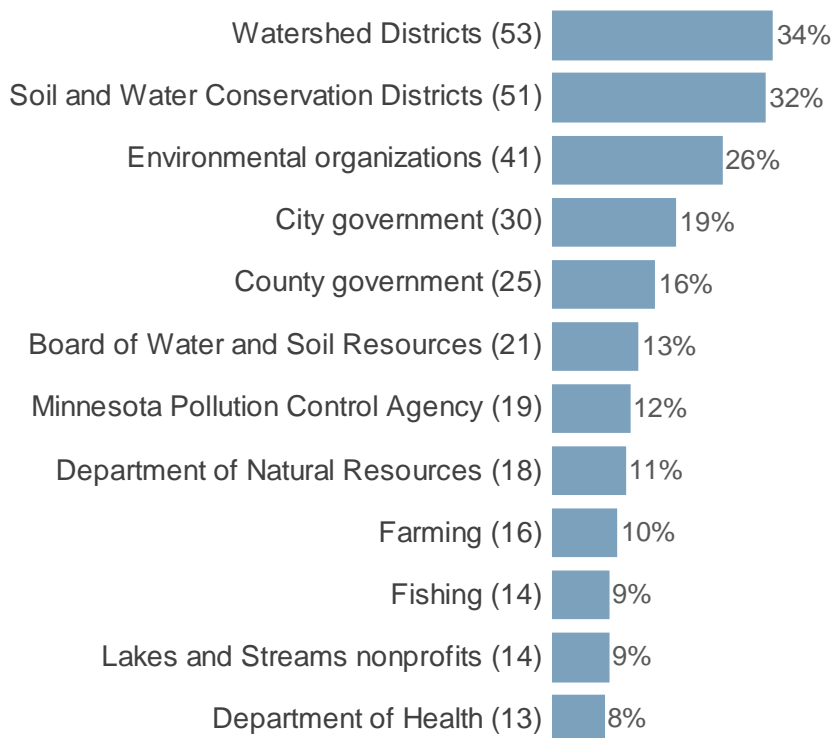
This report was generated on 10/31/25. Overall 159 respondents completed this questionnaire. The report has been filtered to show the responses for 'All Respondents'. A total of 159 cases fall into this category.

The following charts are restricted to the top 12 codes. Lists are restricted to the most recent 100 rows.

Please click on the area of the map you are from:



State statute defines the groups of people to be reflected on the Council. Which of the representative types would you say you are most similar to? Please select all that apply.



Please specify:

Youth Environmental Representatives  
 Izaak Walton League Breckenridge Chapter  
 Middle Snake Tamarac Rivers WD  
 FORESTS LAKES  
 Women's Environmental Network / Carver County Water Management Organization  
 Federal natural resource agencies  
 Private Industry

When you think about water in Minnesota or your community, what are some of the first things that come to mind?

The importance of agriculture.  
 High nitrate levels in rural county  
 quality and volume  
 Agricultural Drainage, saving water as an endangered asset for future  
 Clean lakes and rivers

When you think about water in Minnesota or your community, what are some of the first things that come to mind?

keeping the rain drop where it lands on the landscape (water run off), safe drinking water, the quality of surface water as it leaves the state

in no particular order: regulations, agriculture with ditches and tilling, stormwater, education, AIS and lake associations, and lake owners all wanting shoreline projects

Recreation, health, needed for ag and industry, quality of life for residents

Clean and controllable

Investments needed to restore impaired waters, protect drinking water, and to support recreation-based tourism

Lakes, stormwater, pollution, invasive species

Poor water quality blamed on agriculture

Lakes, Rivers/Streams, Wetlands, ..... Recreation, Habitat, Ecosystem      Drinking Water - Safe  
Clean water for generations

Ground water is not being factored into much of anything. Also coordination is lacking at many levels of government in dealing with water issues.

Risk

Algae, river, lake, protection, nutrients, food, plants, medicine

Forestry, drinkable, cleanliness

Clean drinking water, recreational activities associated with lakes and rivers, water quality

Nitrates, still relatively high drinking water quality, indigenous foodways, sulfates, manoomin, recreation, serenity

erosion

A clear lake on a calm day. Swimming and wading. A retreat.

There has been progress and it can be quantified, at the same time it may take many years to become noticeable. I fear the public expects immediate results when it comes to changes in water quality, we have to do a better job of telling our story of where we have been, where we are now, and how much more it is going to take. This can be applied to surface water and groundwater, with groundwater being even harder to see results in short periods of time. Water is for everyone, its something Minnesotans have been able to rally around in the past, present, and hopefully future!

Lots of it. Quality. Quantity.

Mississippi River, lakes, wetlands, watersheds, stormwater, rainwater, clean water, water quality, community, partnerships

recreation, personal/community connection, generations, sustainable resources, stewardship, responsibility, accountability, transparency

CLEAN WATER

quantity is taken for granted, water quality an on-going issue that will be elevated in the future, water is big source of recreation and quality of life.

flooding, effluent sewer overflow incidents, monitoring, shared responsibility, reporting, crop buffering, spraying, downstream impacts

Mostly good water quality but at risk for declining water quality

Recreation, Outdoors, Wildlife, Relaxing, Fishing, Lakes and streams. (unfortunately I do not think of groundwater right away or water quality)

When you think about water in Minnesota or your community, what are some of the first things that come to mind?

Drinking water, fishing, recreation, ice fishing, ditches, drainage, flooding,

The Rum River out my backdoor and how many lakes and wetlands we have compared to other states, which becomes obvious when I'm traveling.

Recreation, beauty, tourism, economy

The wild and scenic St. Croix River and just how lucky we are to have it protected. The unwillingness of local governments with land use authority to install zoning regulations to protect our surface and ground water.

Keep it clean. keep it plentiful

fresh, clean, forest health, riparian health, stewardship, outreach and education, fishing, calm

Neglected

Drinking water quality and quantity. Lakes and rivers for wildlife and recreation.

The lakes are in tough shape with algae by the end of the summer, but ground water isn't as much of a concern in our area. In 2025 water was in a surplus.

Lots of lakes

Clean, Minimal impairments so prioritize protection as well as restoring and enhancing waterbodies, Recreational appeal, Increased tax revenue associated with clean water, Groundwater/drinking water protection, Increased development, Reducing sediment and nutrient runoff from all sources

lakes, rivers, forests and farms

Drinking water, recreation

quality surface and drinking water for the public to enjoy

Streams, Drinking Water; Groundwater

Minnesota River and a desire to make greater headway on restoring the water quality; ag drainage is a massive source of impact with no regulations to protect it.

Abundant, clean, and well managed

Fortunate to have many water resources in the state, as well as a great diversity of resources.

Flooding. Drainage and tile.

Failing Septic Systems

Protection, education and outreach, what a valuable resource it is.

Cabin, swimming, fishing

Recreation, peace, connection to nature. And, on the more negative side: disrespect to water.

Valuable

Unneeded water applied to lawns

Recreation

Flooding, Lake health, Ag drainage

We take it for granted and don't understand it's value to public health and the economy

Plentiful but pressured

Clarity, impaired, stormwater, swimming, fishing, habitat

Recreation, fishing

protection, mining, wild rice, climate resiliency, aging infrastructure

When you think about water in Minnesota or your community, what are some of the first things that come to mind?

Salt reduction

Perceived abundance, recreation

The common belief that water is plentiful and that it's easy or cheap to keep it clean and plentiful. I think about the threats from climate and how we are not prepared for future conditions and how the impacts will most harshly effect people and places that are already overburdened

Excess nutrients and sediment pollution from agricultural land uses and drainage; Groundwater/drinking water quality and quantity. Swimming, fishing, boating/canoeing/kayaking.

Surface waters' connectivity to drinking water, impacts of car use on water (water in roadways), green storm infrastructure

PFAS in drinking water, PFAS in fish, nitrates in drinking water

Agriculture, rivers and streams (recreation), connection of natural stream areas to both woodlands and agriculture. Quality trout streams. Ecologically diverse. Groundwater issues - increasing concern and increasing push for solutions. Polarized politics. Concern over PFAS rising.

clean, abundant, important resource for physical and mental health requirements, a defining feature of Minnesota culture

lakes, recreation, cold, clean

Central to MN identity, life-giving, peaceful, community builder

Water quality concerns such as chloride, micro plastics, pollution, excess nutrients, and especially good habitat for aquatic plants, insects, fish, etc.

limited resource; not valued as much as it should be;

It is past time to get the LEAD OUT! Low income and working families should not have to drink LEADED water for the next ten years because they are unable pay \$6000 to \$10,000 to eliminate the LEAD service line to their home. The MN Legislature should fund THE GET THE LEAD OUT OF HOME DRINKING WATER NOW! Campaign

Exsisting contamination future threats e.g., PFAS

lack of education level about water quality and why it's important to have good water

Priority, Health, Future

Creeks, rivers, and lakes and their ability to support recreation and nature, including all animals and plants.

The water from our local wastewater treatment plant drains directly into the only lake in the middle of our town (Cologne)

pollution, drinking water, birds and wildlife that depend on water, wild rice, canoes and kayaks

good water for drinking, fishingv& Swimming

Enjoyment, beauty, sharing experiences, pollution (in ability to eat fish or drink water)

great fishing and recreation

Nonstop challenges, recreation, enjoyment, grateful to have the opportunities we do

Drinking, swimming, fishing, boating and general recreation.

Clean water and the ability to fish and recreate on the water.

Our Lakes and Streams for their recreational and ecological values.

Clean, Important, Expensive to maintain

When you think about water in Minnesota or your community, what are some of the first things that come to mind?

Its the essence of our state, recreation, fishing, scenic, life giving.

Urgency, lack of accountability, missing relationships

Quantity, accessibility and quality

Availability, grateful, clean

Clean Water Healthy Forests

It's the essence of Minnesota - our lakes, Mississippi River, wetlands and streams. It provides us our essential needs - drinking water, recreation, economic strength, community well being, ecological health.

Finding practical ways to lessen sediment transfer.

integrated, critical, priority, uniting, life giving

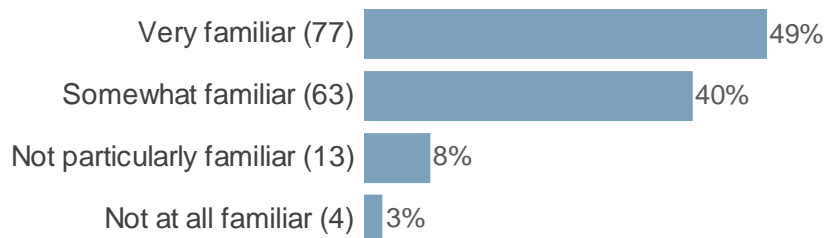
Desire for clean water with strong aquatic ecosystems. Opportunities for recreation and access for all populations.

Access to clean water in communities, vulnerability to flood risk, one water, climate change

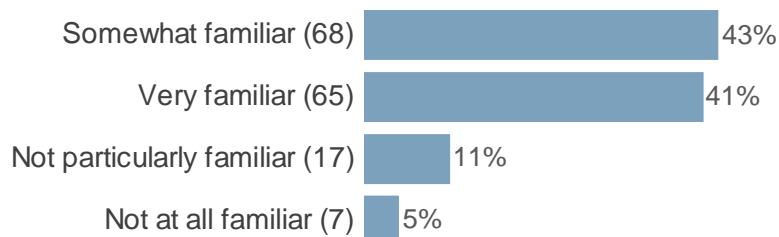
swimming, trash, clean, algae, salt, wetlands

The work supported by the Clean Water Fund largely follows the state's Watershed Management Framework, helping to set up a system to accelerate getting to durable, clean water outcomes. Please indicate your degree of familiarity with each:

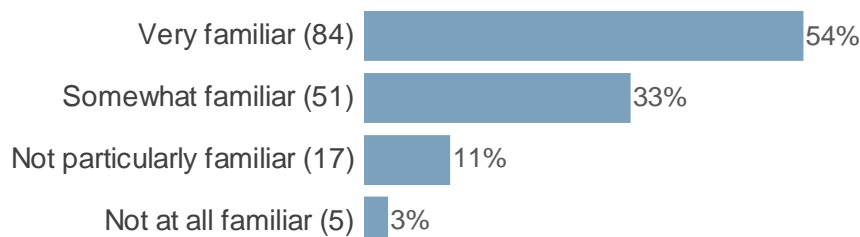
(Monitoring, assessment, and characterization: identifying current conditions as well as changes over time)



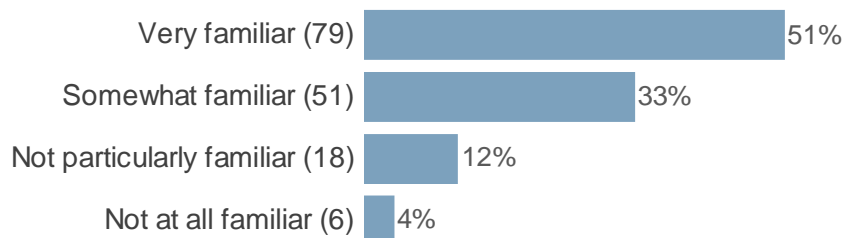
The work supported by the Clean Water Fund largely follows the state's Watershed Management Framework, helping to set up a system to accelerate getting to durable, clean water outcomes. Please indicate your degree of familiarity with each: (Problem investigation and applied research: understanding causes for or impacts from challenges, as well as what to do about them)



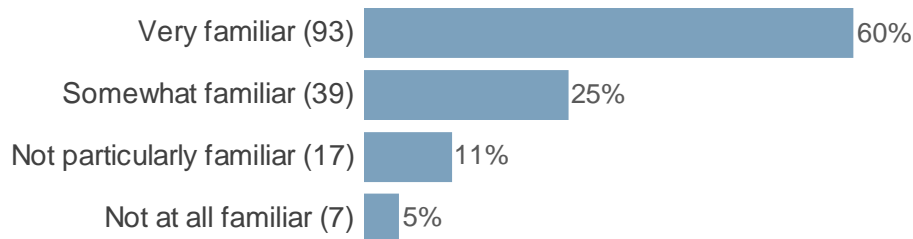
The work supported by the Clean Water Fund largely follows the state's Watershed Management Framework, helping to set up a system to accelerate getting to durable, clean water outcomes. Please indicate your degree of familiarity with each: (Restoration and protection strategy development: developing a suite of strategies to address challenges or pursue opportunities)



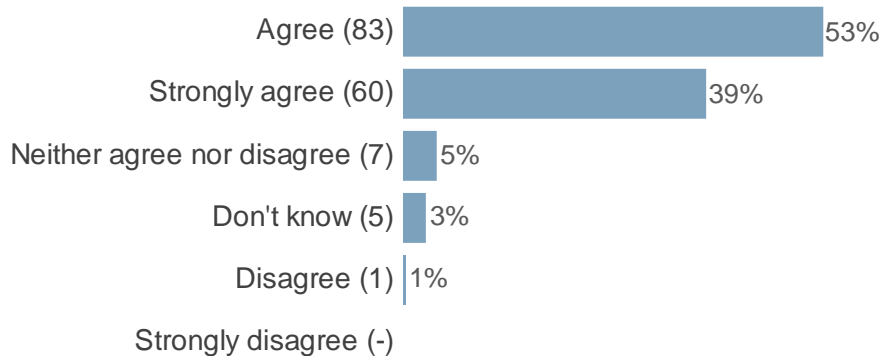
The work supported by the Clean Water Fund largely follows the state's Watershed Management Framework, helping to set up a system to accelerate getting to durable, clean water outcomes. Please indicate your degree of familiarity with each: (Planning: convening diverse perspectives to determine prioritized, targeted, and measurable actions to take based on science and local values)



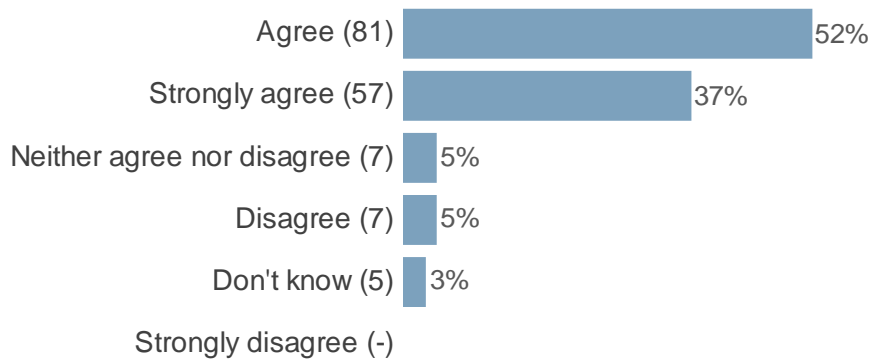
The work supported by the Clean Water Fund largely follows the state's Watershed Management Framework, helping to set up a system to accelerate getting to durable, clean water outcomes. Please indicate your degree of familiarity with each:  
(Implementation: carrying out identified actions to address point and non-point pollution)



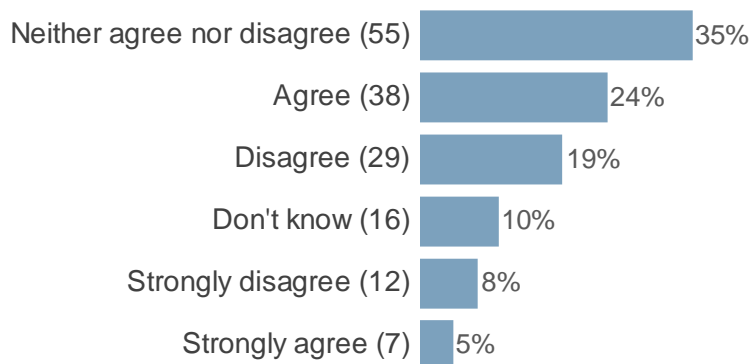
Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (We better understand current water conditions as a result of monitoring and analysis)



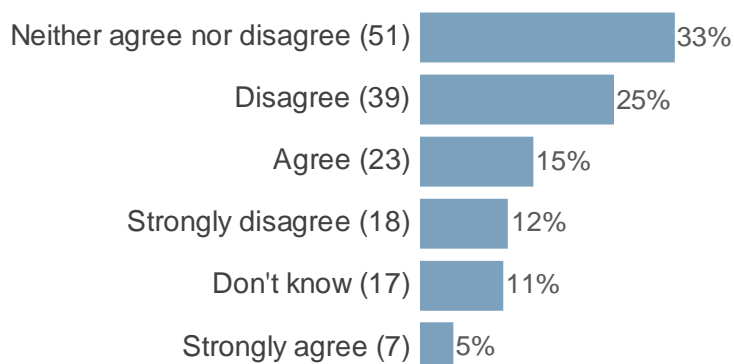
Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (We better understand challenges facing our drinking water, groundwater, and surface waters)



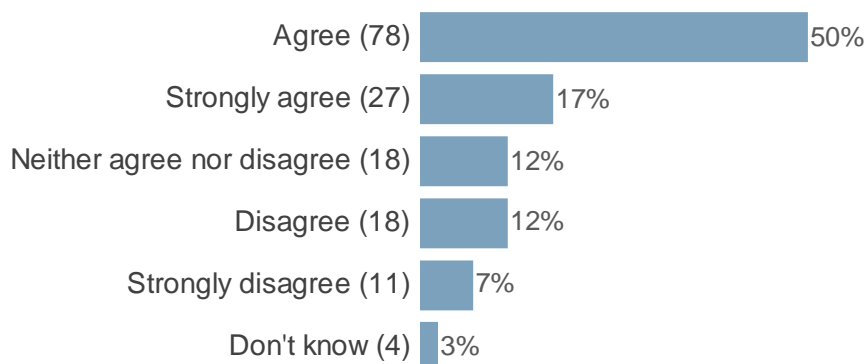
Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (We are seeing improvements to drinking water)



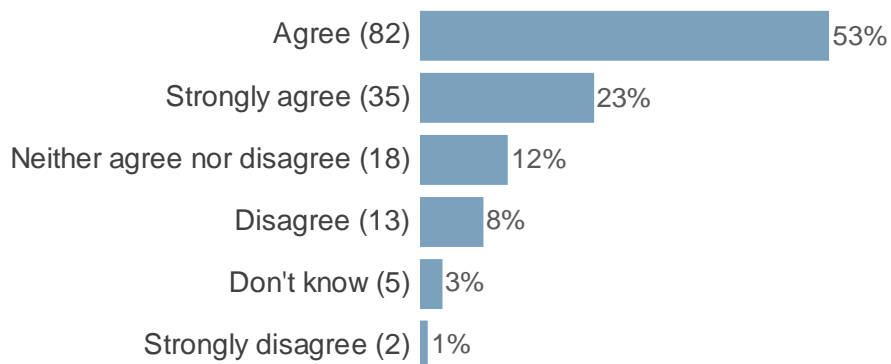
Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (We are seeing improvements to groundwater)



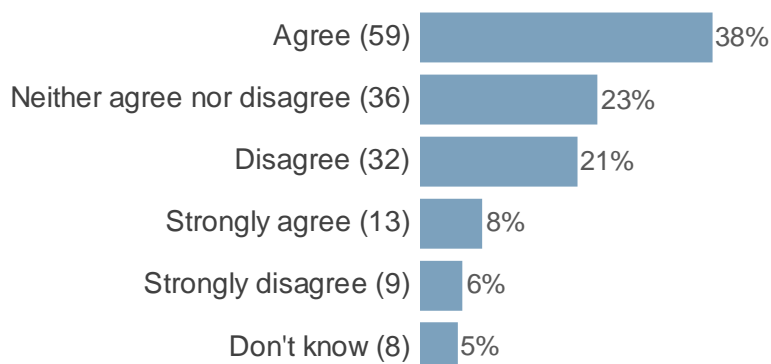
Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (We are seeing improvements to lakes, rivers, and streams)



Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (People are more aware of water challenges and needs)



Where do you feel you have seen improvements since 2008 either statewide or in your community? Please select the degree to which you agree or disagree with each statement. (Decision makers have made water a higher priority)



Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

SE MN Water Forums to educate the public on these issues, The MNROO efforts to inform private well owners of contamination

In SE MN we have held 4 well attended Clean Water forums. Community groups are educating the public on the water contamination problems, with little input from the government who makes the rules.

