

DNR Drinking Water & Groundwater Study Group Meeting

August 3, 2023

New DG Program Guidance

Steve Elmore

Thank you!

Thank you to those who submitted comments on this guidance during the public comment period, April 5 - 21, 2023.

Thank you for meeting with our staff to discuss your comments and concerns. Your input was helpful in shaping the final guidance.

Your input was very helpful!

Overview

- Where to find the New DG Program Guidance
- Purpose
- Who is potentially affected
- When this guidance applies
- What to expect
- Questions

Where is it posted?

New DNR Program Guidance pertaining to drinking water is now available on the external [DNR Program Guidance](#) webpage.

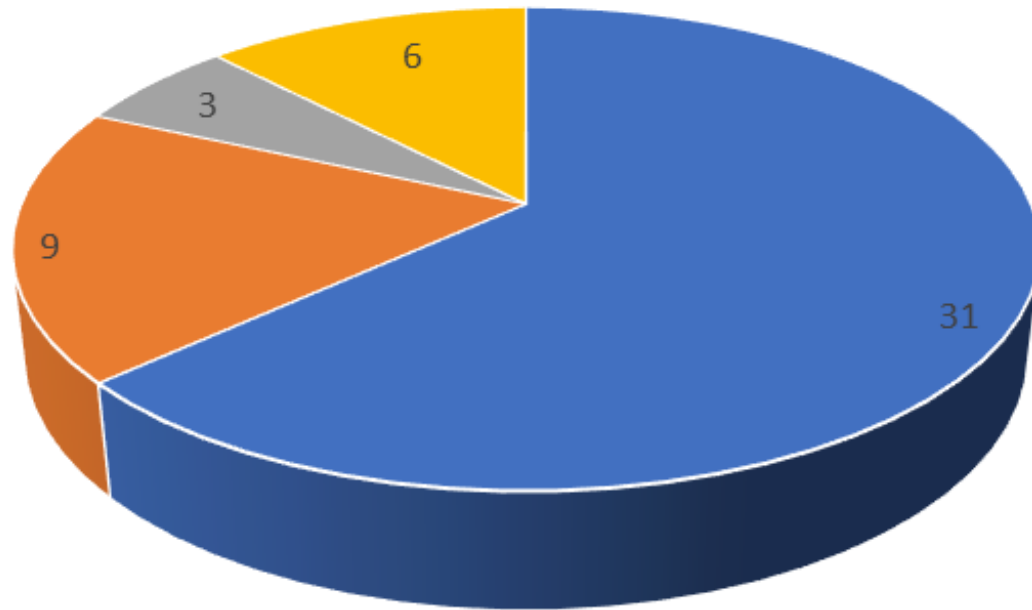
- [Guidance Concerning Total Coliform/E.Coli Contamination at Municipal Public Water Systems Without Year-Round Continuous Disinfection](#)
- [Guidance for Sanitary Survey Review and Documentation at Municipal Public Water Systems without Year-Round Continuous Disinfection](#)

Purpose of the Guidance:

Consistent implementation of Revised Total Coliform Rule (RTCR) at municipal systems that do not continuously disinfect

- “Find and fix” may require continuous disinfection to address potential health hazard
- Potentially affects 49 municipal systems
- Funding is available if equipment upgrades are needed

Municipal Drinking Water Systems Without Continuous Disinfection, Total Population = 56,195



■ NOR ■ SCR ■ SER ■ WCR

Region	# of MCs
NOR	31
SCR	9
SER	3
WCR	6
Total	49

Municipal Drinking Water Systems Without Continuous Disinfection

Total Population = 56,195



When does this guidance apply?

- [Guidance Concerning Total Coliform/E.Coli Contamination at Municipal Public Water Systems Without Year-Round Continuous Disinfection](#)
 - This guidance applies when contamination occurs and a RTCR Level 2 Assessment is triggered at a municipal system without continuous year-round disinfection
- [Guidance for Sanitary Survey Review and Documentation at Municipal Public Water Systems without Year-Round Continuous Disinfection](#)
 - This guidance applies when a Sanitary Survey is conducted at a municipal system without continuous year-round disinfection

RTCR Level 1 Assessment Triggers

A Level 1 assessment can be triggered by the following Level 1 treatment technique triggers, as established in s. NR 809.313(1)(a), Wis. Adm. Code:

1. For public water systems taking 40 or more samples per month, the public water system exceeds 5.0% total coliform–positive samples for the month.
2. For public water systems taking fewer than 40 samples per month, the public water system has two or more total coliform–positive samples in the same month.
3. The water supplier fails to take every required repeat sample after any single total coliform–positive sample.

RTCR Level 2 Assessment Triggers

A Level 2 assessment can be triggered by the following Level 2 treatment technique triggers, as established in s. NR 809.313(1)(b), Wis. Adm. Code:

1. An E. coli MCL violation, as specified in s. NR 809.30.
2. A second Level 1 trigger as defined in par. (a) within a rolling 12-month period, unless the department has determined a likely reason that the samples that caused the first Level 1 treatment technique trigger were total coliform-positive and has established that the water supplier has corrected the problem.

What to Expect: RTCR Level 2 Assessment

The DNR Rep will ...

- Conduct records review
- Complete Level 2 on-site assessment with water system representative
- Discuss preliminary findings with water system representative
 - Work with water system rep to find potential sources of bacteria contamination
- If continuous disinfection is needed to address a potential health hazard:
 - Consult with RTCR Coordinator, Field Supervisor, Field Operations Director, and Program Director
 - Document analysis and basis
 - Prepare letter
 - Notify water system representative, discuss corrective action schedule
 - Finalize and issue letter with appeal rights
 - Provide information about DNR funding if equipment upgrades are needed

What to Expect: Sanitary Survey

The DNR Rep will ...