Visibility in town hall meetings and farmers markets and public spaces that point to the challenges, successes and unknowns

no

Save Our Streams, well testing, trout unlimited stream restoration. We Are Water

None

More well sealings and ais funding

Legacy amendment and funding it has provided; advances in chloride reduction; We Are Water MN

More awareness of water quality

Educating boaters about invasive species and cleaning their watercraft.

Increased staffing and implementation/projects of the state's soil and water conservation districts. Watershed plan development. Watershed plan implementation.

1W1P have brought a new way of partnering to water quality work highlighting the local needs and priorities for both surface and groundwater resources. The Watershed Assessments not only point out our impaired waters but also the need to protect those that are not impaired.

Watershed Based Implementation Funding and working on the premise Priority-Targeted-Measurable - PTM

Some water bodies have been delisted, which is great.

Too many great projects to list.

Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

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Improving short-term and long-term water quality trends and delisting of surface waters. The Board of Water and Soil Resources and Minnesota Pollution Control Agency have a number of good stories on a statewide scale. In the East Metro, the East Metro Watershed District has a large number of stories of highlighting the great work as a result of Clean Water Council funding. Finally, the acceleration of good, applicable research has significantly improved the data and practices at local units of government whose local elected leaders have made water quality a priority.

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Watershed-based implementation funding is successful. Landscape changes can only be seen by funding local implementation.

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multiple district projects

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Yes, the CWC funds has made a positive impression in the community to look for water quality improvement. Our Swift Coulee project a more than 2 decade belated project eventually got constructed in 2025. Part of the money came from CWC .. Thank you!. Some other sluffing on streams that has been ignored with tones of sediment being introduced every year, got fixed, educational sessions on drinking water well and its quality has been an eye opener in the community thanks to CWC and West Polk SWCD.

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Flood protection projects and wetland restoration easements that create habitat and clean water

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1w1p has worked hard to engage stakeholders and agency collaboration, advancement of the forever green program , data collected from GRAPPS & WAPPS has been valuable, department of ag low interest loan program and equipment grant programs have helped move the needle for BMP implementation

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For successful: the MN Buffer Law, moving water goals from county boundaries to watershed boundaries ((1W1P) although this still has many challenges).

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Local wetland restoration projects for flood mitigation, cleaner waters, groundwater recharging

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All flood hazard mitigation containment works very well.

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There has been more focus on wholistic stream corridor restoration and addressing non-pollutant stressors to aquatic life like barriers to connectivity

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Expanding knowledge of non-structural land management practices such as no-till, strip-till, and cover crops

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Increased monitoring and analysis have identified impairments as well as identified waters that are in need of protection. Watershed Plans that target practices, programs, and education to address known water quality issues or protection. Use of Watershed Based Implementation Funds

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Lake Association Interaction

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Community engagement through WRAPS processes.

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Forestry projects that occur on the landscape, more tree/shrub cover to protect from runoff and slow water impact

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Implementation of soil health practices to address sediment and nutrient loading to MN waters has been well received and implemented.

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Some of the delisting of impaired water bodies, work being done on Smart Salting awareness

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White Bear Lake water levels

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Duluth harbor restoration. Fish passage projects, such as dam removal and culvert replacement. Children's education events such as water fest.

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Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

There are many existing stories of specific projects, SWCDs are one of the big implementers across the state because capacity has been built and they're able to target funds where needed. I think one aspect that is sometimes overlooked is how well (and actually quite quickly) state agencies and local organizations have adapted to the new water planning framework. There are a number of organizations in the water world, but all have their place, and have played quite well in the sandbox together. The shift away from competitive, and to implementation based has assisted with this.

Funds for projects that will continue to improve water quality are essential

Watershed district CWF projects

In general, transparent projects, programs, and stories that link the inter relationships needed at all levels of government to drive the Watershed Management Framework forward. Stories and projects that revive or maintain genuine citizen connection to the water resources of MN.

I AM FROM COIMBATORE TN INDIA.HENCE N.A.

large amounts of state and federal funding dedicated to water quality projects.

being aware of problems (overflow issues), more populated residential use on systems, more MPCA staff

Increased outreach to forested landowners to educate them on ways to better manage their forests and ultimately keep the forests on the landscape rather than split it up and develop it

We have been able to reduce pollution going towards waterbodies.

TSA 1 reorganizing and hiring engineering staff to get more projects implemented. Watershed Based Implementation Funding implementation.

Working as watershed partnerships has significantly improved collaboration and efficiency among SWCD and County resource professionals. Projects to increase awareness of drinking water safety get overwhelming response from the community. This opens up lots of broader conversations about the drinking water, groundwater, surface water connection.

We have been able to do so many more projects with landowners. These projects are making improvements on the landscape. We are beginning to see improvements in data for water quality of our lakes and rivers.

Delisting of waterbodies from the impaired waters list thanks in large part to partnerships and the Clean Water Fund grant program.

flood control, cover crops, best management practices, nutrient management, manure storage

Continued funding to have local organizations work with landowners in a variety of ways from site visits, education and outreach, project implementation; partnerships between local, special interest, state and federal groups to collaborate together; continuing to get information to the local agencies that have to make on the ground decisions about practices to best protect, restore and maintain water quality

for us it is the McLeod County Ditch 11 project by Winsted MN.

Group members have been comfortable prioritizing the projects of others knowing that future funding is assured and their individual projects will get funded later.

Significantly more in the field projects to stop erosion and reduce excess nutrients in the ditches and lakes. Several waterstorage projects that seem to make most landowners happy with so much drain tile in the ground.

Comprehensive Watershed Management Planning has been a huge success! Local Government Units working together to accomplish water quality goals has been a game changer and provides more results to improve water quality.

Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

Watershed-based funding has been a huge success as it allows the local resource professionals to prioritize high priority areas or specific waterbodies to make a measurable change in water quality. Having local control of where project funds go has allowed SWCDs to significantly increase the amount of work they are doing to reduce stormwater runoff from urban and rural areas, protect and restore shoreline, reduce wind and water erosion, and protect groundwater.

Wetland restorations, soil health, lake group capacity building

large movements in SE in reaction to the EPA petition has brought N issues to the forefront

The local comprehensive watershed management had elevated local decision making, establishing priorities, and execution of the deliverables identified in the local plans. Appreciate the systematic local approach. Continue to elevate the science and modeling for BMPs and projects outcomes.

The completion of the first round of water assessment; wastewater phosphorus reductions; improved ongoing data collection on water quality.

Identification of new contaminants of concern

Nothing specific. I think there have been a lot of good efforts in a lot of areas and they all deserve credit for any improvement, large or small.

The knowledge we have on our water resources has increased dramatically. This tracking, and funds for implementation of BMPs, has resulted in many delistings and other success stories.

Doing a better job of checking soils to indicate type of septic system required for any projects

Landowners willingness to work with local units of government to install agricultural practices. (Both structural and non-structural).

Supporting farms and farmers

MDA water testing

BWSR Clean Water Fund and Multipurpose Drainage Management Grant

PFAS testing in drinking water, 2023 lead service line funding, ENRTF reauthorization, St. Louis River cleanup

Chloride reduction in municipalities

Clean Water Legacy Funding!

Strong partnerships between local units of government and state agencies

Low salt design

Delisting waters; collaborative, comprehensive water planning;

projects that look at ecosystem services and natural capital. i'm seeing more and more native, pollinator friendly, drought tolerant plant restorations. that landscaping and the effects on water usage and quality are helping plus they have additional health, wellbeing, climate resilience, and economic benefits

Anywhere that a declining water quality trend is plateauing or improving. Having the breadth and depth of data that MN has is huge! Changing the implementation approach from working with anyone who walks in the door to funding projects with landowners and projects that are prioritized and targeted.

Watershed-based comprehensive management plans! Having CWFs to position MN to competitively match federal and other funding sources. Gives local governments the greater ability to accelerate implementation of larger scale (capital improvement and in-lake treatment) projects which can remove a large portion of the required pollution reductions.

There have been huge investments that have led to successes in lake and stream health.

Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

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stormwater and wq grants to local governments, ngos, and water orgs; contaminants of emerging concern; metro children's water fest

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quarterly PFAS testing

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Just in the past 15 years there has been tremendous change and movement. Opportunities for getting conservation practices on the ground have become more efficient (through State funding sources) and the ability for SWCDs to fund projects themselves has greatly increased. In 2008 we relied a lot on NRCS funding and that is not generally a timely or efficient system for landowners. We are now able to fund projects and we can have staff who specialize to be able to better assist landowners. The current BWSR RCPP grant for soil health was set up well as there was an opportunity for grant funding to staff for the work. Allowances for outreach and information sharing have been helpful to gain interest and participation. Kevin Kuehner (MDA) research on groundwater in Karst has been valuable and continues in new directions. Olmsted SWCD's approach to outcome based practices for groundwater improvement has garnered a lot of interest and we look forward to finding ways to expand that regionally. Small watershed funding through MPCA has been a way to focus in targeted area for longer and do more at once. Efforts that allow for some monitoring help to identify how contaminants, particularly for groundwater, travel in different geological situations. The watershed based funding approach is more efficient than the competitive grant process overall. There may be special projects that are more aligned to a specific grant program. Focus on nutrient management is good as part of an overall plan with multiple practices to reduce inputs. Adding in working lands component to protection programs makes it more saleable in some areas. New attention to small grains and pursuit of markets is necessary. There have been opportunities to address water quality issues on multiple land use areas and that is important in the ecologically diverse SE MN region.

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Just the fact that I see the clean water land and legacy amendment logo everywhere now. I see it on project presentations, flyers, social media at least once a week now. So many diverse types of projects.

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The trash capture devices in Lake of the Isles and Lake Hiawatha (maybe there are others?) seem like a great way to do multiple things at once -- multiple water orgs collaborated on their installation, they are actively keeping these lakes clean, and the signage next to them educates trail users in the process. I really like these multi-purpose projects and would love to see more of them throughout the Twin Cities.

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I have seen/read about many small projects that have improved water quality around the state in specific spots

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Efforts and investments through state and watershed grants. Our City Council and Water Management Agencies have been extremely supportive. We wish all our City and County colleagues could say the same, but it is getting better.

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Local efforts by the Benton Lake Watershed Conservancy group.

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impaired waters are improving, involvement of communities, watershed districts, farm organizations, landowners, researchers etc are all making a difference, cover crops new ways to fertilize crops, water management, soil & water conservation,

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Fantastic progress watershed districts are making in implementing projects at small, medium and large scale.

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Increased water quality protection from forested easements

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Some lakes have been removed from the impaired waters list

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The delisting of lakes and improving water quality trends around the metropolitan area.

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Watershed approach used by Project Teams in the Red River Valley have some success stories to tell.

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The ongoing support for the point source implementation grant program has been extremely important in greater MN

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Are there any efforts or outcomes that you would specifically point to as something that has been successful? These could be projects or programs or stories, etc.

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Actionable dollars such as grant funded projects

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There have been successful projects but I don't know of any that stand up to the criticisms regarding the extreme need for a fair systems-based approach. The prompt is even a little biased to encourage respondents to look at their feet rather than the horizon.

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Clean Water Legacy Sand Hill River Rock Riffle Project; Clean Water Legacy Burnham Creek Watershed Restoration Project; Clean Water Legacy Red Lake Watershed District Project 134; Northwest Minnesota Groundwater Initiative; Soil Health Delivery program; Informing and including Canada and the neighboring States of the successful water quality efforts on going in Minnesota

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Educational signage near water bodies

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Clean water projects in the Twin Cities metro area that have leveraged partnerships and capitalized on redevelopment opportunities to improve water quality and provide other environmental, social and economic benefits.

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Cover crops and information/education.

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Lakes being delisted, increased awareness in the development community about stormwater management and its importance.

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Collaboration between local governments to leverage resources in order to identify and implement beneficial projects.

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n/a

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All of the grants received have resulted in significant infrastructure installations that directly improve water quality.

Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

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Protection of Mississippi River, particularly upper Mississippi River basin, to help reduce Nitrogen and other pollutants

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Yes. Permits for mining near ANY body of water. MINING SHOULD NEVER HAPPEN IN, near around closeWater. too T

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Make data centers recycle 100% of water

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Assign someone more assertive and passionate to lead our DNR

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Lead pipe replacement

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i'm unfamiliar

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Mandatory, enforced regulations should have been placed on commercial fertilizer and manure application on row crops.

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Stronger efforts to regulate corporate farming and ground water health

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hat we are afraid to follow with policy, where the evidence leads us. Real progress will remain limited until we move beyond encouragement to regulation. Given all that we have learned since 2008, it could be argued that a continuation of this voluntary approach is a waste of taxpayer money. I would like to see a greater sense of urgency driving this process.

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Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

Differently? I wish the agencies would do their mandated job, they have the authority, but they have not regulated agriculture to protect water. I also think the state need to recognize that regional variations in landscape and Geology require regulations that recognize these difference. Strong enforcement is critical

clean drinking water for private wells & community water treatment

Get involved and protect people's lives. Lewiston, MN has a Fool's Five 5K run to raise funds for cancer treatment. Lewiston also has water that is contaminated with nitrates. The feds closed one of their wells. Think there might be any connections to their water???????

Communicating in ways that help all citizens understand the challenges and mitigation.

groundwater pollution has gotten worse

MPCA, MDA and MDH actually protected the environment and people's health. For over 30 years these agencies have known the groundwater was contaminated and have failed to meaningfully address this health crisis.

PFAS contamination, lead pollution, nutrient and pesticide application standards

Unknown

Wasting of water

education on the source, as most still believe it is all due to farming practices and that is simply not the case.

Water has the potential to be the great unifier in a time that is fraught with conflict and division.

None

Drinking water funding has been primarily for groudwater but there are quite a number of communities/cities that use surface water. I wish that it woudl be truly DRINKING WATER and not just groundwater.

I wish we had built up our LGU staff sooner to assist with local implementation efforts.

For us getting projects on the ground is crucial to having the lasting impact we need moving forward!

I really wish we could have done more to regulate fertilizer use and soil loss.

the administrative/funding separation between flood control projects and water quality projects must be eliminated; the largest, most impactful projects aren't being constructed due to lack of funding

It would be great to have more funding allocated to implementation of practices by Local Units of Government and State Agency work such as state-wide monitoring, assessment, and studies funded by the State General Fund instead Clean Water Funds.

DNR and MPCA permitting, There is a disconnect between State Agencys and the boots on the ground. Also, how the money is being prioritized .

Too much funding directly to state agencies.

Some sort of education support/ research and education toward use of new technology to facilitate less use of fertilizer on farms. If I want to brainstorm, I would say, a JIT (Just In Time) method for spraying fertilizer on large scales. Apparently corporate america is getting into farms and small farmers are being pushed out of business. Now, is the time to invest on R&D to introduce new technology on Farming with Clean Water end result.

No

Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

i know the SE has a unique topography that plays into ground water and drinking waster issues. but i don't think their is enough financial support for all mn residents with private wells. Nitrates and other contaminates effect wells all over the state and are costly to address if CW funds support the SE in this it should also include the rest of the state

ditches and tilling laws are mosltly outdated and can superced over public waters. There is a HUGE missed opppurtunity with almost 1,700 public landings that could be used to help advertise and educate on why water and especially clean water is important for our states economy, health, and future generations. There should be more educationa dn adversising on the why it s important instead of just having a tiny small sign statting that ASI is pressetn in the waterbody and then basicially zero education or awarness.

Buffer strips more and denser non toxic grass.

We need more focus on chloride reduction; this pollutant is permanent and toxic and should be prioritized more than Phosphorus. We need more focus on water quantity controls (volume and peak flow reduction) versus strictly on water quality. Addressing altered hydrology more directly will result in pollutant reductions through direct load reduction and reduction of erosive forces. There needs to be more focus on urban stormwater improvements in the Priority A surface water source water protection areas for mpl/s/st paul including contaminants of emerging concern.

Limiting the red tape associated with funding programs

Actions are not targeted enough. For example, Soil and Water Conservation Districts mostly rely on volunteer conservation efforts - who ever walks in the door - we can't address sediment/nutrient loading effectively with random actions of conservation. - Need more targeting of areas for reduction. - Statewide Shoreland Ordinance Update, Wake surfing ordinances. Voluntary practices will not move the needle enough for clean surface water.

N/A

Amount of protection efforts taken throughout the state, that aren't reflected in mapping. Change in news articles focused on impaired waters to better capture the context of the immense amount of data that MN has gathered.

You did not include forestry into the metric. Forestry is the key to clean water and should be part of the funding for cost share

Groundwater/surface water interaction is still very much an unknown, along with the emphasis on groundwater recharge as it relates to drinking water.

The issue of private drinking water, and especially nitrates and arsenic in them, feels like a miss  
no

We needed to get ahead of tile drainage. An opportunity was missed to understand at least where the tile is going. Tile creates downstream problems for Minnesota; some restrictions or fees could have helped offset those costs and still allow farmers to benefit from additional drainage.

Post-Construction Funding Support for Maintenance, Training, Funding of Pollution Prevention Measures, which have typically lower unit cost

The work on the CWC is complex, I don't see how I would have done anything differently trusting the board members are making the best compromises/decisions across the board.

NIL

nutrient management plan had potential for restrictions but most of them never materialized.

Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

requiring residential upgrades, spending more on safety, issuing notices for violations- setting up a system to track violations

The continued monitoring of water quality and water quality trends is something that isn't emphasized enough.

No off hand, good projects take time and sometimes you need to navigate a lot of red tape.

Fewer pots of money and make it easier to administer grants. Keep funding flexible and locally led.

We realize now with greater clarity than ever before that the issues threatening clean water "durably" into the next generation are complex and as such, the solution will not be simple. An effective solution that will carry to the next generation must have some complexity built into it. We are now being very intentional to make sure we go beyond "outreach and input" and are building partnerships of among individuals and institutions. We must go well beyond the cost share model to achieve the scale of conservation needed to meet goals.

I think that the direction we have moved is good. We are funding the plans that identify the priorities in local watersheds and counties.

Highlighting the success stories, both landowners and local government units who are being leaders in their community when it comes to trying to improve water quality.

Continue to ensure the importance of the value of protection, cost benefits of it and impacts to the resources; Help decision makers at the state level that there needs to be funding to pay staff to implement the projects that sometimes can take years and the need to understand, yes you have to pay for the project but someone has to implement the project and administer the funding, it seems something that is often missed in many discussions and an uphill battle

river bed loading is not being addressed. Many of our issues are within the creek bed and streambank stabilization is not a priority. The South Fork Crow River 1W1P ran a model to see if all the identified resources were corrected what the outcome would be, which showed that we still would not meet the TMDL.

Drinking water was not enough of a focus in the watershed plan.

Not really as there is not a perfect model and each LGU does things differently so figuring out challenges ourselves has been working well.

N/A

more dedicated funding to nutrient management through N application rates and manure storage.

Encourage enhanced dialogue between the Clean Water Council and the Lessard Sams Outdoor Heritage Council to understand how future strategies compliment and not duplicate efforts (e.g. preservation and protection). Continue to emphasize the Councils' programmatic and systematic approach to address nonpoint pollution.