- Recommend Continuous Disinfection
- Verify Monitoring Site Locations & Rotation
- Verify and Document Adequacy of Emergency Chlorination Infrastructure
- Verify Main Break Follow-Up Sampling

Questions?

Water Use

Adam Freihoefer

Adoption of the Great Lakes Compact



“It is a textbook example of collaboration—two nations, multiple jurisdictions, NGOs, agriculture and industry—all working together for the greater good of the Lakes.”
US EPA Administrator Michael Leavitt, 2004

- Great Lakes – St. Lawrence River Basin Sustainable Water Resources Agreement and Compact of 2005
- Legally enforceable contract among the Great Lakes States
- WI enacted into law in May 2008
- Congressional Consent in Sept. 2008, became effective in Dec. 2008

Wisconsin's Compact Implementation



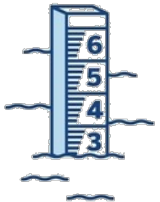
Registration of Water Sources, Annual Reporting & Water Use Fee Requirements



Management of Great Lakes Diversions & Water Use Permitting

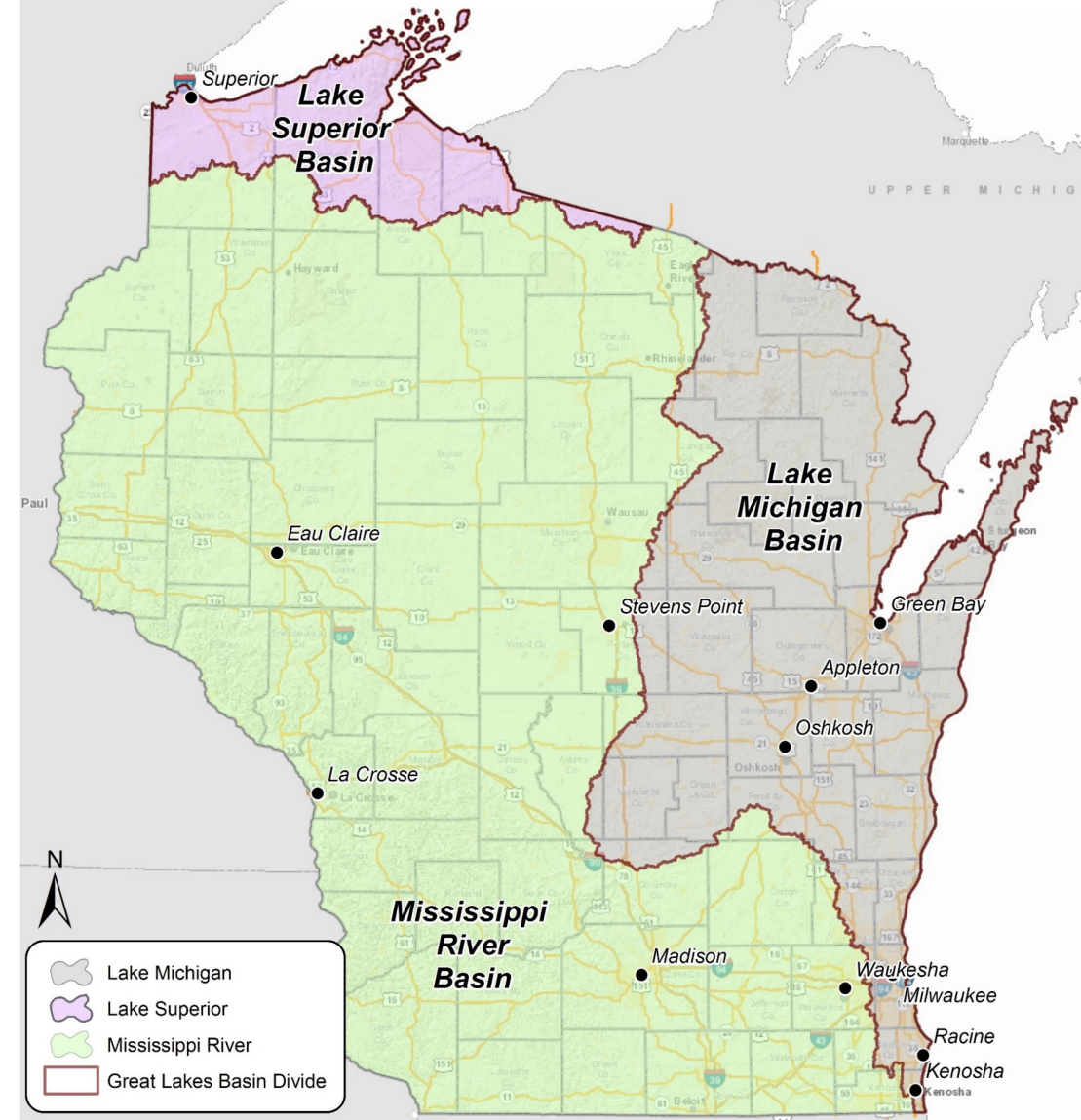


Statewide Water Conservation & Efficiency Measures



Monitoring of Statewide Water Levels (groundwater, streams, springs and lakes)