Distractions from shiny new issues are always a risk. We need to remember that the underlying need is to find, assess, plan, and implement corrections to unsustainable pollutant loads. The state has a broader responsibility, but the Clean Water Act and impaired waters need to stay the top priority for these dollars while they last.

PFAS being overlooked for too long with poor solutions developed for dealing with them

Funding toward the Ag BMP program with the high interest rates. We have a waiting list of 1.5 million. Every piece of equipment or project done with these funds improves water quality.

Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

Resources for continuous, long-term groundwater monitoring is not where it should be. A network of wells and funds to implement continuous monitoring is needed, particularly in those areas with nitrate concerns. Additionally, the surface water monitoring that we have has identified internal nutrient sources greatly impacting a number of lakes. The WBIF allocations and biannual CWF competitive grants are inadequate to address this large source of nutrients.

Ditch buffers have improved, but drainage remains too fast to settle out bad chemicals used in farming

When working with the landowner on a structural ag practices incorporate non-structural practices to protect the structural practice.

There is always room for more emphasis on chloride reduction.

Significantly greater funding is needed of the BWSR Multipurpose Drainage Management Grant in order to retrofit aging public drainage systems with clean water BMPs. Significantly greater funding is needed for flood impoundments that often serve multiple benefits - including natural resource and water quality enhancements.

Nutrient reduction for ag

No

not enough emphasis or action on protection of still intact high-quality systems

More funding to prevent the use or reduce the use of forever pollutants

We need to be more holistic in how we think about water in the state; increase public awareness of water issues.

how water sustainability is evaluated for water appropriation is a massive issue in this state. the money that's been spent on white bear lake is offensive. the lack of investment in chloride alternatives and alternative snow and ice management

Better communication to be able to tell more compelling success stories to the general public.

I wish the funding would be more focused on drinking water quality and quantity. I think we have definitely missed the mark on this and we are getting closer to crisis mode.

Nonpoint source pollution, including from agricultural sources, but also urban sources; the MS4 program for cities

MPCA delineation of PFAS plume should cross the river, MPCA/DNR should prioritize drinking water with 3M Settlement Funds, need more attention to AIS

That is always in question and we continue to examine that with all projects and programs. It's not a main focus of our work, but there is a need to develop markets/market partners for alternative grains/crops and products that come from sustainable farms. MASWCD continues to work on capacity funding for SWCDs. It is a challenge to continue to chase grants to retain staff once they are trained for their job or a program. All offices are different in this aspect, but most could use some more stable funding in that regard. There is not a lot we can do about federal funding requirements, but it would be helpful if NRCS programs were not as burdensome to use. I say this not just for the landowner, but for staff administering the funds, as well. The groundwater issue should have had attention sooner. Maybe the EPA petition was necessary to move things forward on that, but that is unfortunate. State agencies need to continue to find ways for information sharing between one another to make progress.

no.

Is there anything that you wish would have been done differently - something you don't feel was emphasized enough, missed the mark, or otherwise could have been improved?

I wish the Clean Water Council would help promote the establishment of Watershed Districts in areas that do not have one. I believe the best projects are done on a local level and much of the state is lacking a WD. I believe more could/would be formed with help and encouragement/resources/knowledge from the Clean Water Council..

Banning PFAS Manufacturing has been too long delayed, even after the 3M settlement, and ongoing failure of numerous Municipal Water LSupply Wells

Contamination from landfills preexisting liner and monitoring requirements.

More state funding would have allowed additional improvements.

The local wastewater treatment plant has been through a design phase for a new plant, but the design is flawed & doesn't adequately address the final out flow water quality.

feedlot regulations are not strong enough, mining regulations need to be stronger. When public policy is enacted, protecting large corporations from financial obligations to prevent and clean up pollution is not ok. Public and ecosystem health suffers when this happens.

need to hear what. has been done for the \$ spent and what have been the results

State and federal regulating agencies who have delayed/blocked restoration projects because the project didn't fit exactly into their "ideal" for a project

I don't think this is exactly a Clean Water Council, but some WDs have been using MPCA's lakes to wetland reclassification to circumvent shallow lake WQ regs. How can something that people have been calling a lake since the 1860's, identified in the PWI as a lake, suddenly be a wetland- but lakes of similar characteristics be a lake elsewhere. Maybe there should be a "very shallow lake" standard instead, not a bureaucratic reclassification to a wetland.

Increase management of forests to increase health of the trees/vegetation and improving the states water quality.

We have a new growing list of biotic impairments being driven by shoreline development. The protection and restoration of natural shorelines has fallen to the local level, while the DNR continues to make it easier for landowners to remove native shoreline habitat and replace it with riprap.

better understanding of where the CWF dollars are being spent

Many things, but the general thread is that we have failed to appropriately display the cost of impacts to water systems coming from industry, businesses, residents, and land use change. The regulatory agencies and organizations have failed to enforce the public mandate for cleaner water.

More emphaiss on the benefits to wildlife (terrestrial and aquatic) from the restorations efforts; more goals towards drinking water and groundwater; more goals towards to outreach and education

Better promotion of CWF projects to the general public

Competitive grants have their place, but substantial local planning efforts (such as watershed management plans) already receive local and stat approval. Directly funding those plans would allow local entities to better plan and collaborate with a more flexible timeline and funding assurances.

future challenges

Better stating/understanding of the long term commitments to operation and maintenance of the infrastructure that goes in as part of CWF grants

Keeping in mind that more than the Clean Water Fund will be needed to meet clean water goals, what do you hope we are celebrating by 2034? What do you hope we will have accomplished or made some degree of progress on?

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Significant reduction in active TMDLs; no more PFAS production; design of buildings and infrastructure takes winter safety into account

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Everyone has access to clean water

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Continue to see our lake quality numbers improving.

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Changing our perspective on beavers. They are valuable ecosystem engineers that improve water quality. In MN they are considered a nuisance, however, in many cases they can be coexisted with with simple flow devices.

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I hope we are celebrating the reauthorization of the Land and Legacy Amendment. I hope we have a list of delisted waters as well as a list of waters that have improved or stayed protected (for those not impaired). It'd be great if we were well on our way to reaching Minnesota's hypoxia N goal.

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While a lot of focus is put on restoration of impaired waters, I think we need to recognize the efforts to protect the waters that are not impaired. Keeping those waters from declining is a win as there is still a lot of development pressures from human use that continue to happen. I also hope that groundwater resources are a focus area as 75% of Minnesotans get their drinking water from ground water sources. We will also need to be able to document success stories of projects completed and the impact realized from those projects.

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I am hoping we can prove to the legislators and public that we are working hard - and prioritizing where the fundings is going - WHICH MAKES A DIFFERENCE THROUGHOUT THE WHOLE STATE!

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Increased natural shoreland, stronger regulatory framework, widespread adoption of soil health practices, public awareness and, importantly, a renewed amendment.

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More water resource delisting- including new biotic impairments. Greater protections (through rules) and measurable actions (through prioritization and targeting) in outstate Minnesota through One Watershed One Plan.

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Cleaner water, Surface water.

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A better understanding of the agricultural landscape and celebrating all the great work that is done for clean water in Greater Minnesota.

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Prevention of the issues we are navigating to correct.

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Change mindsets (develop basis for a better future without need for fighting the end issues), invest in R&D, Get all the Impaired waters out of the list by 2034.

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More delistings of impaired water and some level of success in groundwater improvement

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large scale adoption of soil health practice that directly benefit water quality like cover crops, and reduce tillage. reduced erosion from water run off. affordable and safe drinking water for all rural residents

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updated stormwater requirements and stormwater knowledge since 2008 will and are still having a positive effect and will continue to see improvement in the future. stormwater design from the beginning could last 100-1000+ years. just think if the stormwater rules around today were in place during the industrial revolution.

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A combination of better collaboration with like minded groups, more wetland restorations, and more collaboration with ag & industry

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Making decisions in St Paul that actually work for increasing water standards. Funding,

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De-listing impaired waters. Safer drinking water for both surface water sources and groundwater. flattening the trend in rising CI. replacing and upgrading aging and undersized stormwater infrastructure shortening the impaired waters list

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Keeping in mind that more than the Clean Water Fund will be needed to meet clean water goals, what do you hope we are celebrating by 2034? What do you hope we will have accomplished or made some degree of progress on?

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More effective processes for getting conservation on the ground

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Addressing Sediment TMDLS - at least decreasing loading (it takes time); reducing phosphorus impacts to surface waters.

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A broad inclusion of the full water cycle in dealing with water issues at all levels..

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Maintaining the current status of the water quality in Northern MN.

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I hope we can have decreased mercury impairments across the state, or have progress in permitting towards meeting those TMDL goals

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Including forestry as the key to water quality and creating much better support for funding forestry projects

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Success would be observed water quality improvements through monitoring, highlighting that modeled implementation reductions are realistically providing benefit.

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Implementing practices that actually improve drinking water quality in southeast Minnesota, delisting of waterbodies, improved overall knowledge of chloride impacts

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Developers being accountable

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We need more statewide regulation like the buffer law. Funding for implementation is an amazing resource but not enough to meet water quality goals. We need to protect what we have and build resilience.

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I hope we're continuing to work within the framework, which means we're still implementing. The question nails it, it will take CWF and more! We've had small wins along the way but we never said we would have flipped (or protected) all 10,000 lakes in only 25 years.

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Positive progress towards local goals

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Cleaner Mississippi River, lakes and streams, key, notable projects funded by CWF

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Meaningful understanding, implementation, protection, and restoration that provide true value back to the connection between citizens and the water resources of MN. A tangible understanding of successes since 2008, honest areas for growth, and areas to consider change. Where was the money spent most effectively to see the entire watershed management framework through from start to finish, rather than just a brief look at one part of this process.

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NIL

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Delisting of some impaired waters would be nice, groundwater improvements - As a society we understand how we impact water quality and take that into consideration with our individual decisions (personal value to water quality and stewardship role).

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clean river standards, spray buffering laws, pesticide mitigation, checks and balance of adherence to CWA, no effluent violations

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I hope we will have made progress on the goals identified in watershed plans. Goals such as nutrient reductions in lakes and rivers, forestry protection goals, and urban stormwater treatment goals are targets that I hope we have made progress on.

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We can see changes on the landscape and that everyone is aware of what their tax dollars were used for.

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Waters delisted from impaired waters list. Positive water quality trends. Safer and cleaner drinking water. More storage. Greater awareness on water quality issues.

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Keeping in mind that more than the Clean Water Fund will be needed to meet clean water goals, what do you hope we are celebrating by 2034? What do you hope we will have accomplished or made some degree of progress on?

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I hope we can show change in active imagination about roles in clean water. It cannot be simply celebrated as the work of natural resource professionals. This cannot be done without public/private cross sector partnerships and action.

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Improvements to our water quality and resources...that would be the best success story.

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A continued commitment by the State to provide adequate funding to local government units through the WBIF program and long-term dedicate support to SWCDs, they are the best agency to coordinate with partners and landowners to help get conservation on the ground.

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i am already celebrating...a lot of good things are going on in MN my hope is that this will be renewed in 2035 if it is not, we will be taking a step backwards.

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Public understanding of their impacts, big and small over time on the resources; more protection and continued science for the water resources; changes in some of the behaviors of landowners to better support what they are doing and conservation needs for clean soil and water

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Each and every project has a variety of goals. Our goals are water quality driven, which are met when rain is in moderation. The landowner has a different goal to make something more profitable, or to not break off sprayer tips etc. When the rainfall is below or average, we see the improvements, but God bats last.

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There have been, and will continue to be more, public waters removed from the impaired waters list.

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Delisting impairments on streams and lakes in our area. Additional funding for SWCD's to continue to implement projects.

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The number of impaired waters has decreased since 2008 or at a minimum, there is a better understanding as why waters are impaired in certain areas and watershed plans are attempting to address the issue.

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One major accomplishment that I hope we can celebrate is that the amount of new impairments from sediment and nutrients on lakes, rivers, and streams has decreased on average per year since the implementation of the CWF. This would show that we have been able to reduce and clean the runoff from urban and rural areas. In addition to reducing the number of new impairments, that we see lake trends trending towards being less impaired. Ultimately, removing waterbodies from the impaired list is the end goal but things take time so just showing positive trends in that direction would be a success.

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Improvements in lake water quality, more private landowners taking action, planners and elected officials considering ordinances that protect the states investments in clean water

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Lakes and rivers that are always safe to swim and fish in, water that is always safe to drink above and beyond what federal regulations require

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impaired waters list cut in half and while seeing our 'nearly-barely' list expand.

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While the Clean Water Fund is a major investment for the state -- the amount of State's general fund for the environment is less than 1%. For state policy leaders, the CWF should not be viewed as a reason to not support general fund investments.

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We need to see meaningful progress on having impaired waters delisted and have underlying state water program budgets developed and funded to do the ongoing work.

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Protection and improvement of surface waters while understanding the role that ground water plays

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Enough funding in the Ag BMP program so we don't have producers/landowners on a list for funds for 1.5-2 years. We appreciate the money put toward this program; it just has such a demand that unfortunately the extra funds only covered one project.

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Keeping in mind that more than the Clean Water Fund will be needed to meet clean water goals, what do you hope we are celebrating by 2034? What do you hope we will have accomplished or made some degree of progress on?

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We should hope to be celebrating success in a variety of ways - 1) delisting of impaired waters, 2) increase in user perception of water quality, 3) an educated public on threats to drinking water, 4) some positive trends on groundwater quality

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Better field drainage or more community septic systems versus individual

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Delisting of impaired waters, increase in awareness from the public, landowners being more conscience of land management, non-structural (soil health) practices being incorporated into farming operations.

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I would like to see more progress on holding the source of pollutants more accountable.

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Ecological integrity

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Improving aging public drainage systems in agricultural areas with Multipurpose Drainage Management designs.

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More cross sector partnerships and alignment and coordination across public and private and community groups

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Chloride reduction in surface and ground water resources

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Hope to have addressed increasing chloride issues and other impairments

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We can quantify what we have learned, what we have accomplished, and what still needs to be done salt reduction

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Enough public support to reauthorize the fund;

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climate resilience: stormwater, source water (supply), ecosystems... water reuse... understanding the multiple benefits of clean and plentiful water

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More awareness, implementation, and progress on improving drinking water quality. Better awareness by more taxpayers of the incredible opportunities that CWFs have brought to MN's resources. A more resilient MN landscape to withstand the effects of climate change. More agricultural producers understanding and profiting from increased conservation on their lands, both with structural (erosion control structures) and nonstructural (soil health) practices.

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I hope that we have pivoted to focus more on drinking water protection (quality and quantity) and that we can celebrate a healthy future for generations to come.

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reducing nitrate/nitrogen effluent statewide, broad monitoring of microplastics and contaminants from automobiles

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Progress on groundwater quality for certain and decrease in impaired streams, lakes and rivers. I want to see a turnaround to good quality habitat on some of those and focus on continuing outward from good projects to add and connect additional good habitat and management practices. I would like to see SWCD offices, as a base, to have stable funding for general operations and staff to provide core services rather than be thinking about how I will plan for passing off management of 50 fund balances to track.

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salt reduction in stormwater; more stormwater reuse projects so there's less demand on groundwater; more meaningful incorporation of indigenous voices and practices

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I really hope the Clean Water Fund is renewed and passed as legislation again in 2034. That's what I hope we are celebrating. But also continued delisting of impaired water bodies.

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I hope we are crunching data so that we can show the tax payers that we ARE making progress on cleaning up/restoring our water and not just "saying" we are.

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We are celebrating the renewal of the CWF; that we have made significant progress on the chloride problem; that we everyone respects and conserves water

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Keeping in mind that more than the Clean Water Fund will be needed to meet clean water goals, what do you hope we are celebrating by 2034? What do you hope we will have accomplished or made some degree of progress on?

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MN needs to act now, in 2025, to ensure MN HOME Drinking Water is LEAD FREE and END THE PFAS THREAT to potable water! L

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Identifying PFAS sources from the application of sewage sludge as an agriculture fertilizer and its use in compost applied in parks and recreational facilities

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Redevelopment of our urban community with substantial resiliency. Passing along the mission to new champions.

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Reenactment of the clean water and legacy amendment to secure funding into the future

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Drinkable water in 50% of MN lakes!

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the we have 75 percent of the lakes and rivers are clean

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Progress in rural water quality through accelerated state funding and partnership with farmers/drainage authorities

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increased forest management.

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The delisting and restoration of water bodies that are the heart of our communities and the foundation of our recreation.

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Continued reduction in impaired waters.

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I view water quality improvements and habitat improvements will take time.

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Progress on eutrophication;

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Planning (such as 1W1P) should be completed for all watersheds and significant waterbodies with a clear path to success. Progress should start to be realized (we should see the needle starting to move).

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A full state-wide approach to valuing cumulative impacts across scope 3 footprints from products, services, and consumption for water quantity and quality. The cost of impacts and incentives to improve impacts will be high enough to generate novel proactive approaches that can be scaled to other states and countries.

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I am hoping that we have met over half (25% by 2025) of the of the water quality goals set by Gov. Dayton in 2017. As of April in 2024, only over 100 waterbodies have been delisted from the impaired waters list. Now that all the watershed areas in the State are participating in the One Watershed One program, this will only accelerate the outcomes to more water quality improvements leading into more removal of waterbodies on the impaired list.

---

Continued improvements to protect groundwater/drinking water

---

Delisting of waterbodies, water quality improvements, community benefits, water heroes, marquee projects

---

Cleaner water.

---

Increased collective understanding and societal cooperation to integrate water resource protection into the economic vitality of our state.

---

De-listing impaired waterbodies, preventing impairments, demonstrating success to the people who voted for the funding (and to those that didn't)

---

cleaner water (surface, drinking, gw), improved access to water, reduction in flood vulnerability via adaptation work.

---

partnerships, leveraged funding, re-authorization of CWF, public support and understanding of water issues

---

Please use the space below for anything else you'd like to share about clean water efforts in Minnesota:

SWCDs are a great resource for connecting the public with existing programs for implementing water quality improvement projects. Due to the diverse nature of these programs, more funding is needed to have more staff available that specialize in certain areas.

Volunteerism if the key. Keeping volunteers coming and engaged is the way to keep clean water efforts above

We need to think about systems. Project-based programs are a dead end. We need to think about water embedded in our food, fuel, homes, transportation- and finance the efforts accordingly.

REMOVE WEEDS. AND OTHER PLANTS THA TCOME UP IN THE LAKES.

Clean Water Funds are not being used in accordance with statute (law) and should be reviewed and/or audited for efficacy before it is allowed to request taxpayer funds again.

Are we taking the necessary steps to assure safe drinking water suppliers for all Minnesotans?

WATER IS LIFE!!!!

Please use Prove It First for water use.

Kids in elementary school need to become serious ADVOCATES for all of our waters!

Protect boundary waters and other fresh water sources from mining and data centers

Agencies have been aware of the nitrate problem here for over 40 years, but have done little to specifically address the problem.

The task ahead of us is not merely a regulatory one. A comprehensive, community-based, statewide reconsideration of the value we want to place on our water resources appears to be needed to make real headway. Our efforts to date have not moved the needle in terms of the change we need. I recommend we engage our communities at the local level, and have the discussions, bringing in our arts communities to lead the effort. Wouldn't it be interesting to have a discussion, and establish a metric even, on what value our communities ascribe to their water resources? We have the data; now we need to get people thinking in new ways. Having conversations. They could be enjoyable, welcoming conversations, that touch people's hearts. Perhaps only that level of engagement can work to shift the ground underneath us.. Look into the Winona non-profit "Art of the Rural". Led by Matt Fluharty, this non-profit could actually create and underake thie kind of effort I'm imagining successfully.

too much talk & too little action

I have a female friend who is in her 30's. She just bought a house at the bottom of a bluff near the Mississippi. She works 2 jobs to make ends meet. She is low on the list for getting her well tested and if she does find out that it is contaminated, it is up to herself to fix it. No remediation allowed. Now if she were to get pregnant, then it would be covered. But until then she has to drink water that could make her ill. This is downstream thinking versus upstream thinking which is harmful to people's lives.

Use "plain talk" when conveying messages to consumers. Some people dint care because the issue appears to not impact them

Lets do this!

Nothing

The soil and water conservation districts are the unsung heros of many of our water quality efforts in Minnesota.

I appreciate the systematic approach to getting clean water funds out to local goverments (the boots on the ground) to work with landowners to adopt conservation practices. The WBIF program has allowed SWCD's in particular to deliver implementation of projects and leverage other funds to make a larger impact.

Please use the space below for anything else you'd like to share about clean water efforts in Minnesota:

---

Our staff is working diligently to bring awareness to our constituents!

---

AIS is still significantly underfunded for prevention, early detection, and research. The DNR has been derelict in it's duties to research and set reasonable setback and depth of water for operations of wake boats.

---

I love it .. it resonates my personal and deep concerns. I am an immigrant and back in my home country miss management of water resources has damaged so many things including people's lives and livelihoods and am happy to see you as the leader are paying intentional attention to it.

---

I believe we need to prioritize clean water projects that are multi-faceted. Ex: RIM Easements in pothole areas that receive more than typical surface water runoff AND incorporate flood storage within for add'l benefits.

---

it never ends, and thanks for your efforts

---

Too much gets diverted to the larger state agencies, bureaucrats, and others who are not critical to the boots on the ground projects.

---

Environmental groups are going to make it harder

---

The watershed district I work for has implemented large scale projects for nutrient reduction and our monitoring is collaborating our reductions. These projects are multi-year efforts and require funding.

---

I just hope you continue to talk about forestry efforts the DNR and SWCD's are doing and to continue to support their work in forestry efforts

---

Coordination between State and local implementers could be improved, more assistance and explanation, analysis and demonstration from State agencies to locals on available studies, reports, plans and analysis and how to most effectively utilize and incorporate locally.

---

Cities not turning a blind eye to developers

---

I think public education has been successful and more is needed. Things like education about shoreline restoration or preservation, or urban stormwater practices. Cattle farmers have been doing great keeping livestock out of lakes and streams! Cover crops are on the rise, we must keep that going.

---

There are water bodies that may not have risen to a priority level in a plan, folks on those water bodies want an opportunity for work on their lake too. With 10-year planning cycles, only 25 years of funds doesn't shake out. More years are needed.

---

Keep the funds flowing to local organizations

---

THIS PROBLEM IS FOUND EVEN IN ASIA.

---

Critical to quality of life and clean water needs protection. Humans tend to love our waters to death and it needs a combination of voluntary measures and legal restrictions.

---

MOU in place with Tribes

---

I feel like the emphasis on water quality has been effective in shaping and in some cases changing landowners perspectives on their role in protecting or restoring water quality.

---

I've been with this SWCD for 26 years. I've seen the transition from 2000 to 2025. As a result of Clean Water Funding and the watershed management framework, there has been an epic shift in successful implementation, knowledge from evaluating efforts and building the collaborative imagination.

---

Continue to support the local efforts and the boots on the ground. Continue to support funding the plans.

---

Please use the space below for anything else you'd like to share about clean water efforts in Minnesota:

As a SWCD it took nearly 100 years to get the water quality we had. In the 30 years I have worked in this field, the efforts have slowly slid from "plowing" to conservation tillage, and slowly to strip and no till. Cover crops are finally being introduced back into the landscape after the introduction of soybeans to our landscape in the 1960's replacing small grain and alfalfa. We will slowly start moving the dial to improving water quality, but we will need landscape wide changes to do it.

A reauthorization should drop the word "clean" so we can address issues of quantity as well.

Areas are being identified in watershed plans through modeling to address higher priority and therefore a higher degree of success with each project.

Clean water is a hard concept for the general public to grasp as a majority think change can happen fairly quick which is not the case. Many times after a few projects they should be seeing a change in their lake but don't realize that it may take several more projects and years for there to be a measurable/noticeable difference in the water quality. So much more education and outreach to the public will be needed as we can not point to a piece of land that was once cropland and is not wildlife habitat.

Soil and Water Conservation Districts have played a major role in clean water efforts- We have the relationships with landowners that help make them shift in culture and take action!

Continue to support science based and modeling for best management practices (BMPs) activities. The council

They have progressed well and I am proud to live in this state where water is a priority.

They're definitely in the right direction. A lot of people have done a lot of good work to gain the improvements we have seen. Hopefully that will continue and we appreciate the efforts!

Minnesota's updated Nutrient Reduction Strategy makes it clear that we will likely not meet our clean water goals by 2040. An increased level of CWF should be pursued for approval in 2034. Additionally, it will be difficult (even with more funding) to reach these goals through voluntary conservation. A serious look at measures to regulate BMP adoption should be considered. These BMPs should include all applicable non-point sources: rural, urban, and in-lake (wakeboats and motorboats). CWF dollars should support the technical assistance of these required BMPs, provide some cost relief, and support tracking / monitoring of the BMPs.

Keep up the good work

It has been amazing how many partnerships that have been developed through this process.

My weekly buckthorn clearing/native seeding at my local lake through my park board has been an amazing experience. Would be cool to spread the word out more about joining these efforts and communities.

Critical for our state and quality of life; keep up the important work!

Implementation is important, but we need to continue to monitor to gauge effectiveness of that work, and also keep up with a changing environment and emerging issues

Consider different ways of allocating funds - per capita? We need more money for water implementation in the metro, where over half the population lives.

still seeing a lot of siloed approaches, a lack of transparency in process and decision making from state agencies. more focus on outcomes for residents and 7th generation thinking is needed. More focus on traditional ecological knowledge.

There are a lot of good people at various levels of government who are doing their jobs because they want to make a difference in water quality in Minnesota for the benefit of everyone. Those people on the ground are creative and partnering to achieve these goals. Keep making it possible.

Please use the space below for anything else you'd like to share about clean water efforts in Minnesota:

---

I was impressed at the most recent Water Resources Conference at the amount of research going into GW/SW interaction implications. I think this is so important for us to better understand.

---

We are making progress but still have a lot to do.

---

Let's celebrate MN's success well before 2034...in my lifetime, please!

---

Property development that continues the practice of impervious parking lots, and driveways.

---

The first State clean water drinking plan was released

---

Success requires that we are all rowing in the same direction. That means putting aside "blame" for the problem (whether it is groups or activities) and instead focusing on solutions. ANY solution that can substantially advance water quality and water management should be funded, regardless of who may benefit from the work (we ALL benefit from better water quality).

---

Keep it up! It's worth it! (I am a Superfund Site Baby- was in utero and drank water until age 2 or 3 in the early 1980's from the Twin Cities Army Ammunition Plant plume in New Brighton's water supply). No one should be pleading ignorance of the causes of polluting our waterways and no one should be denied access to a clean water supply for drinking, food (fishing, other foods), irrigation.

---

Hoping to see more funding head into the forested region. The projects are inexpensive and provide great protection of water quality.

---

Unfortunately, I believe more regulations and stronger enforcement from entities other than watershed districts.

---

More funding is needed for resiliency, feasibility studies, and implementation.

---

Another Land & Legacy amendment will be needed in 2034 to keep the good work going. In MN we are blessed with our water resources and hopefully we have a number of example projects to point to to make a 2nd Land & Legacy amendment an easier lift.

---

I think we need more prioritization of how/where to spend the state's resources.

---

Don't mix clean water funds with other political agendas

---

The water world is still plagued by siloed and scope 1 thinking. The project money is not tied to the impacts. We must think bigger by stepping back to think about how inputs, outputs, and sectors respond to the market and then ensure that there are not loopholes that lead to the continued extraction and exploitation of the most vulnerable ecosystems and communities.

---

Thank you Clean Water Council for the continued support and having a diverse representation. This type of representation allows all Minnesotans to be aware, engage, collaborate and share the intention for future outcomes. Clean water efforts are going strong and will continue to do so with support not only financially but more importantly through the established collaborations and diverse partnerships.

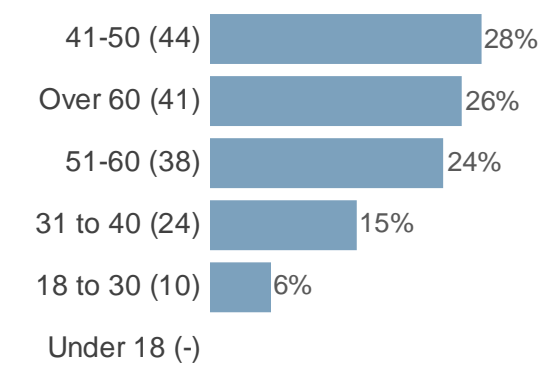
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It is critical that funds continue to go to local jurisdictions and the projects making a real difference in water quality improvements.

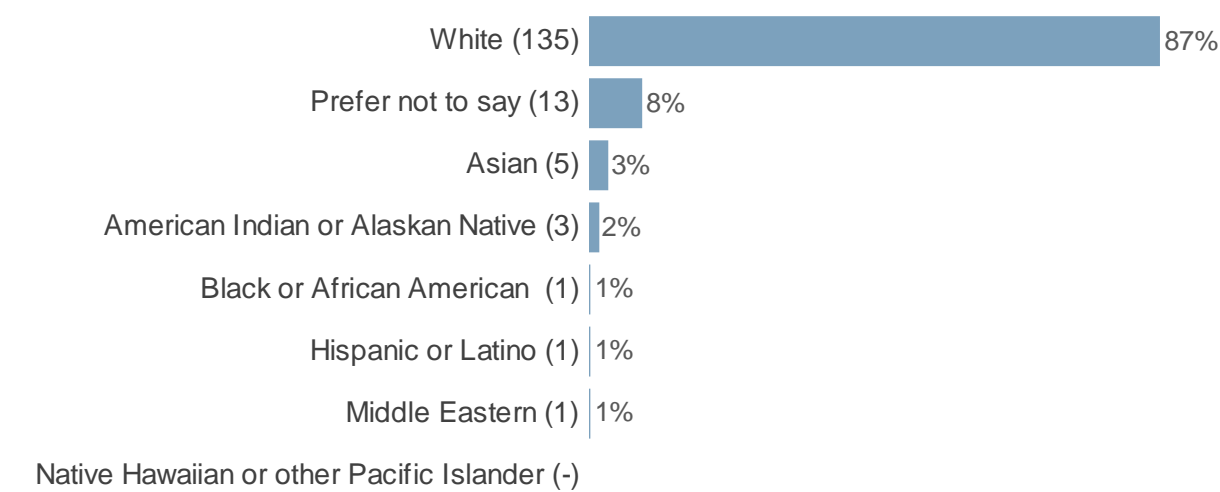
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n/a

Age



Ethnicity



Language spoken at home

English	English	English	english
English	English	English	english
English	Persian	English	English
English	English	English	english
English	English	English	English
English	English	english	English
English	American English	English	English
English	English	English	English
English	english	English	English
English	English	English	English
english	English	English	English
English	English	TAMIL.	English

## Language spoken at home

English	English	English	English
English	English	english	English
english	English	English	English
English	English	US American	English
English	English	English	English
English	English	English	English
English	English	English	English
English	English	English	English
English	English	English	English
English	English	English	English
English and French	English	English	English
English	English	English	english
English	English	English	english

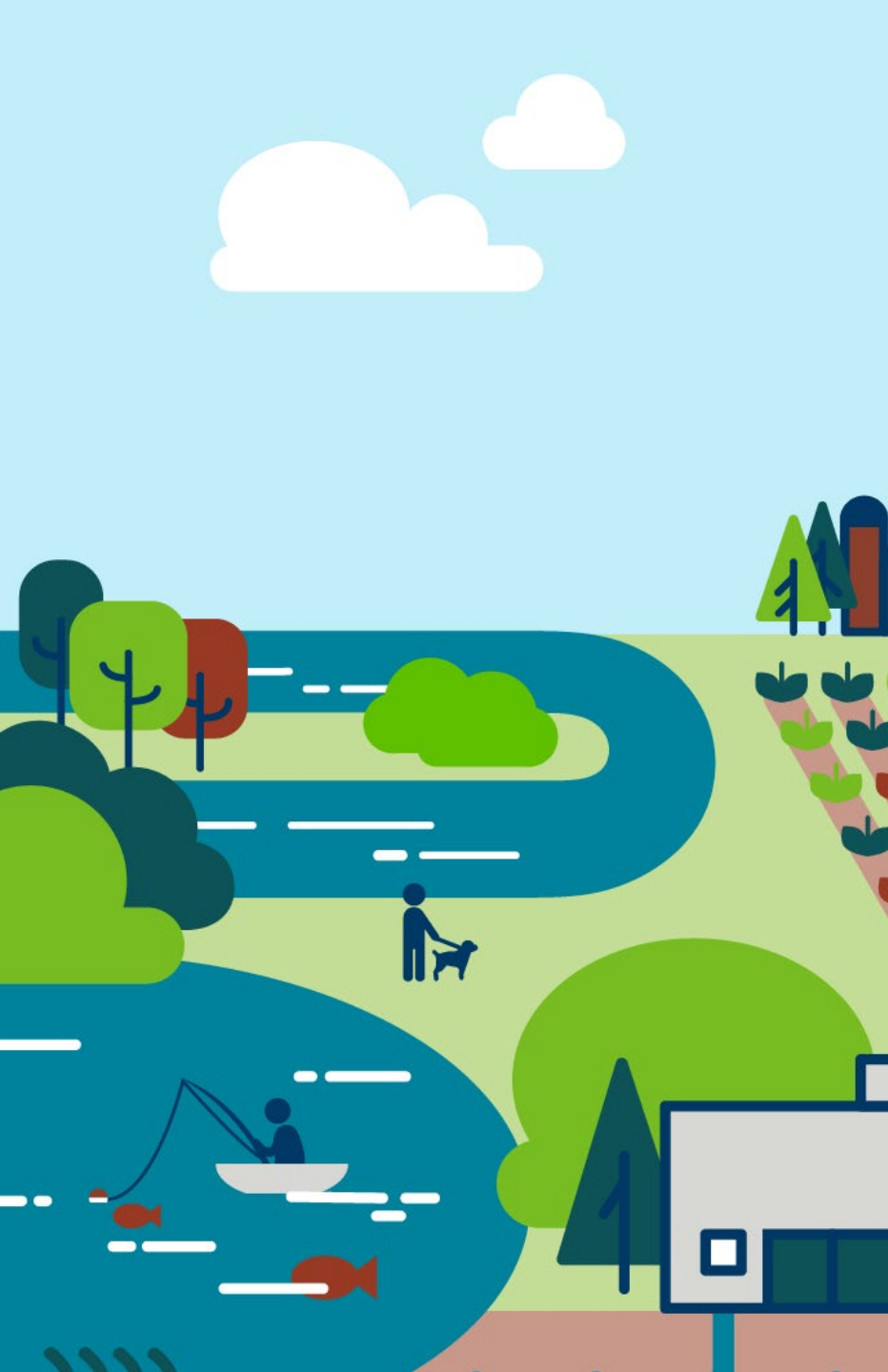
# Clean Water Council Survey

Preliminary results



A stylized illustration of a city landscape. In the background, there are various buildings, including houses and taller apartment-style structures. A network of blue lines, representing water pipes, connects these buildings across the city. The middle ground features green trees and bushes. In the foreground, there's a brown ground area with a grid of small blue dots. On the right side of the foreground, there's a small blue building with a white circle, possibly a water treatment or storage tank, with pipes leading to it. A person is shown riding a bicycle, and another person is walking a dog. The overall scene depicts a community with a shared water infrastructure system.

**What are you noticing? What does this mean for the CWC? What next steps do you think make sense?**



# Overview of respondents

- 159 total responses
  - 56% (83) from metro area
  - 20% (29) from SE MN
  - 10% (15) from NW MN
  - 7% (11) from SW MN
  - 6% (9) from Central MN
  - 1% (2) from NE MN
- Every CWC constituency represented
- Highest responses coming from:
  - Watershed Districts
  - Soil and Water Conservation Districts
  - Environmental Organizations
- No constituency had fewer than 6 respondents
- High degree of familiarity with CWC & CWF



# Overarching takeaways

- There is a strong affinity and love for Minnesota's waters, and people place a high value on clean water.
- We've made a lot of progress as a result of the Clean Water Fund.
- People are very proud of what we've done so far.
- There are some things that could be given more attention.
- We still have a ways to go.
- SE and SW MN feel we've made less progress.

# What comes to mind?

- Abundant water
- Clean water
- Concerns\*
- Drinking water
- Economy
- Gratitude
- Recreation
- Stewardship
- Waters and watersheds



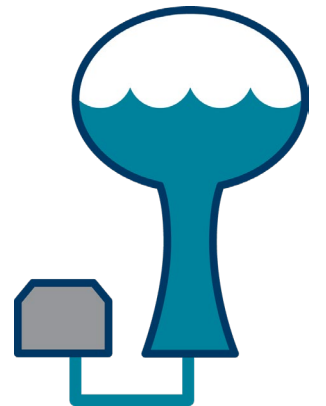
# Concerns

- Agricultural runoff
- Urban runoff
- Nitrates
- Septic systems
- Lead
- Algae
- Erosion and sediment
- PFAS
- Invasive species
- Sulfate
- Flooding
- Infrastructure failures
- Overuse of water (supply)
- Overuse and misuse of water bodies (recreation)
- Chloride
- Microplastics
- Climate change
- Damage to wild rice and other traditional foods and medicines



# Degree of agreement takeaways

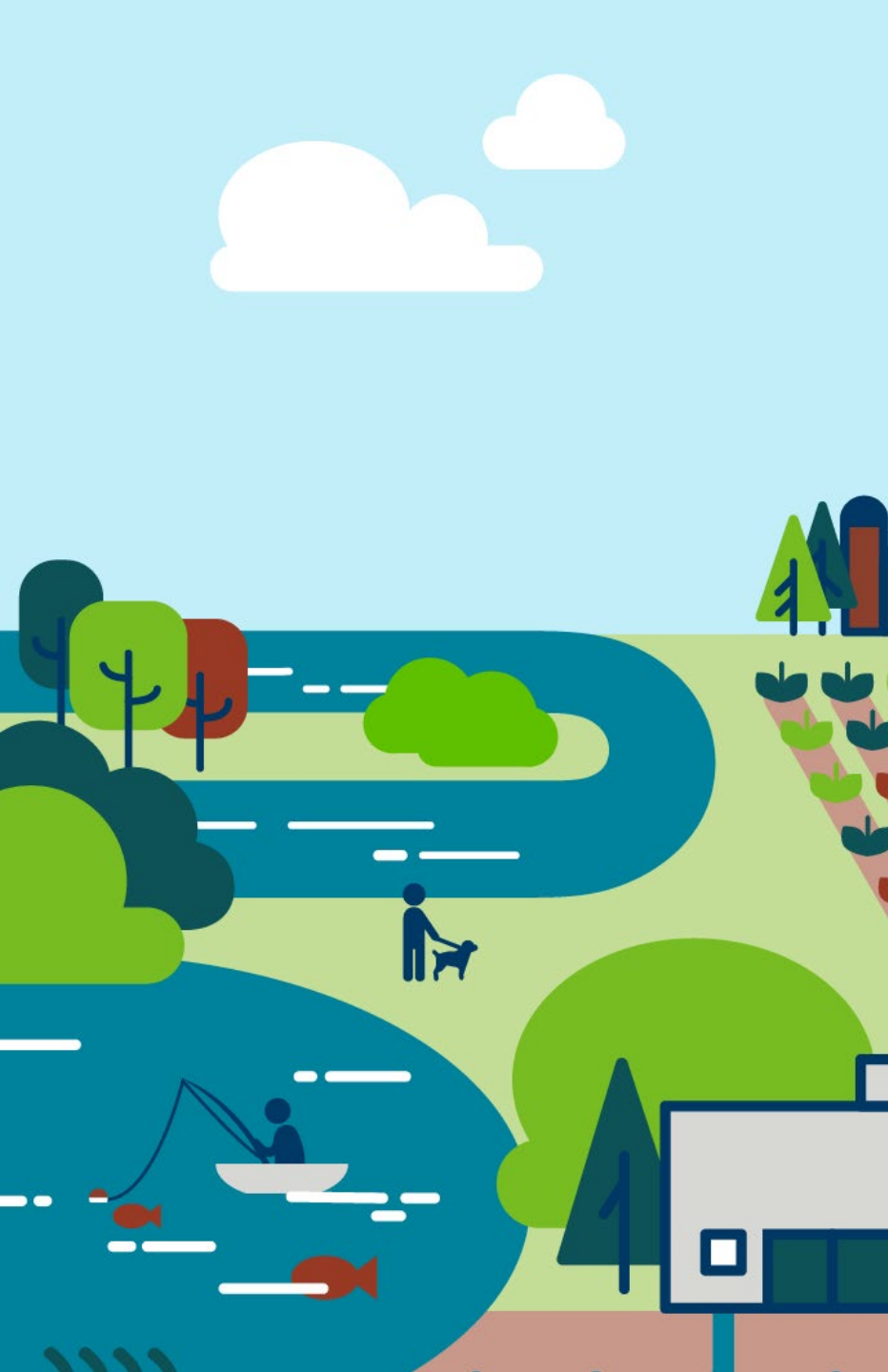
- Folks largely agree:
  - We better understand current conditions
  - We better understand challenges
  - We are seeing improvements to lakes and streams
  - People are more aware of challenges and needs
- Most disagreement is for drinking water and groundwater improvements