Wisconsin's Major Watershed Basins



Wisconsin's Compact Implementation



Water Use Data Products



Great Lakes Diversions

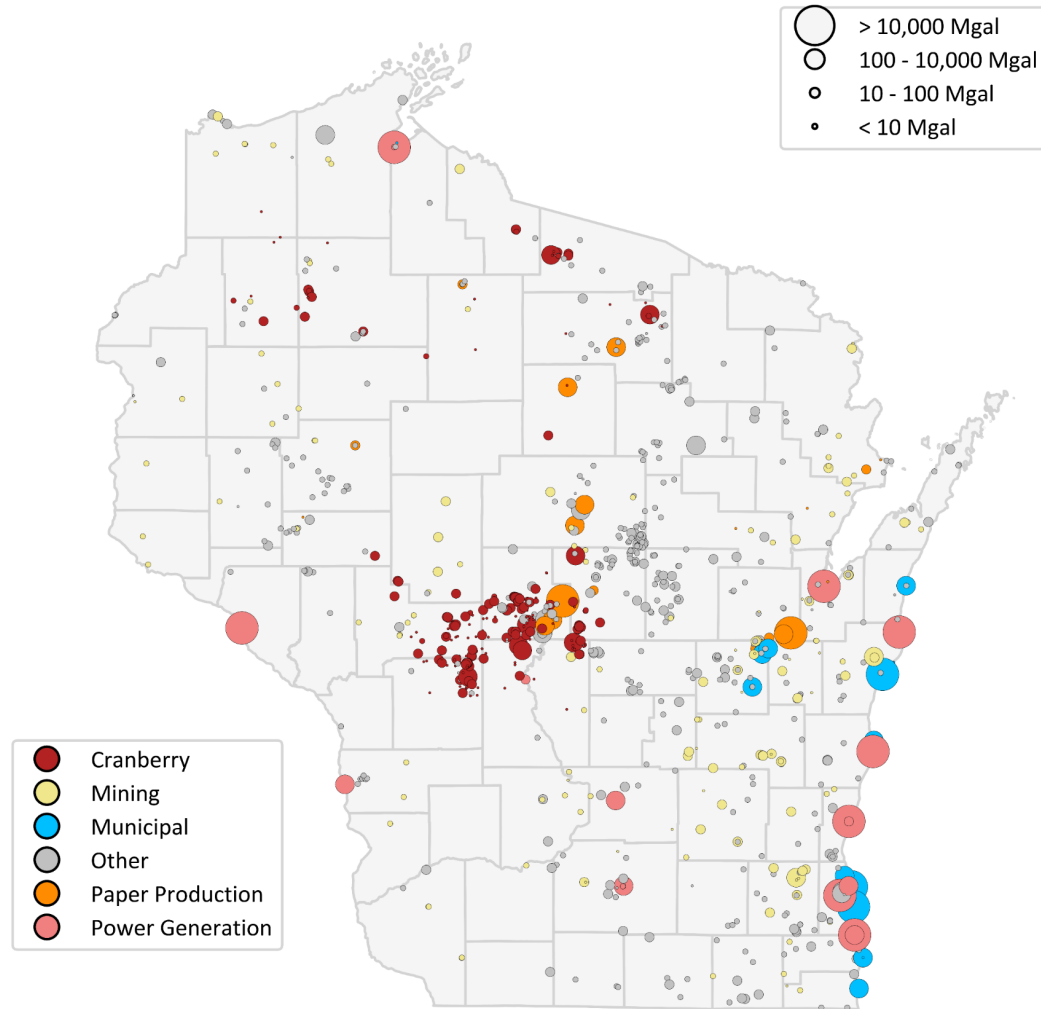


Rulemaking

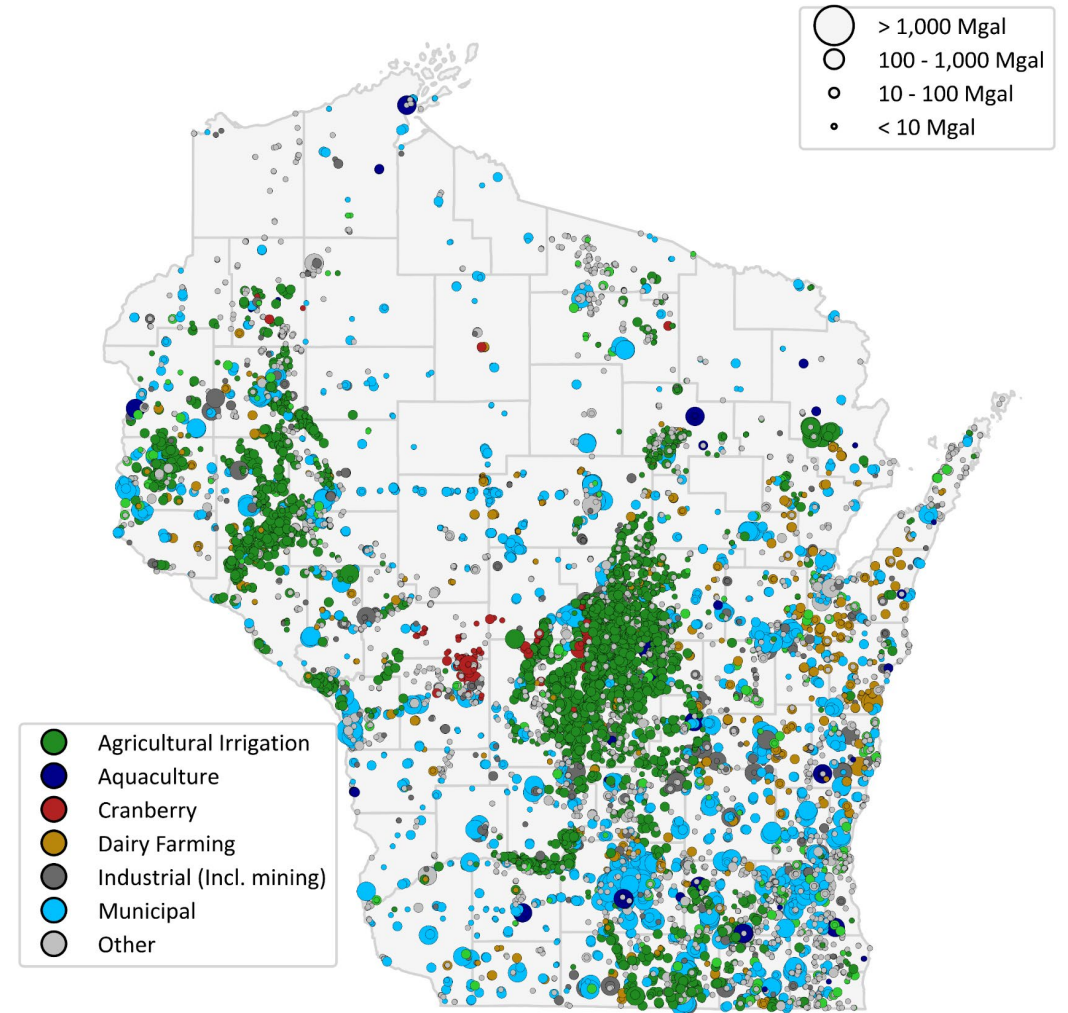
Water Supply Service Area Planning & Diversion