## Where have we seen improvements since 2008?

- We better understand current water conditions as a result of monitoring and analysis
  - 39% strongly agree
  - 53% agree
  - 7% neither agree or disagree
  - 1% disagree
  - 0% strongly disagree
  - 3% don't know



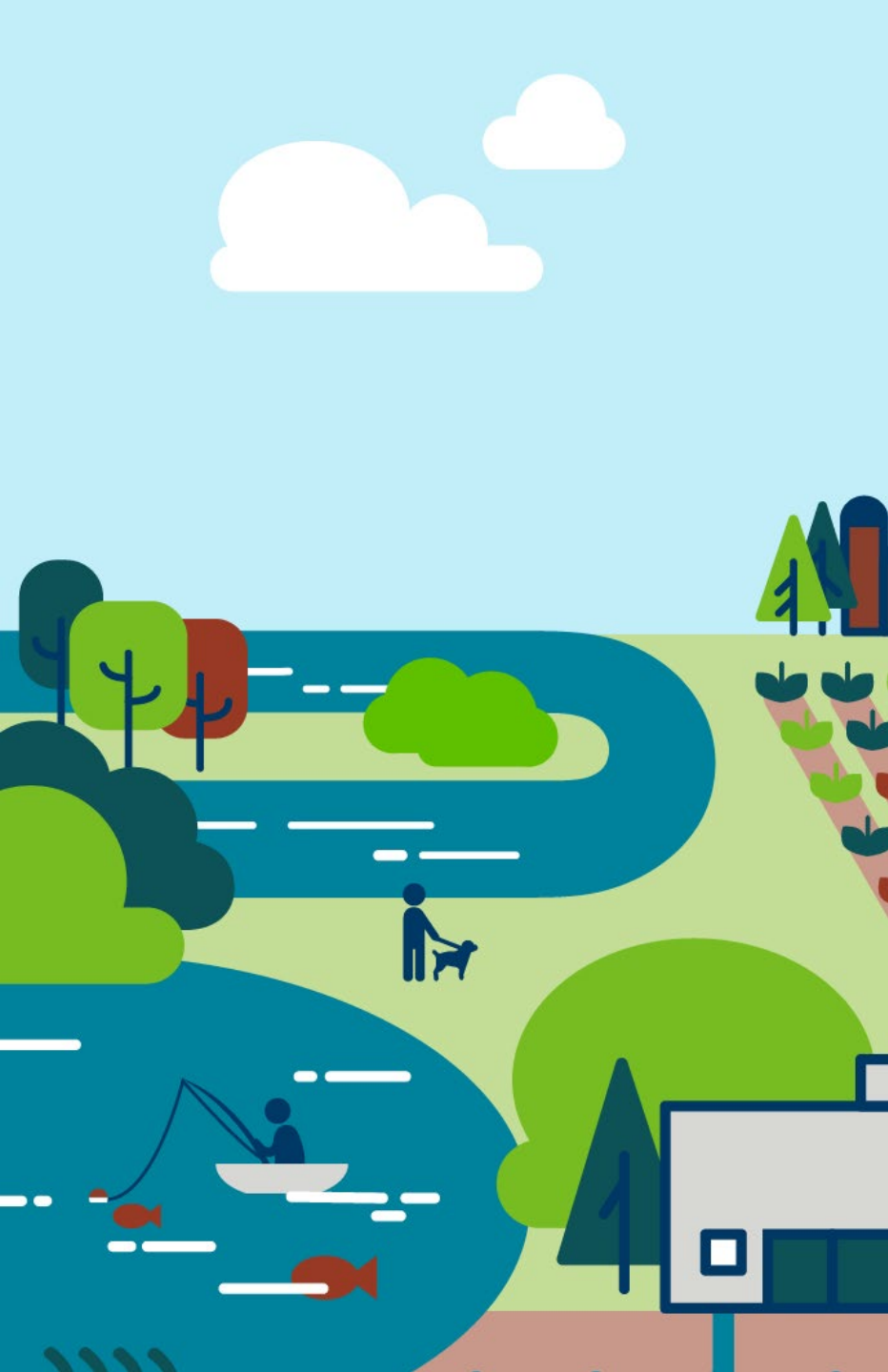
## Where have we seen improvements since 2008?

- We better understand challenges facing our drinking water, groundwater, and surface waters
  - 37% strongly agree
  - 52% agree
  - 5% neither agree or disagree
  - 5% disagree
  - 0% strongly disagree
  - 3% don't know



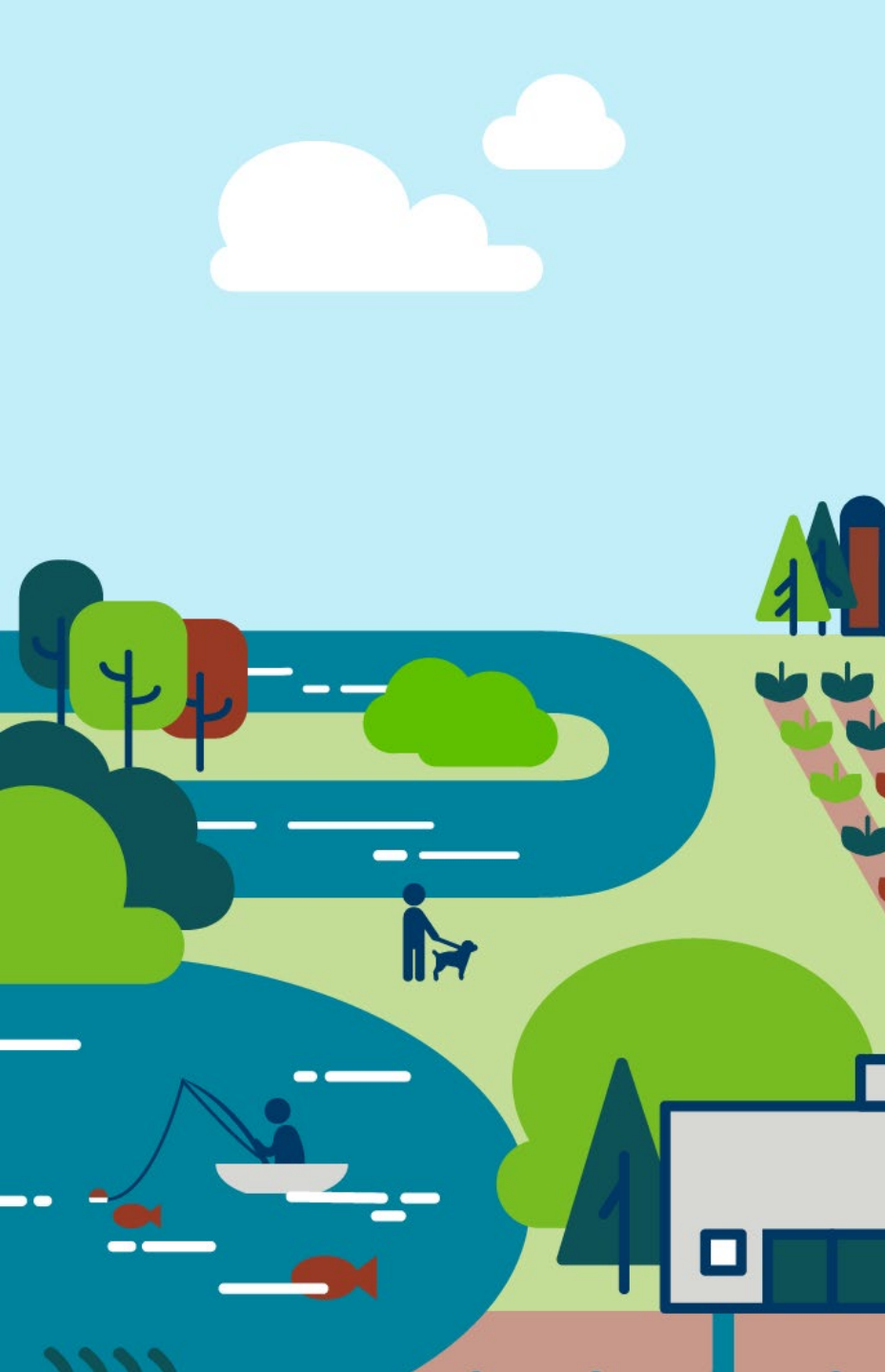
# Where have we seen improvements since 2008?

- We are seeing improvements to drinking water
  - 5% strongly agree
  - 24% agree
  - 35% neither agree or disagree
  - 19% disagree
  - 12% strongly disagree
  - 10% don't know



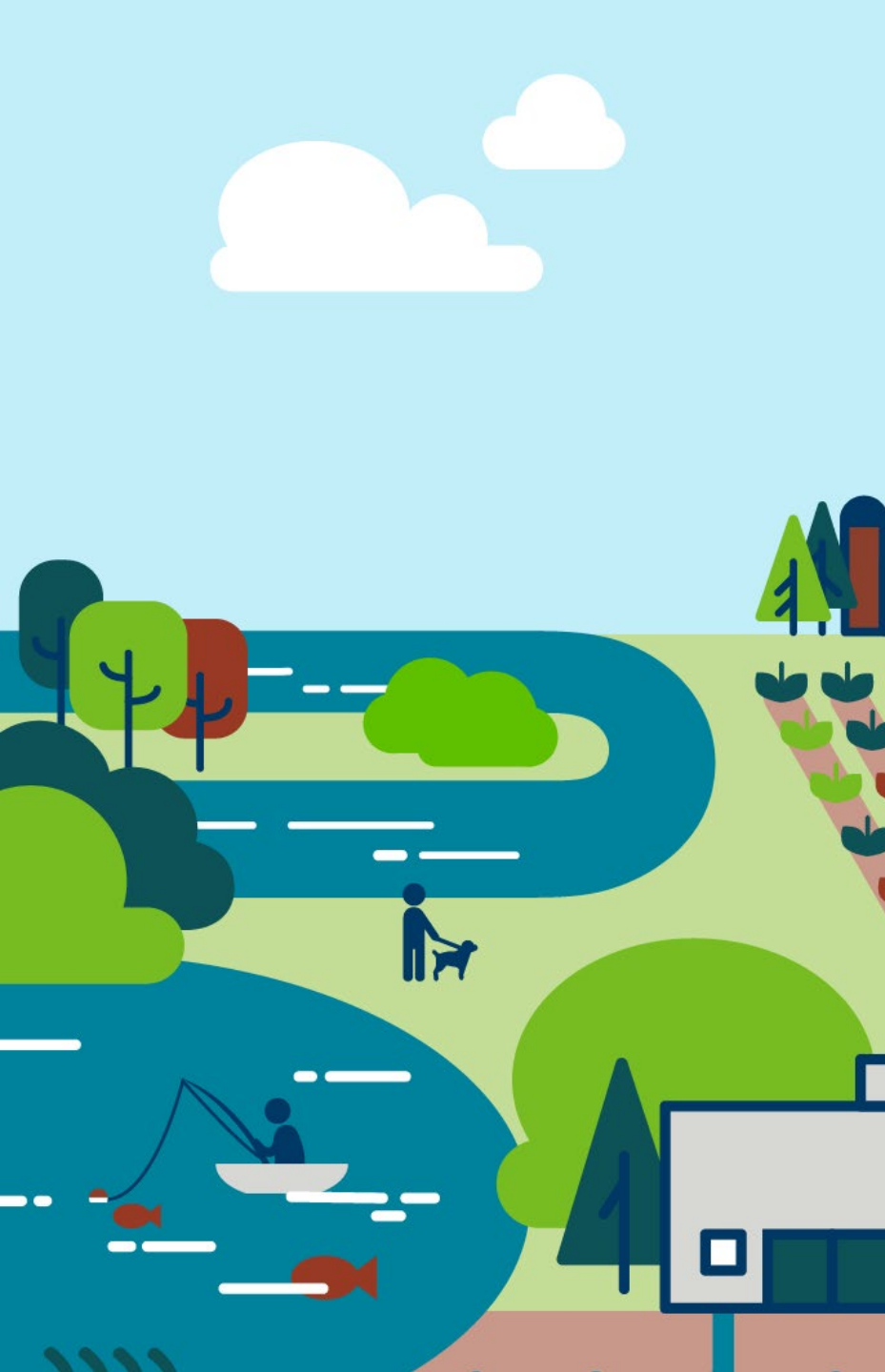
# Where have we seen improvements since 2008?

- We are seeing improvements to groundwater
  - 7% strongly agree
  - 15% agree
  - 33% neither agree or disagree
  - 25% disagree
  - 12% strongly disagree
  - 11% don't know



## Where have we seen improvements since 2008?

- We are seeing improvements to lakes, rivers, and streams
  - 17% strongly agree
  - 50% agree
  - 12% neither agree or disagree
  - 12% disagree
  - 7% strongly disagree
  - 3% don't know



## Where have we seen improvements since 2008?

- People are more aware of water challenges and needs
  - 23% strongly agree
  - 53% agree
  - 12% neither agree or disagree
  - 8% disagree
  - 1% strongly disagree
  - 3% don't know



## Where have we seen improvements since 2008?

- Decision makers have made water a higher priority
  - 13% strongly agree
  - 38% agree
  - 23% neither agree or disagree
  - 21% disagree
  - 6% strongly disagree
  - 5% don't know

# What would they point to as a success?



*"...there has been tremendous change and movement..."*

*"...a game changer..."*



# What would they point to as a success?

- Collaboration
- Education and engagement
- Funding
- Staff capacity
- Science-based approach
- Water quality improvements

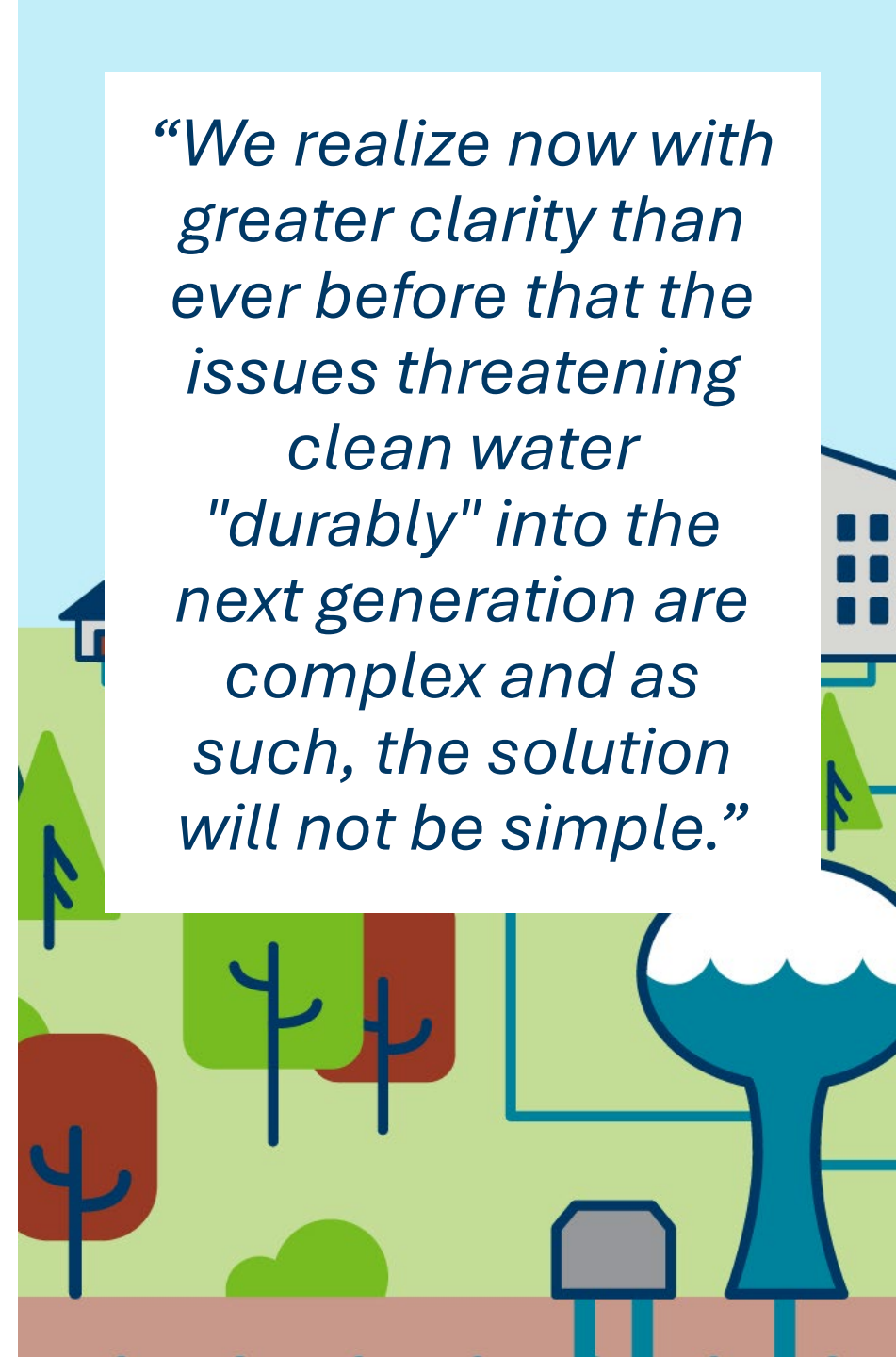
Systematic approach, AND...



# What could have been different?

- Awareness
- Capacity
- Which contaminants or challenges
- Drinking water
- Focus
- Funding mechanism
- Groundwater
- Holistic approach
- Locally-led
- Political will
- Protection
- Scale

*“We realize now with greater clarity than ever before that the issues threatening clean water “durably” into the next generation are complex and as such, the solution will not be simple.”*



# What are we celebrating in 2034?

- Continued commitment, amendment renewal
- Water quality outcomes
- Resilience and responsiveness
- Changes on the landscape
- Shifted norms
- Collaboration and partnership
- Responsible use of water
- Durability of investments
- Holistic approaches
- Accountability
- Local leadership

*"I hope we..."*





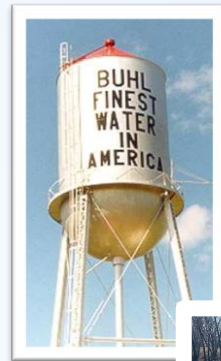
**What are you noticing? What does this mean for the CWC? What next steps do you think make sense?**

# Next steps

- Keep going deeper with analysis
  - Look at how responses change based on geography
  - Dig into tensions
  - Compare answers with Council member discussions from June
  - Isolate key takeaways
  - Draft summary report
  - Share with interested parties



# Water for All Minnesotans



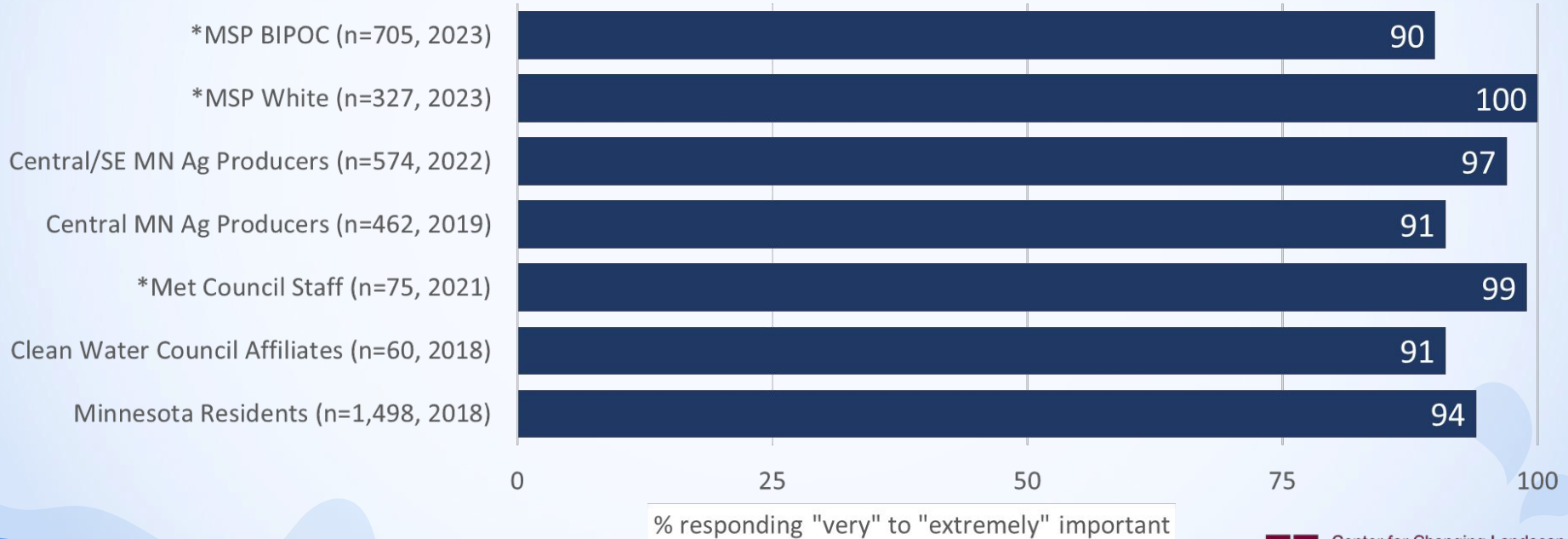
## Minnesota Clean Water Council

Mae Davenport, PhD; Emily Kreiter, PhD; Amit Pradhananga, PhD  
Center for Changing Landscapes  
University of Minnesota

November 17th, 2025

# Clean & safe drinking water is a top priority for Minnesotans

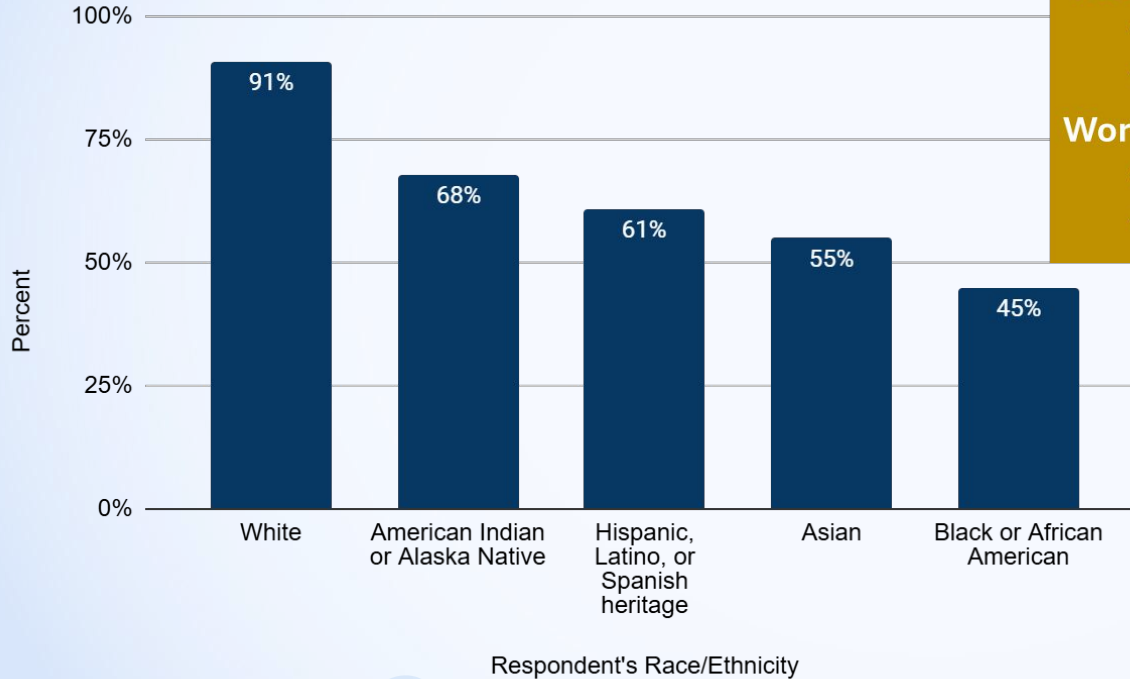
How important is it to protect Minnesota waters for drinking water that is safe and clean?



# Inclusive Social Science Research Methods Matter

	2022 Mail Survey	2023 Onsite Survey	MSP Pop. 2020 Census
BIPOC identifying	6%	67%	30%
Female identifying	39%	55%	51%
Median age (18+)	57	36	-
Median household income	\$100k-\$149k	\$50k-\$75k	\$95k
Rent home	11%	47%	31%

# Who drinks tap water?

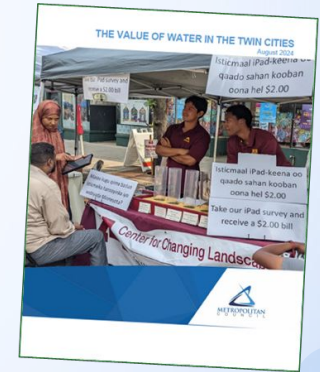


## Trust that their tap water is safe to drink

- 49% of BIPOC vs. 77% of White resp
- 52% of renters vs. 65% of homeowners

## Worry about the safety of their drinking water

- 46% of BIPOC vs. 19% of White resp
- 44% of renters vs. 32% of homeowners



The Value of Water in the Twin Cities, Davenport et al. 2024

# Why social science? To better represent ALL Minnesotans

## Representation Justice:

*People should reasonably expect that the diversity of water relationships and values of community members are fairly deliberated and equitably represented among those in power.*  
(Davenport et al. 2023)



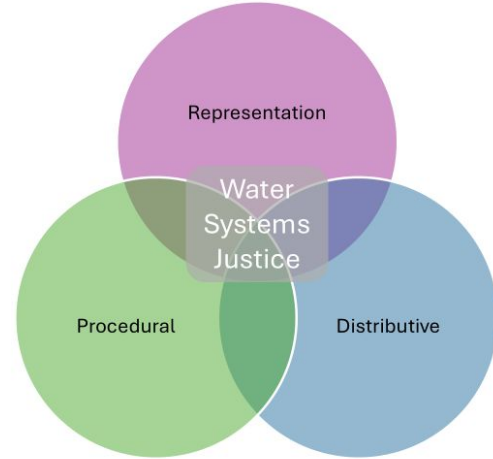
### We commit to...

Using rigorous and inclusive social science research methodologies to gather and share different narratives of water with communities and community leaders.



### With the goal of...

Representing communities and influencing water policy, programming, and investments for water.



# Cultural Narratives on Constraints to Community Engagement in Urban Water Restoration

\*Amit Pradhananga<sup>1</sup>, Mae Davenport<sup>1</sup>, and Emily Green<sup>2</sup>

Environmental Science and Policy 115 (2021) 108–115

<sup>1</sup>Department of F

<sup>2</sup>Center for Chan



Contents lists available at ScienceDirect

Environmental Science and Policy

journal homepage: [www.elsevier.com/locate/envsci](http://www.elsevier.com/locate/envsci)



**Abstract:** Natural resource professionals require not only technical solutions, local community. People of color, at water-related programming or decision problems. Effective engagement of understanding and addressing constraints who live or work in a highly urbanized engagement in local water resource general community engagement level comparative analysis: formal decision members of color. Qualitative analysis common to all three groups: inaccessibility and limited community dialogue are uniquely by community members on inequities or disenfranchisement in findings suggest partnership building and improving water protection and

**Keywords:** watershed protection, social

Transforming research and relationships through collaborative tribal-university partnerships on Manoomin (wild rice)

Laura Matson<sup>a</sup>, G.-H. Crystal Ng<sup>a,\*</sup>, Michael Dockry<sup>a</sup>, Made Mark Bellcourt<sup>b</sup>, Jeremy Bloomquist<sup>c</sup>, Perry Bunting<sup>d</sup>, Eric A. Davenport<sup>a</sup>, Karen Diver<sup>f</sup>, McKaylee Duquain<sup>a</sup>, William Katherine Hagsten<sup>g</sup>, Kari Hedin<sup>h</sup>, Susannah Howard<sup>i</sup>, Thomas Shannon Kesner<sup>h</sup>, Erik Kojola<sup>a,1</sup>, Roger LaBine<sup>j</sup>, Daniel J. L Seth Moore<sup>k</sup>, Amy Myrbo<sup>a</sup>, Michael Northbird<sup>m</sup>, Meghan P. M. Santelli<sup>a</sup>, Riley Schmitter<sup>a</sup>, Robert Shimek<sup>b</sup>, Nancy Schu Donovan Strong<sup>n</sup>, Joshua Torgeson<sup>a</sup>, Darren Vogt<sup>q</sup>, Alexan

SOCIETY & NATURAL RESOURCES  
<https://doi.org/10.1080/08941920.2023.2278147>

Routledge  
Taylor & Francis Group

Check for updates

## Social and Cultural Values and Representation Justice: Implications for Water

Mae A. Davenport<sup>a</sup>, Bonnie L. Keeler<sup>b</sup>, Sarah Roth<sup>c</sup>, Amelia Kreiter<sup>d</sup>, Amit Pradhananga<sup>a</sup>, Emily Green<sup>e</sup>, and Jaren Peplinski

<sup>a</sup>Department of Forest Resources and Center for Changing Landscapes, University of Minnesota, St. Paul, MN, USA; <sup>b</sup>Hubert H. Humphrey School of Public Affairs, University of Minnesota, Minneapolis, MN, USA; <sup>c</sup>Water Resources Center, University of Minnesota, St. Paul, MN, USA; <sup>d</sup>Department of Forest Resources, University of Minnesota, St. Paul, MN, USA; <sup>e</sup>Center for Changing Landscapes, University of Minnesota, St. Paul, MN, USA

### ABSTRACT

Water management involves the provision of water uses and benefits for people and communities, with direct environmental justice implications. Beyond water supply for physiological survival, people depend on water systems for material and non-material values. Understanding how different communities value water and prioritize its protection is critical to effective water governance. We use a psychometric water values scale administered through two survey methods: electronic and paper-based, to explore how social and cultural differences

### ARTICLE HISTORY

Received 2 July 2022  
Accepted 25 September 2023

### KEYWORDS

Environmental justice; environmental policy; representation justice; water equity; water governance;

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<sup>g</sup> Leech Lake Band of Ojibwe, 190 Sallstar Drive NW, Cass Lake, MN 56633, USA  
<sup>h</sup> Fond du Lac Band of Lake Superior Chippewa, 1720 Big Lake Road, Cloquet, MN 55720, USA  
<sup>i</sup> Citizen Potawatomi Nation, 1601 S. Gordon Cooper Dr., Shawnee, OK 74801, USA

# Safe Drinking Water for All:

A Study of Minnesota Private  
Well Owners



Center for Changing Landscapes

UNIVERSITY OF MINNESOTA



YOUR  
Clean  
Water  
Fund  
AT WORK



# Project background

- 1.2 million (21%) Minnesotans drink from private wells
- Contaminants like bacteria, nitrates, arsenic, lead, manganese, & organic compounds in drinking water systems can pose serious health risks
- MDH & UMN partnership to assess Minnesotans' relationships with their private wells

**Protect your health!**  
Test your well water for:



✓	<b>Coliform Bacteria</b> (Every year)
✓	<b>Nitrate</b> (Every year)
✓	<b>Arsenic</b> (At least once)
✓	<b>Lead</b> (At least once)
✓	<b>Manganese</b> (At least once)

Testing is even more important if young children drink the water.

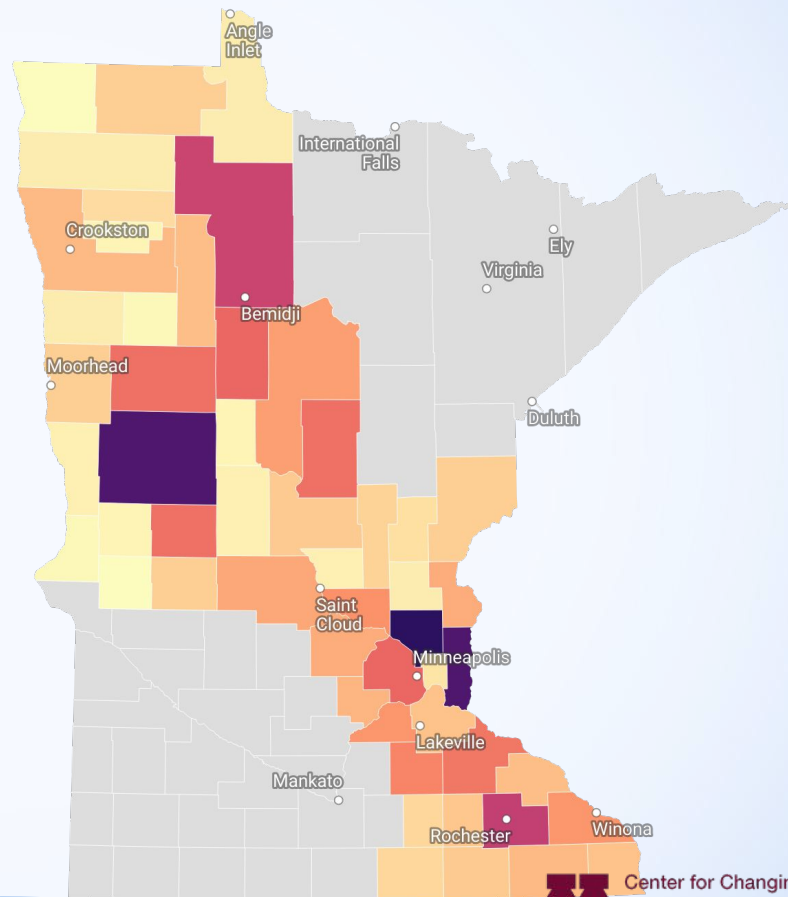
- Survey mailed to 4000 private well owners across the state - 1016 responses received!
- Focus groups with water partners throughout the state to provide input on survey results and prioritize action
- **Data synthesis, reporting, and outreach**



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# Survey of private well owners

## Safe Drinking Water survey respondents



## Who responded?

	Respondents
Male identifying	54%
White	99%
Median age	64
Median household income	\$100,000-\$149,000
Associate's degree or higher	72%

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# Property characteristics



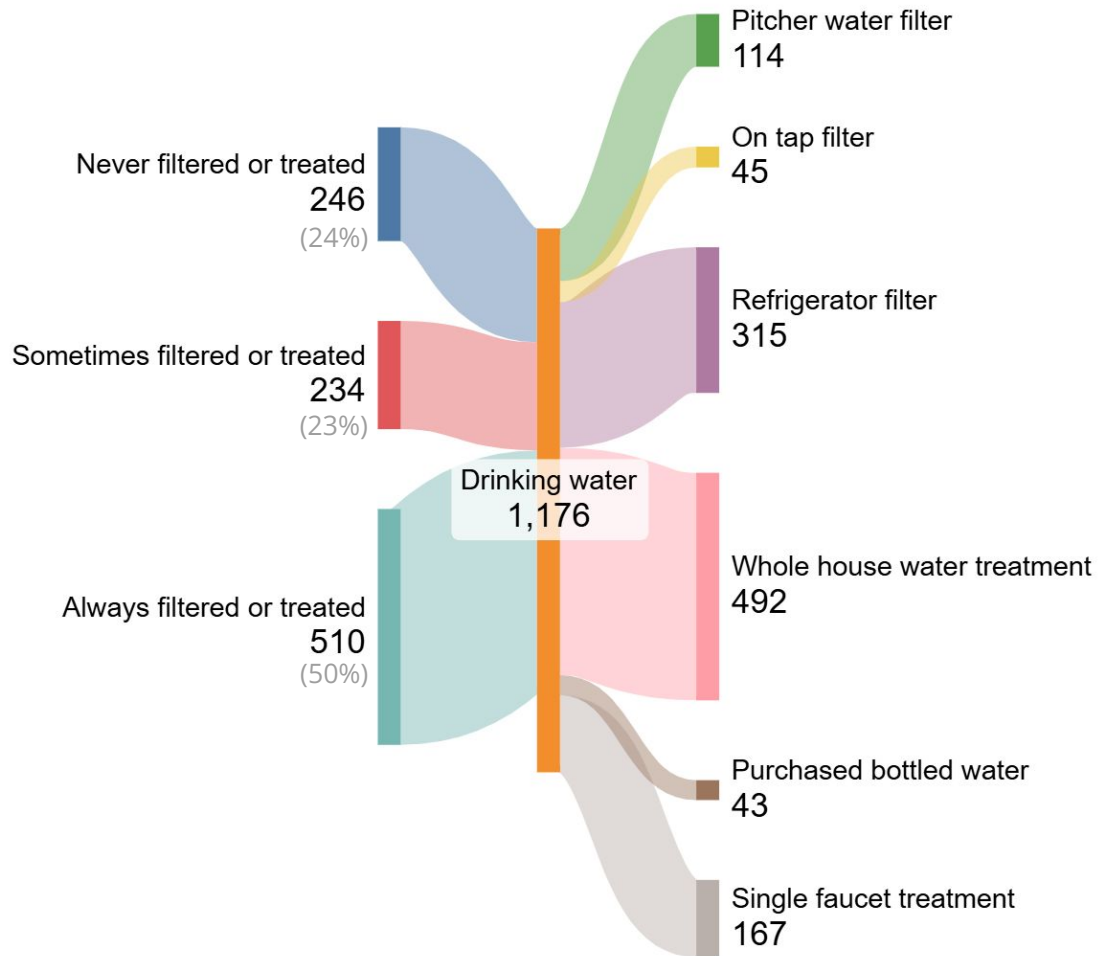
	<b>Respondents</b>
<b>Own and manage their own land/property</b>	96%
<b>Years lived at current address</b>	23 (average)
<b>Number of adults in each household</b>	2 (median)
<b>Households with one or more children</b>	22%

# Where do respondents primarily get their household drinking water?

<b><u>From their private well</u></b>	873 (86%)
<b><u>Purchased water</u></b>	148 (15%)
<b><u>Other source</u></b>	48 (5%)




# How do respondents treat their drinking water?



\*\*respondents could select more than one filtration option  
n≤1016

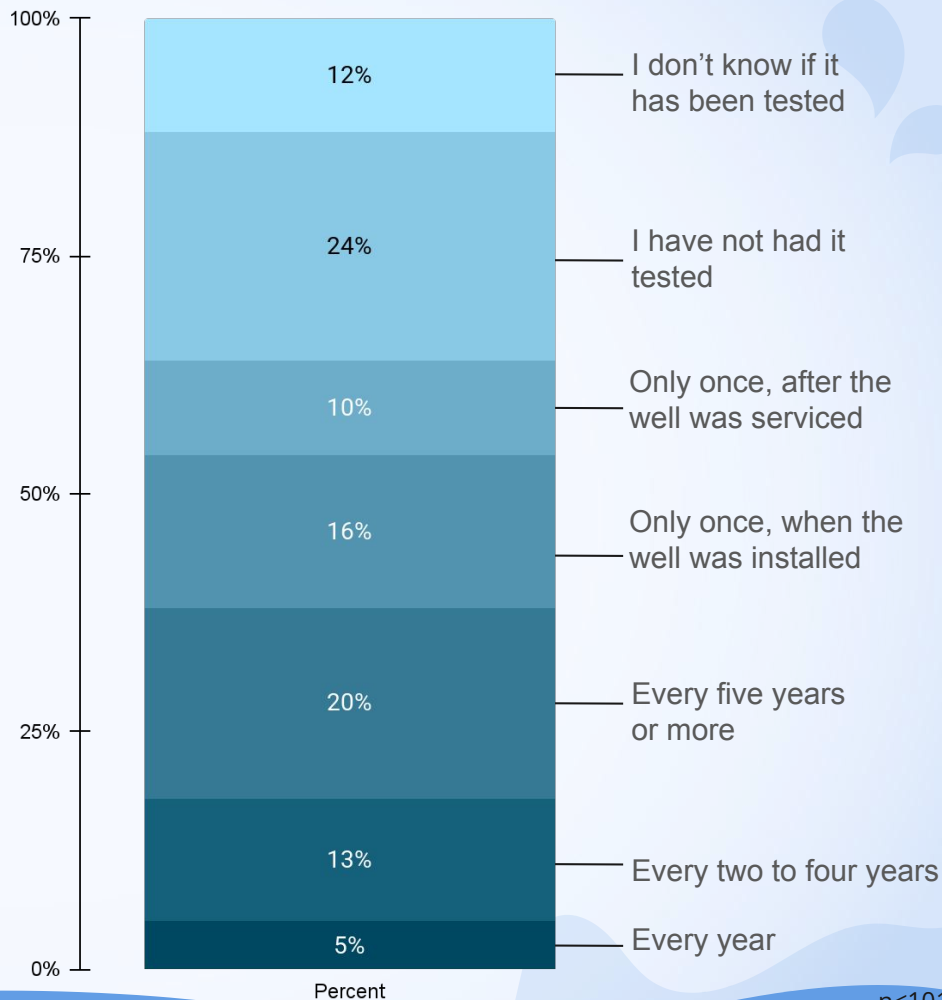
# How often is your water tested for contaminants?