Water Use Reporting

2021 Surface Water Withdrawals



2021 Groundwater Withdrawals



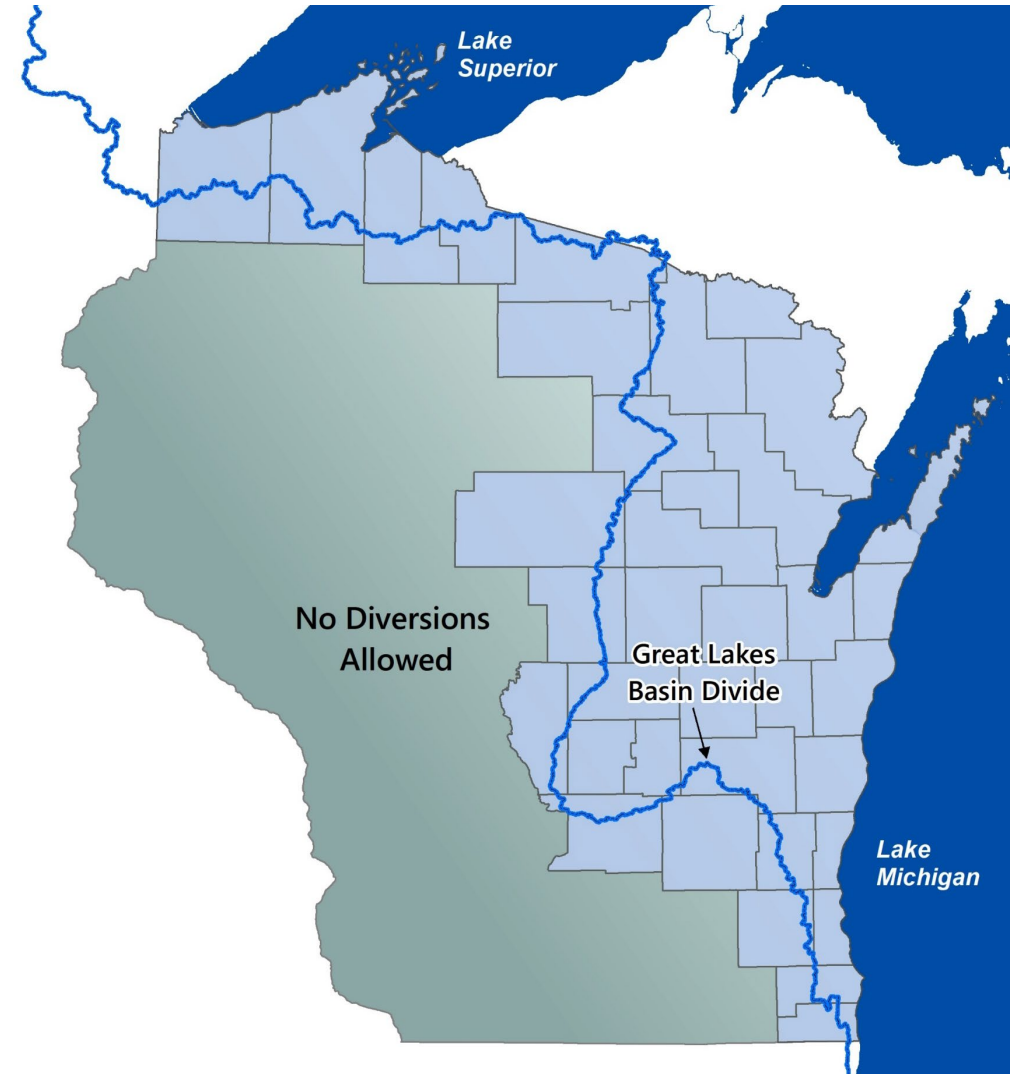
Water Use Reporting



<https://storymaps.arcgis.com/stories/746865c012064b6e8f0a89a4affe6499>

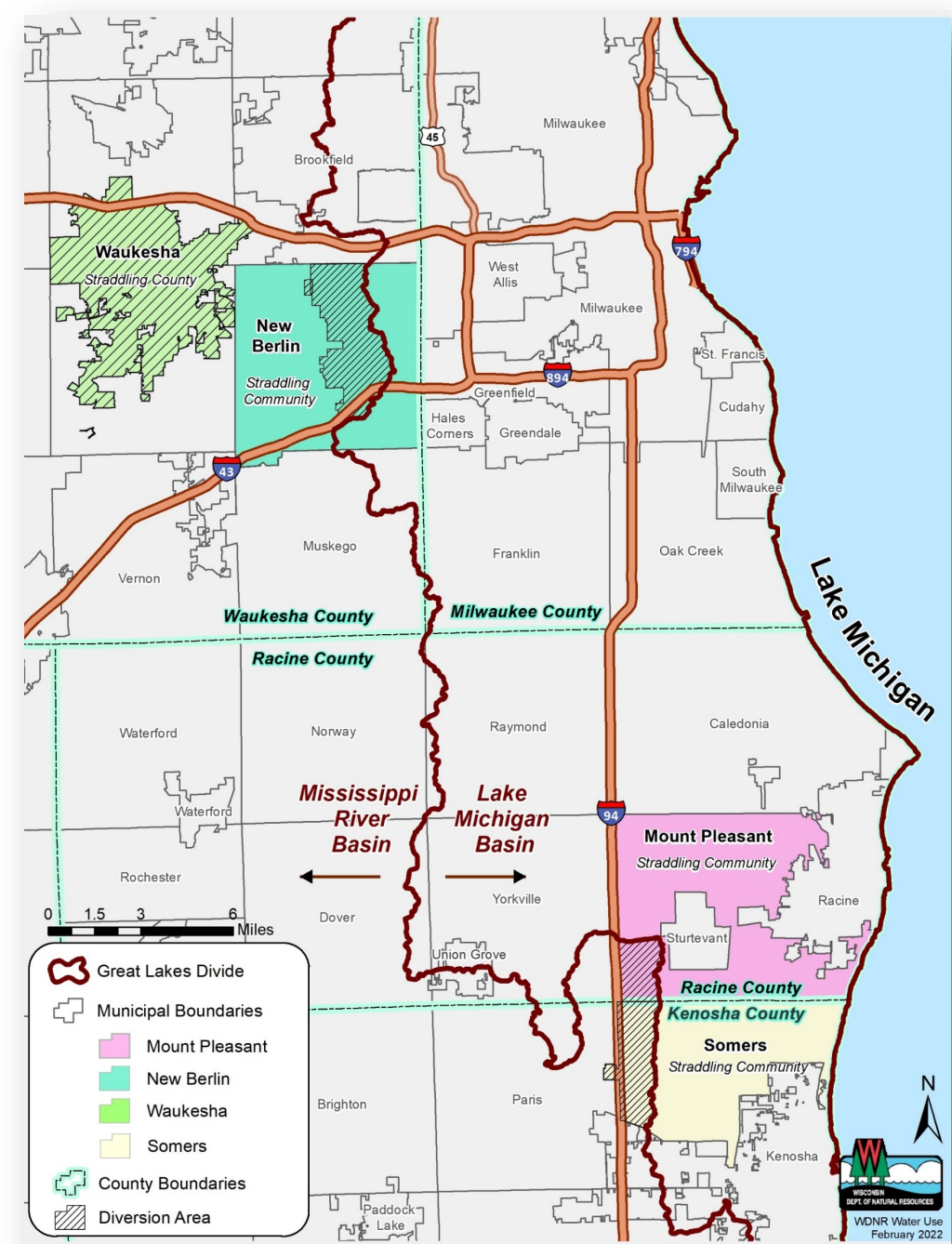
WI Diversions Approved Under the Great Lakes Compact

- Diversions are prohibited with limited exceptions
 - Straddling communities
 - Communities in counties that straddle basin boundary
 - Transfer of water between Great Lakes
- Treated wastewater must be returned
- Applications are limited to public water supply systems
- Required to meet all Compact criteria



Approved Diversions of Great Lakes Water Since Compact

- City of New Berlin, 2009, 2.1 million gallons per day
- City of Waukesha, 2016 (Regional), 2021 (State) 8.2 million gallons per day *planned to begin fall 2023*
- City of Racine / Village of Mount Pleasant, 2018 7 million gallons per day
- Village of Somers, 2022 1.2 million gallons per day