**Protect your health!**  
Test your well water for:



- ☒ **Coliform Bacteria**  
(Every year)
- ☒ **Nitrate**  
(Every year)
- ☒ **Arsenic**  
(At least once)
- ☒ **Lead**  
(At least once)
- ☒ **Manganese**  
(At least once)

Testing is even more important if young children drink the water.



# How often is your water tested for contaminants?

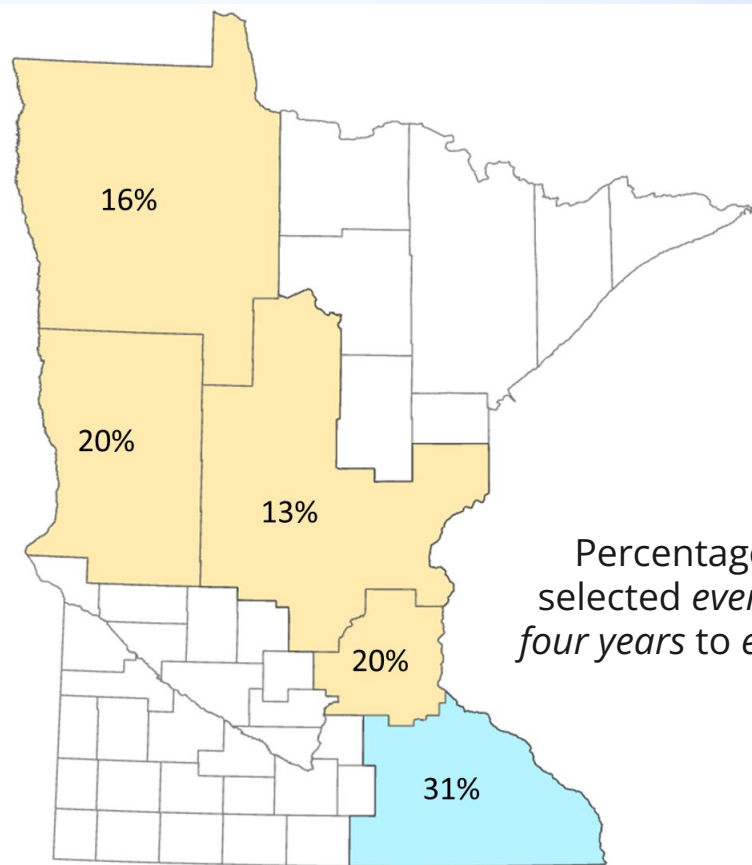
## Protect your health!

Test your well water for:



- ☒ **Coliform Bacteria**  
(Every year)
- ☒ **Nitrate**  
(Every year)
- ☒ **Arsenic**  
(At least once)
- ☒ **Lead**  
(At least once)
- ☒ **Manganese**  
(At least once)

Testing is even more important if young children drink the water.



Percentage who selected *every two to four years to every year*

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## How often is your water tested for contaminants?

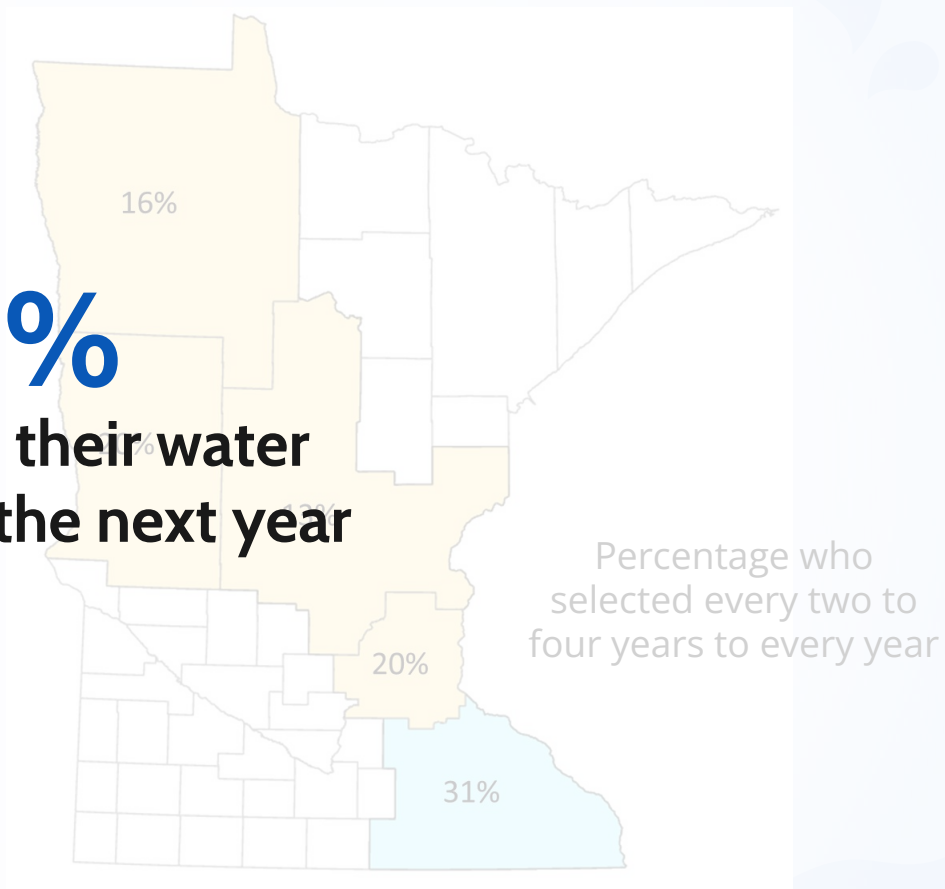
**Protect your health!**  
Test your well water for:



- ☒ Coliform Bacteria (Every year)
- ☒ Nitrate (Every year)
- ☒ Arsenic (At least once)
- ☒ Lead (At least once)
- ☒ Manganese (At least once)

Testing is even more important if young children drink the water.

**34%**  
**Plan to have their water tested within the next year**





# Perceived barriers to testing

**39%**

I am concerned about the cost of treating contaminated well water

**27%**

The time or effort it takes to get my water tested is a barrier for me

**26%**

The cost of water testing is a barrier for me

\*percent who selected "somewhat agree to strongly agree"  
n≤1016



## Perceived barriers to testing

39%

I am concerned about the cost of treating contaminated well water

27%

The time or effort it takes to get my water tested is a barrier for me

26%

The cost of water testing is a barrier for me

### Well owners were more likely to have their water tested if...

- A free well water test program was offered in their area (89%)
- A well water testing kit was delivered to their home (89%)
- They could drop off their water sample at a local office or building to have it tested (83%)

selected "somewhat agree to strongly agree"  
n≤1016

# Well water health concerns



**85%**

If my well water was contaminated, it would change how my household gets drinking water

**75%**

If my well water was contaminated, it would have severe impacts on my or my family's health

**50%**

I worry about pollution affecting my family's health

\*percent who selected "somewhat agree to strongly agree"  
n≤1016



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# Well water health concerns



**85%**

If my well water was contaminated, it would change how my household gets drinking water

**75%**

If my well water was contaminated, it would have severe impacts on my or my family's health

**50%**

I worry about pollution affecting my family's health

## Well owners were more likely to have their water tested if...

- They received a contamination notification (90%)
- They noticed a change in their water (e.g., taste, smell, color) (91%)
- Their health professional recommended to have it tested (85%)
- They heard or read about a water quality problem in their area (84%)

# Sources of drinking water information



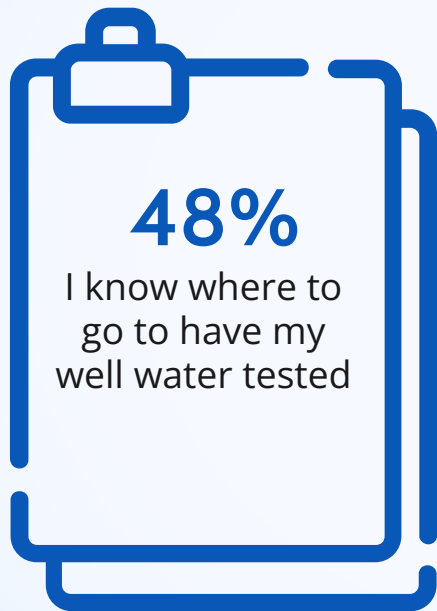
When it comes to your drinking water, to what extent do you trust or distrust the following possible sources of information?\*

1. Water testing laboratories (4.12)
2. University researchers or extension staff (4.07)
3. MN Department of Health (3.92)
4. County government (e.g., Soil and Water Conservation District or local health department) (3.90)
5. MN Department of Natural Resources (3.86)
6. Health care professionals (3.83)
7. MN Pollution Control Agency (3.82)

However, respondents are most often going to **media** (e.g., newspaper, television, Internet, radio) for their drinking water information

\*ranked by mean; five options from strongly distrust (1) to strongly trust (5)  
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# Knowing where to go for information



\*percent who selected "somewhat agree to strongly agree"  
n=1016



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# Believing the support needed is there

**18%**

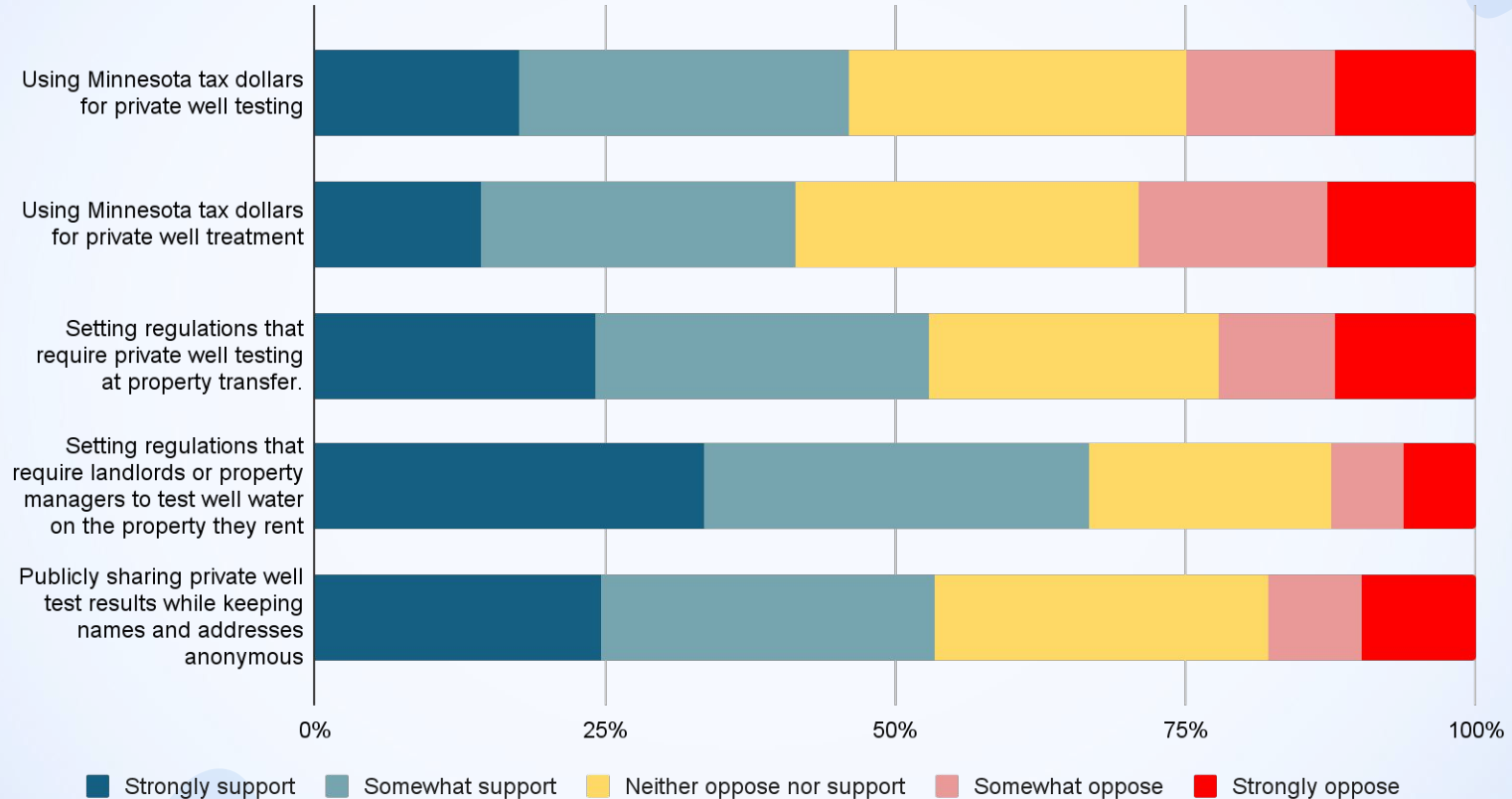
Government is providing  
adequate support for me  
to have safe water

**22%**

Minnesota has the right level of support (educational materials  
and financial assistance) for  
private well owners



# Policy support for clean & safe well water





**What questions do you have?**

**What did you notice?**

# Focus groups with water professionals



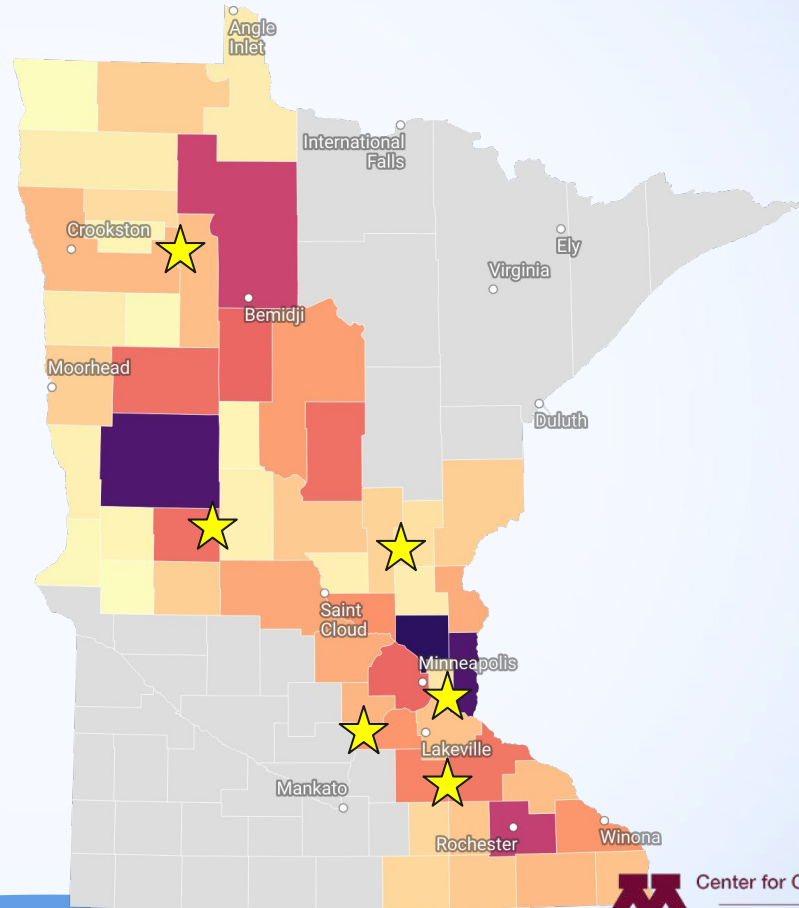
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# Focus groups

66 participants across 6 focus groups

Safe Drinking Water survey respondents



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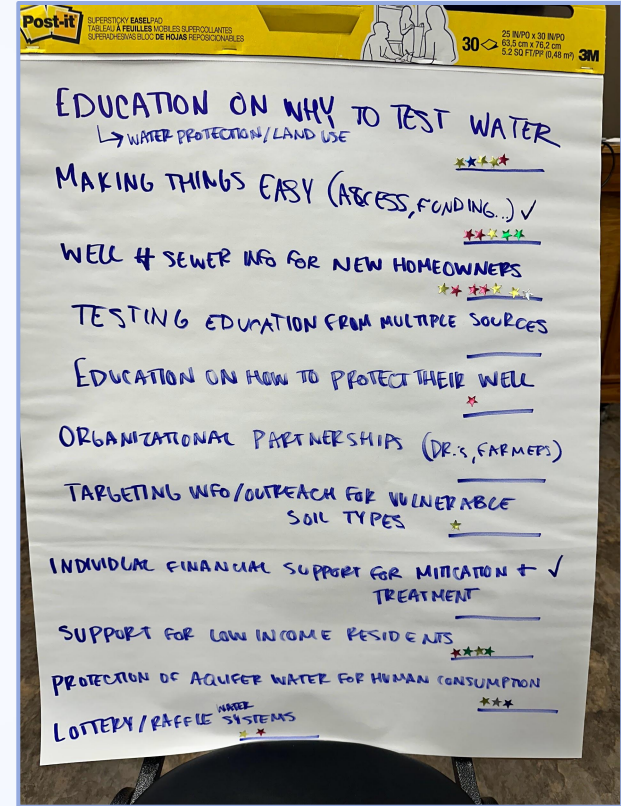
# Small group discussion

Focus groups saw a preliminary analysis of survey results and in small groups brainstormed strategic actions for ensuring clean and safe drinking water for all Minnesotans



# Strategy prioritization

Each group shared their ideas and prioritized actions using stickers



# What strategy themes emerged?

The original list of strategies had over 100 ideas!