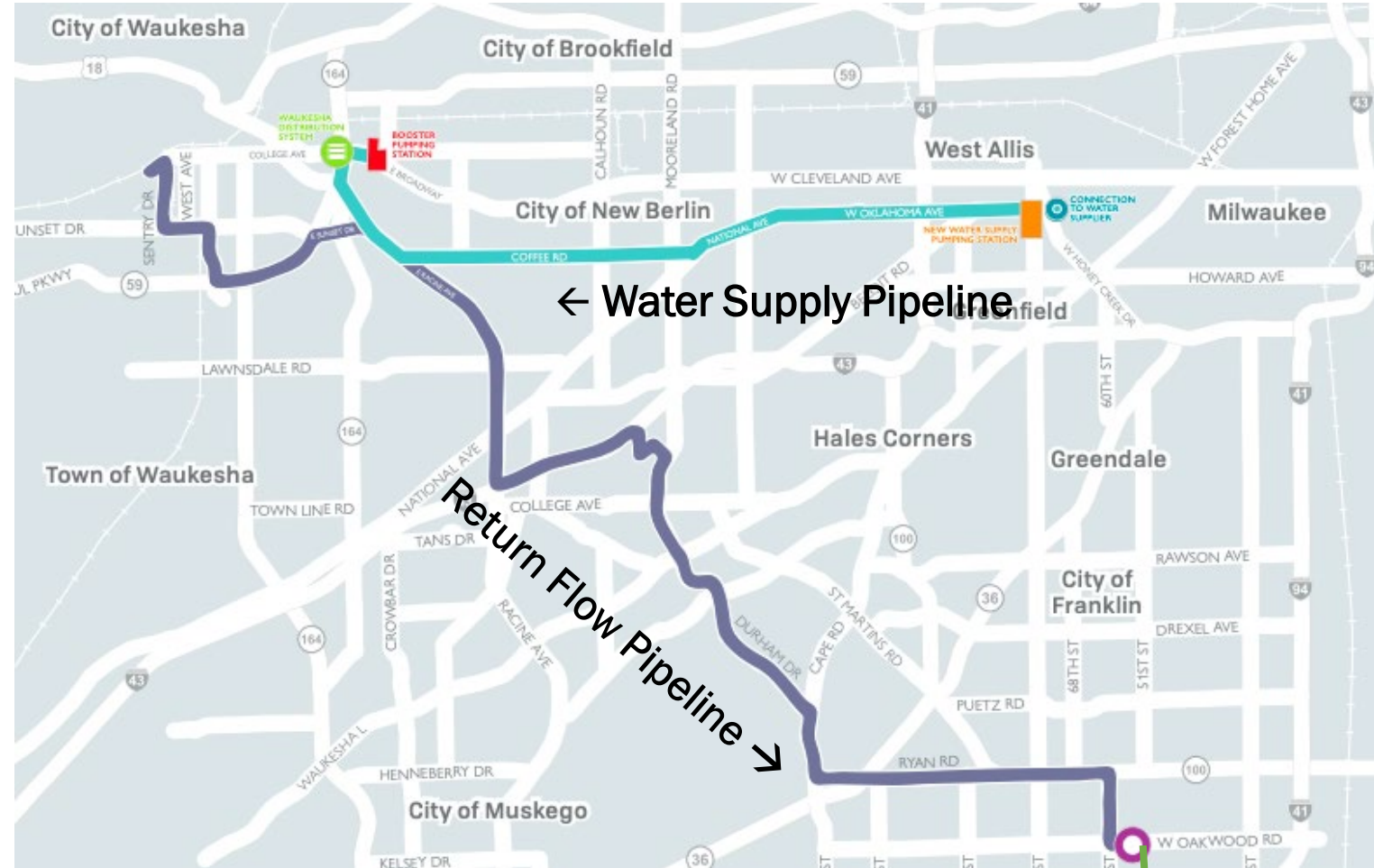
Waukesha Diversion

Straddling County Diversion Application

Divert up to 8.2 MGD

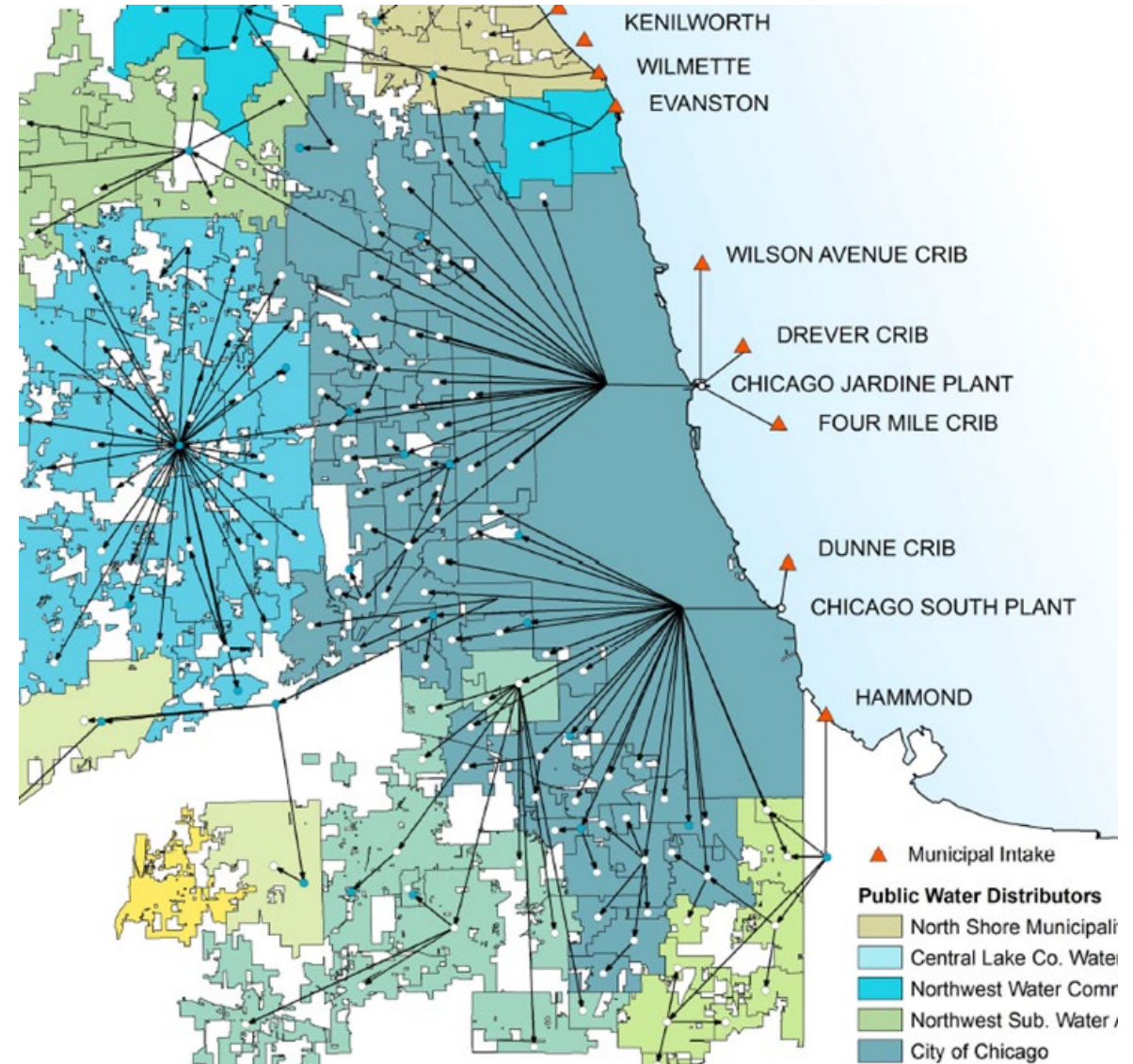
Purchase water from Milwaukee

Must return all water, less consumptive use, back to the Lake Michigan Watershed (via Root River)



Illinois Diversion

Illinois is authorized to divert 3,200 cubic feet a second cubic feet per second (2.1 billion gallons of water a day) under a US Supreme Court Decree (1968, 1980)



Source: Illinois State Water Survey

Rulemaking



- Existing WI rules from the Compact's implementing statute include:
 - Water Use Registration and Reporting (NR 856)
 - Water Conservation & Efficiency (NR 852)
 - Water Use Fees (NR 850)
 - Water Use Permits (NR 860)
- Currently drafting:
 - Management of Great Lakes Diversions (NR 851)
 - Water Supply Service Area Planning (NR 854)
- Drafting rules parallel with Wisconsin statutes and Great Lakes Compact rules and guidance

Rulemaking: Water Supply Service Area Plan (NR 854)



What is the purpose of the rule?

Water Supply Service Area Plans are a planning document from a public water supply system to demonstrate that they can supply an adequate and sustainable amount of water into the next 20-year period.

The draft rule contains the plan requirements specified in s. 281.348, Wis. Stats.

The draft rule:

- Establishes procedures and requirements for public water supply systems to follow when preparing water supply service area plans.
- Outlines public participation and submittal requirements.
- Outlines department review criteria.

Rulemaking: Water Supply Service Area Plan (NR 854)



Who is required to have a water supply service area plan?

Communities that serve both a population of 10,000 or more and that withdraw from waters of the state are required to complete a water supply service area plan by **Dec 31, 2025** (Wis. Stat. 281.348).

The statute requires DNR approval of plans for communities that need new or increased withdrawals from the Great Lakes basin or diversion applications.

What's in a plan?

- Inventory of the sources and quantity of water supply in the area.
- Forecast of water demands, including population projections.
- Identification of water supply options.
- An assessment of impacts of carrying out the water supply service area plan.

In addition, plans needing department approval need to include:

- Delineation of the proposed water supply area
- A cost-effective analysis of regional and individual water supply and water conservation alternatives.

Rulemaking: Diversion (NR 851)



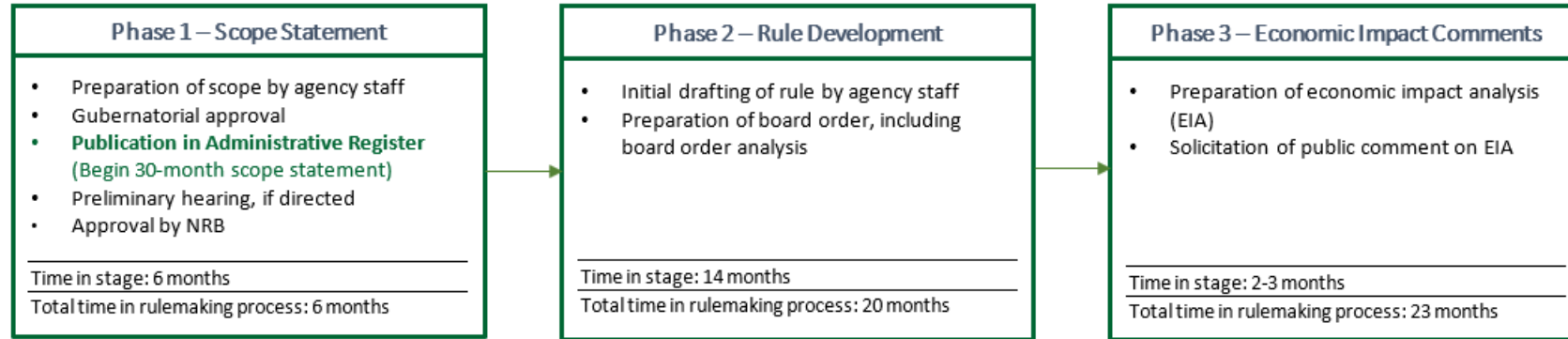
What is the purpose of the rule?

To establish application and review processes for Great Lakes diversions and intrabasin transfers.