Strategy	Location	Rank	Broad category	Column 6
County-level education and outreach to mothers, expecting mothers	Dundas	1	Educational resources	Health: Vulnerable populations
More access to free testing	Dundas	2	Easy testing	Effort: Money
Government partnerships with private companies for testing	Dundas	2	Partnerships	Private companies
Fix the MN Well Index's accuracy, and frame it as an educational tool	Dundas	5	Educational resources	State agencies
More access to state agency folks at the regional level	Dundas	3	Educational resources	State agencies: Localized solutions
Raise awareness for personal responsibility of testing and managing private well systems	Dundas	1	Educational resources	Well: Health
Teller testing to pollutants of concern for a specific area	Dundas	5	Policy and programming	Localized solutions
Education on treatment options	Dundas	3	Educational resources	Treatment
Support for hydration stations in at-risk communities	Dundas	3	Policy and programming	Health: Localized solutions
More adequate funding	Dundas	5	Policy and programming	Money
Partnerships with NGOs	Dundas	1	Partnerships	NGOs
Education on why to test water	Mora	2	Educational resources	Health
Making things easy (access, funding, etc)	Mora	2	Easy testing	Money: Effort
Well and sewer info for new homeowners	Mora	1	Educational resources	Real estate: Well
Testing education from multiple sources	Mora	5	Educational resources	
Education on how to protect their well	Mora	4	Educational resources	Water protection: Well
Organizational partnerships (doctors, farmers)	Mora	5	Partnerships	Doctors/health: Farmers/ag
Targeting information/outreach for vulnerable soil types	Mora	4	Educational resources	Vulnerable populations: Localized solutions
Individual financial support for mitigation and treatment	Mora	5	Policy and programming	Mitigation: Treatment: Money
Support for low income residents	Mora	2	Policy and programming	Vulnerable populations
Protection of aquifer water for human consumption	Mora	3	Water protection	Mitigation
Lottery/raffle for water treatment systems	Mora	3	Outreach	Treatment: Money
No fault education on groundwater issues (no blame)	Dakota Co	1	Educational resources	
Relationship building	Dakota Co	4	Outreach	
Children's health and OB/GYN education	Dakota Co	1	Educational resources	Health: Youth
Groundwater education curriculum in schools	Dakota Co	2	Educational resources	Youth
Program for testing follow-up and next steps	Dakota Co	2	Policy and programming	Follow up
Engage with children	Dakota Co	3	Outreach	Youth
Water mascot	Dakota Co	4	Outreach	
Clear outreach about steps folks can take	Dakota Co	3	Outreach	Follow up
Engage in communities/smaller zones and populations	Dakota Co	1	Community engagement	Localized solutions: Vulnerable populations
Groundwater ambassador in neighborhoods	Dakota Co	4	Community engagement	Social: Localized solutions
Regular free testing	Dakota Co	1	Easy testing	Money
Central phone number for contamination issues	Dakota Co	2	Policy and programming	
Strengthen and enforce Groundwater Protection Act	Dakota Co	2	Policy and programming	Water protection

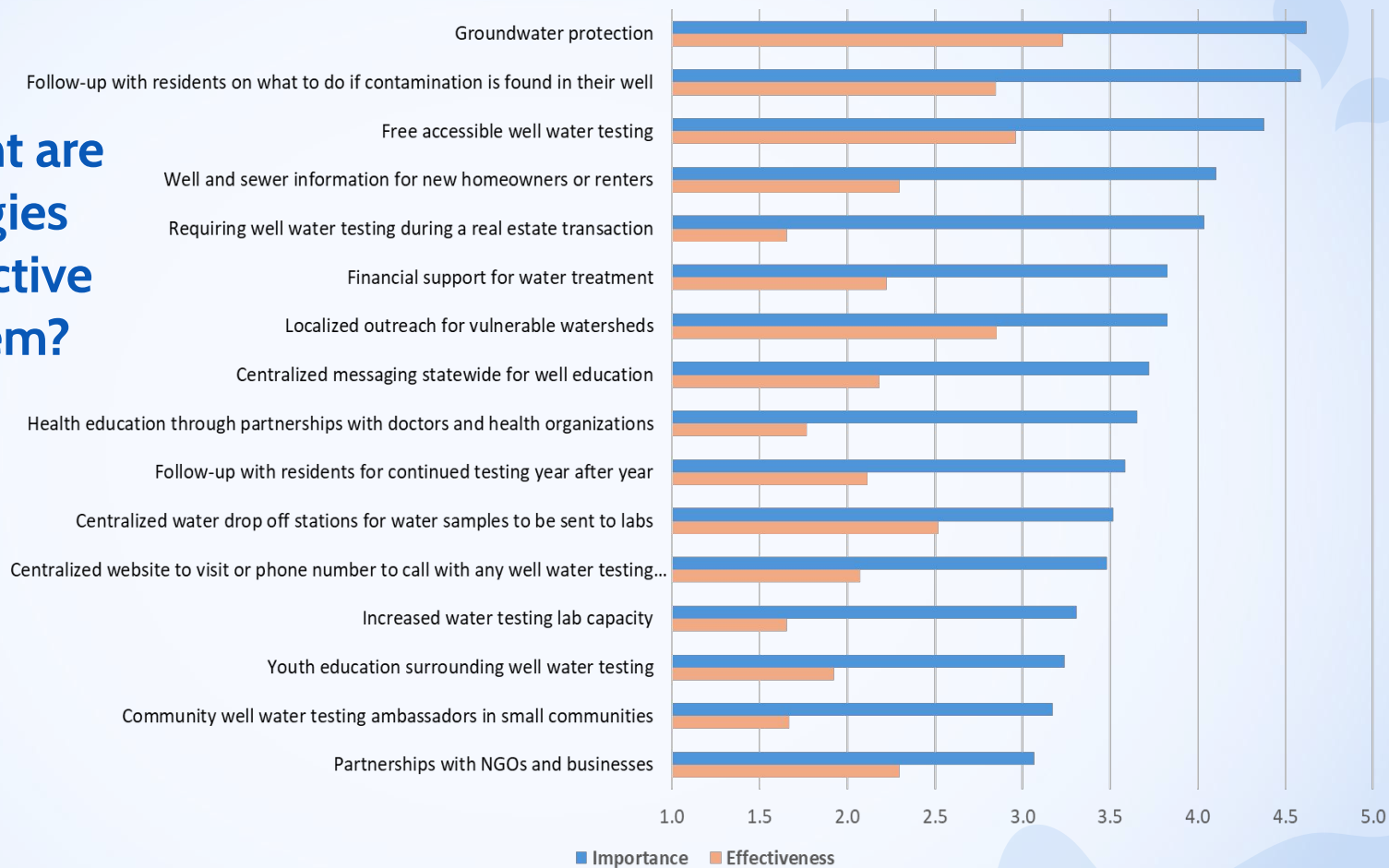
Strategy	Location	Rank	Broad category	Column 6
More available hours for water testing clinics	Erskine	5	Easy testing	Effort
Cost-sharing for water treatment systems	Erskine	1	Financial support	Treatment: Money
Centralized collaboration between agencies	Erskine	5	Policy and programming	
Advocacy for smaller communities	Erskine	4	Outreach	Localized solutions: Vulnerable populations: Soc
Funding mechanism for this work	Erskine	5	Financial support	
Include testing in home ownership process	Erskine	5	Easy testing	Real estate
Water testing at daycare	Erskine	5	Easy testing	Youth
Medical provider provided information (including dentists)	Alexandria	5	Educational resources	Health
Educate landowners and well-drillers	Alexandria	3	Educational resources	Private companies: Real estate
Information, not fear	Alexandria	5	Educational resources	Social
More communication between well-drillers and septic installer	Alexandria	5	Outreach	Private companies
Education on other ways of dealing with manure	Alexandria	5	Educational resources	Water protection: Farmers/ag
An extra step when adding a well to the MN Well Index - "wells"	Alexandria	1	Educational resources	Real estate: Well
Township-level communication on nearby contamination	Alexandria	5	Outreach	Localized solutions: Vulnerable populations: Fol
Local water testing technology (like what is available for nitrate)	Alexandria	3	Easy testing	Effort
Information on "what's next" if contamination is found	Alexandria	1	Educational resources	Follow up
More testing grants	Alexandria	5	Financial support	
Specific funds allocated to well water protection	Alexandria	5	Financial support	Water protection
Agency advocacy (and review) for watershed plan goals	Alexandria	5	Policy and programming	
Statewide media campaign to address knowledge gap	Alexandria	5	Outreach	Social
Requiring testing at ownership change, if a permit is pulled, or	Alexandria	1	Policy and programming	Real estate
Root of the problem - soil health, ecosystem health	Alexandria	3	Water protection	Water protection
MDA money for farmer education pilots	Alexandria	5	Financial support	Farmers/ag
One stop shop of resources for well owners - and one central	Alexandria	5	Educational resources	
More well and treatment education on options for agency emp	Sibley Co	1	Educational resources	
Outreach for residents to know when/what resources are avail	Sibley Co	4	Outreach	Follow up
Broader outreach campaigns (education, etc)	Sibley Co	5	Outreach	
Emphasis on continued testing/have topic at the forefront	Sibley Co	4	Outreach	Social: Follow up
Follow up after contamination is found	Sibley Co	2	Educational resources	Follow up
Strategic and targeted planning on where (what areas) to test	Sibley Co	4	Policy and programming	State agencies: Follow up
Leveraging community connections to build trust	Sibley Co	2	Partnerships	Localized solutions: Social
Buffer strips/BMPs to prevent contamination	Sibley Co	2	Water protection	Water protection: Farmers/ag
Education on well management and maintenance	Sibley Co	4	Educational resources	Well
Partnerships with NGOs	Sibley Co	2	Partnerships	NGOs
Community advocates (especially in smaller communities)	Sibley Co	5	Partnerships	Social: Localized solutions
Marketing slogan/recognizable advertising	Sibley Co	1	Outreach	



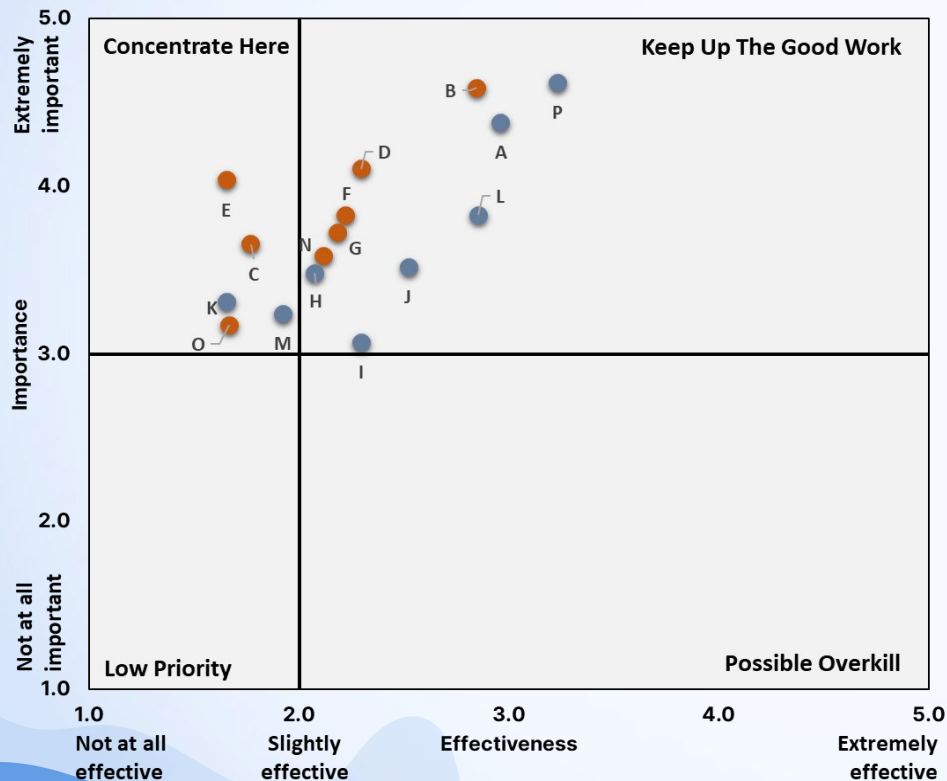
# **Last Thursday's workshop with 30+ water professionals**

## **Pre-Survey Results**

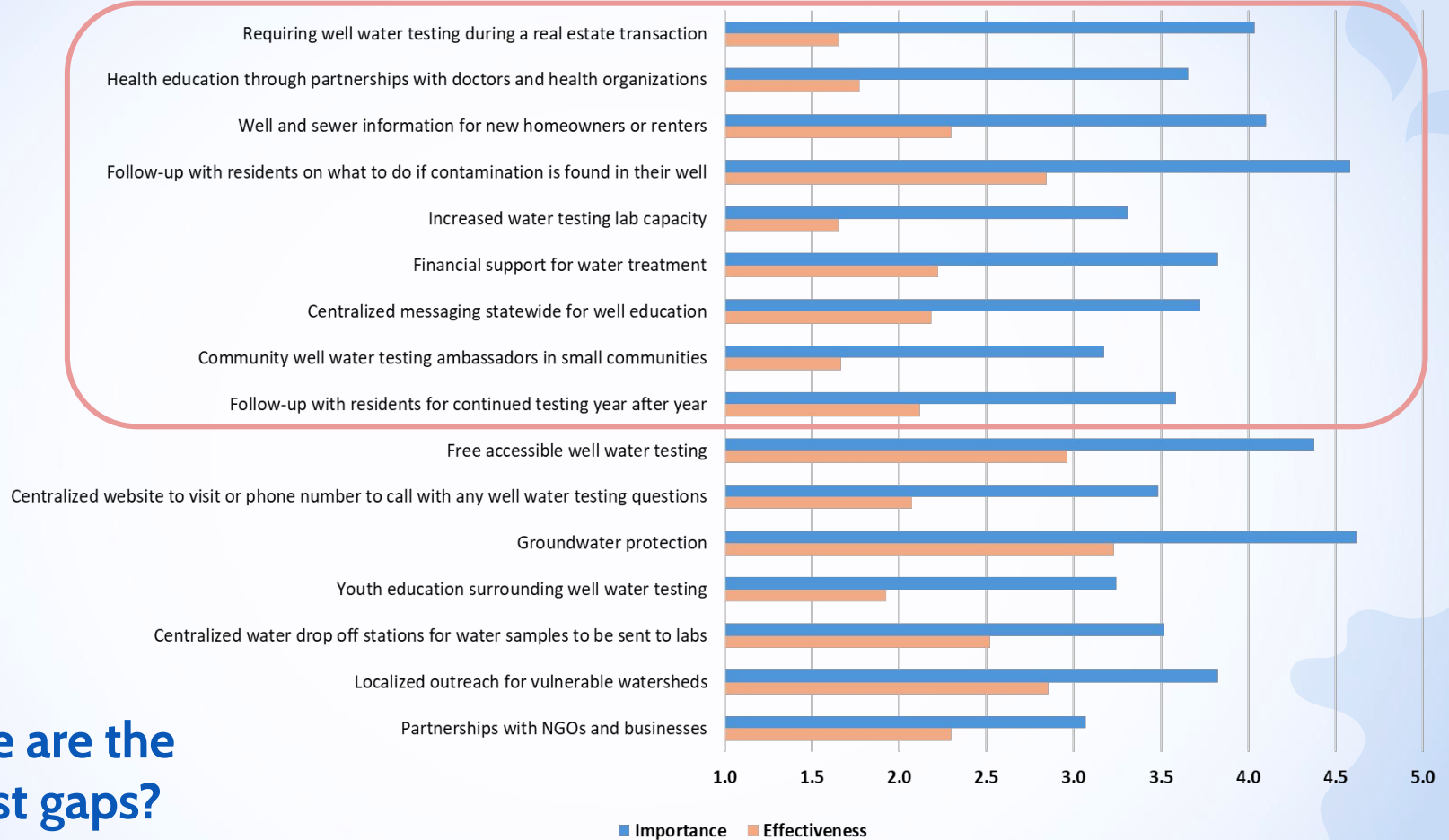
# How important are these strategies and how effective are we at them?



# Importance vs. Effectiveness



A	Free accessible well water testing
B	<u>Follow-up with residents on what to do if contamination is found in their well</u>
C	<u>Health education through partnerships with doctors and health organizations</u>
D	<u>Well and sewer information for new homeowners or renters</u>
E	<u>Requiring well water testing during a real estate transaction</u>
F	<u>Financial support for water treatment</u>
G	<u>Centralized messaging statewide for well education</u>
H	Centralized website to visit or phone number to call with any well water testing questions
I	Partnerships with NGOs and businesses
J	Centralized water drop off stations for water samples to be sent to labs
K	Increased water testing lab capacity
L	Localized outreach for vulnerable watersheds
M	Youth education surrounding well water testing
N	<u>Follow-up with residents for continued testing year after year</u>
O	<u>Community well water testing ambassadors in small communities</u>
P	Groundwater protection



Where are the  
largest gaps?

# Six strategies for action planning

1. Health education: partner with doctors and health organizations to raise awareness
2. Integrating well water testing into the real estate transaction; provide well info for new homeowners and renters
3. Support for water treatment
4. Follow-up on what residents should do if contamination is found; encouraging annual testing
5. Community ambassador/steward/advocate program in smaller communities
6. A central message or campaign for statewide well education - more visible (billboards, radio, ads, etc)

# Six Strategic Working Groups

Questions	Responses	
Strategy name:	Health education: partner with doctors and health organizations to raise awareness	
What is the strategy's primary objective?		
What changes are needed to implement this strategy?	To reach as many people as possible. Reach vulnerable populations. Overall trusted source, surprise it wasn't ranked higher, maybe because of pandemic.	
What changes are needed to implement this strategy?	Push back from doctors "Not enough time to talk in typical doctor visit". Boards, meeting with higher end boards and administrations, not individuals. Advocacy over well child schedule, doctor's office has to follow to get reimbursement. Other forms of reimbursement, like pregnant or immune compromised populations, ages 65+. Education starting in medical school. Lead is the primary thing taught for public wells, not private. Focus on main concerns for area, like nitrate, or arsenic in NW, what are health concerns. Minnesota Rural Health Association, network with their conference. Advocacy for doctors to prescribe water test, what	

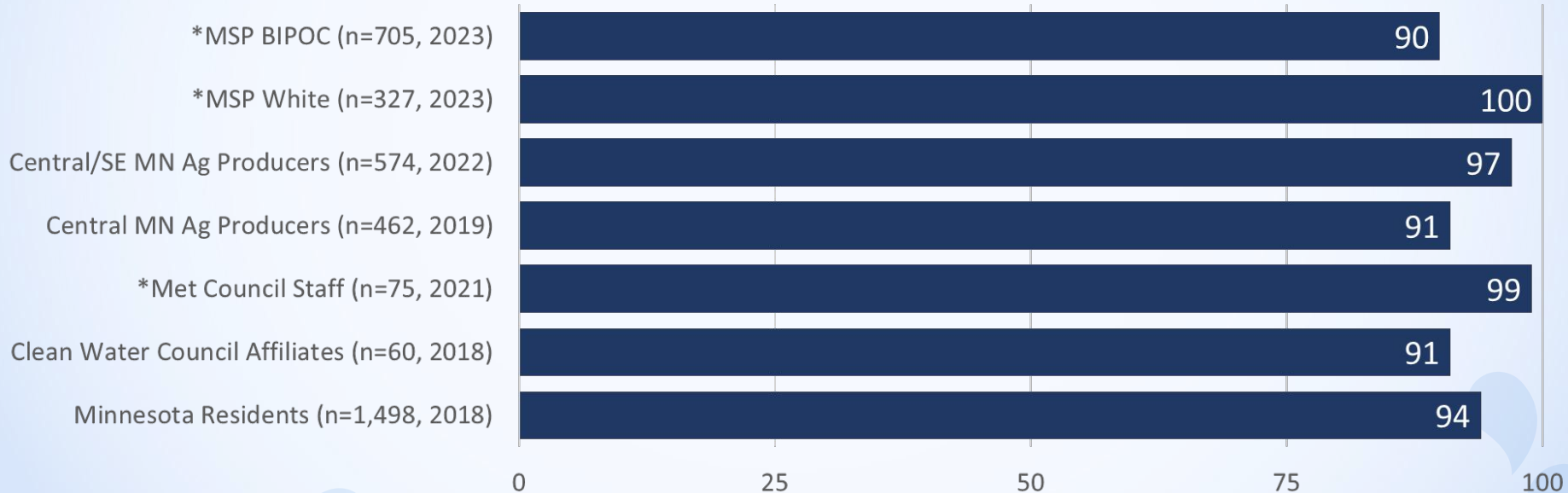
Questions	Responses
Strategy name:	Support for water treatment
What is the strategy's primary objective?	
What changes are needed to implement this strategy?	Getting treatment in homes that need it. Identifying treatment systems that may be needed and where to get them. kinds and types. Price on systems. The cost of the service/technician.
Action step 1.	
Action step 2.	Connect with the Rural Health Association. Find cash money \$\$\$\$ --> Establish partnerships --> Contact list of well users --> Start with testing, need to know if there is an issue first. Data Set of homes with issues. --> "You're water doesn't meet the standard, would you be interested in getting treatment?" --> Need to know where to send people.

## What are up to 4 specific action steps needed to achieve success?

Action step 1.	
Action step 2.	Identifying type
Action step 3.	Policy recomm champion.
Action step 4	What changes are needed to implement this strategy?
	What changes are needed to implement this strategy?
	bringing education into that community and finding people who want to be that standard bearer; per community identify what is the selling point, what are they most concerned about, what gets people to talk to this advocate; in Southern Dakota county - water bottling facility - controversial, large mine - outcry about that, data centers - people get fired up about these issues; one problem is people don't trust DNR - allowing every large water user to go in; lack of legal sophistication;
	What are up to 4 specific action steps needed to achieve success?
Action step 1.	State and county agencies to push information down to LGUs (communications between the county and SWCD down to townships) - getting information from state and county (e.g., state agencies to township (Dakota county is unique - resources dedicated to groundwater)
Action step 2.	Getting everyone on the same page (among those interested in being advocates) - make sure they understand how to talk about those things - give talking points to pillars in the community (training and information)
Action step 3.	

# Clean & safe drinking water is a top priority for Minnesotans

How important is it to protect Minnesota waters for drinking water that is safe and clean?



% responding "very" to "extremely" important

# Connections to Clean Water Council Strategic Planning

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

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

Social Strategy: Maintain and increase capacity of Minnesotans to improve water quality

Action 1: Support local efforts to engage farmers in water quality efforts

Action 2: Engage private well users to test their wells for five major contaminants

Action 3: Engage non-traditional audiences with planning and implementation

Action 4: Support local efforts to engage lakeshore property owners and private landowners

Action 5: Engage chloride users

Action 6: Engage water managers statewide

Action 7: Support innovative efforts that accelerate progress toward clean water goals

Action 8: Plan for funding resilience after expiration of Legacy Amendment

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**Action 7: Support innovative efforts that accelerate progress toward clean water goals**

Action 8: Plan for funding resilience after expiration of Legacy Amendment

- Project outcomes will inform **MDH's** proposal for **Clean Water Funds** & private well priority actions for 2027-2029
- The **UMN team** planning to conduct a similar workshop with **state water agency representatives** & the **Clean Water Council**
- What would you like to see from us? Some possibilities:
  - Continuing to engage working groups?
  - Reports/presentations to other groups?
  - Community-engaged water social science in other communities on other topics?
  - Other ideas?
- What are **your** next steps?



# What are next steps?



# Thank you!

## Please reach out:

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612-624-2721

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