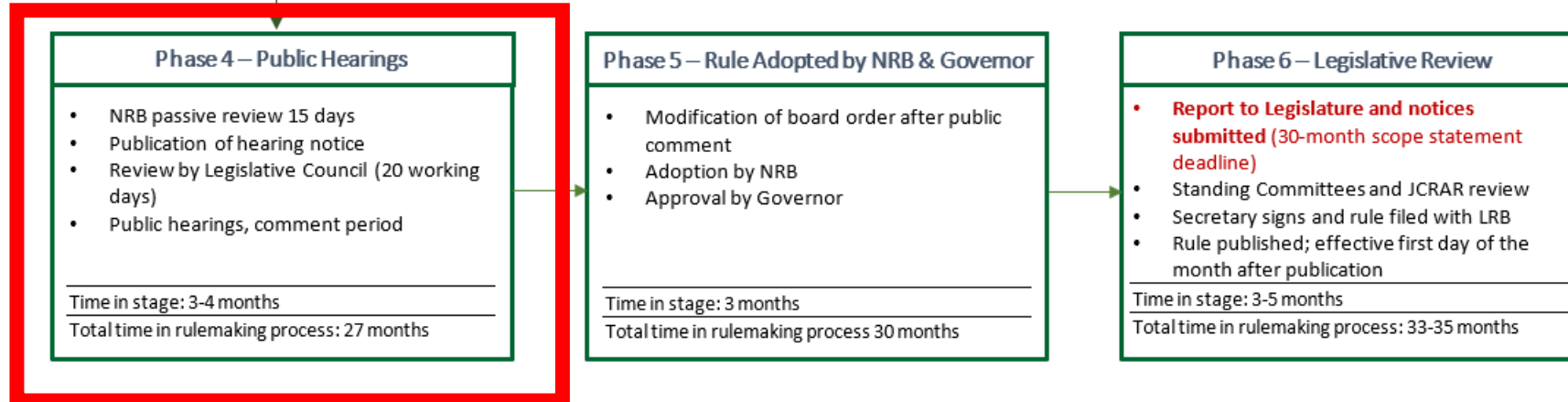
What would be included in the rule?

- Diversion and intrabasin transfer application requirements.
- Public participation protocols.
- Requirements related to annual diversion and intrabasin transfer reporting.

Rulemaking Timeline



We are moving here.



For more information, visit dnr.wi.gov, Search “Water Use Rules”

Questions?

Break

Member Roundtable

Chris Groh | Wisconsin Rural Water Association

Camille Danielson | Wisconsin State Lab of Hygiene

Lawrie Kobza | Municipal Environmental Group

Paul Junio | Pace Labs

Jeff Kramer | Wisconsin Well Water Association

John Richmond | Wisconsin Section – American Waterworks Association

Sarah Yang | Department of Health Services

Rick Wietersen | Wisconsin Association of Local Health Departments and Boards

Craig Summerfield | Wisconsin Manufacturers & Commerce

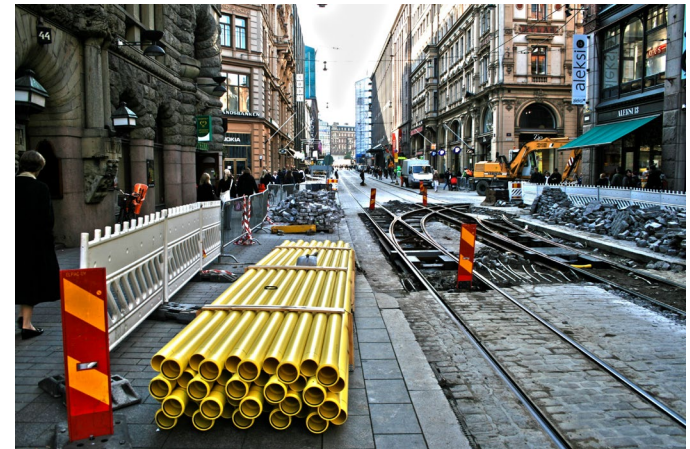
Sara Walling | Clean Wisconsin

Internal Updates

ARPA Well Compensation

ARPA Well Compensation Update

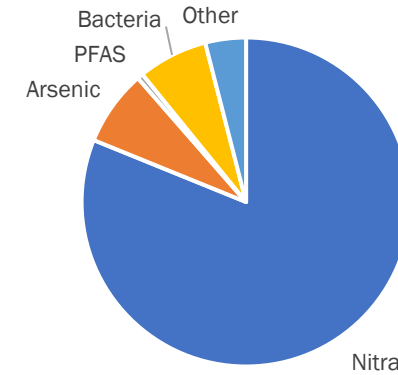
- \$10,000,000 allocated from America Recovery Plan Act (ARPA)
- Contaminated wells and well filling and sealing
- Expanded eligibility requirements
 - Additional contaminants – ex. Nitrate, bacteria, PFAS
 - Non-Community Public Water Systems
 - Increased income eligibility
- Program began October 2022
 - Funding available through Oct. 2024
- Program on track to distribute all funds



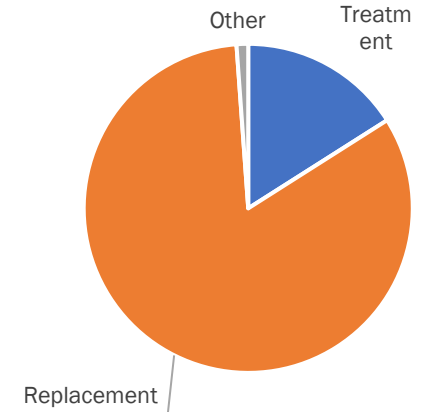
ARPA Well Compensation Update

Data as of 8/2/2023		
American Rescue Plan Act (ARPA) Well Compensation Grant Statistics		
Grant Type	Well Compensation	Well Abandonment
Private Well Applications	247	104
Non-Community Well Applications	<u>55</u>	<u>4</u>
Applications Received	302	108
Contaminants Reported for Awarded Grants		
Contaminant	Well Compensation	Well Abandonment
Nitrate	151	N/A
Arsenic	13	N/A
PFAS	5	N/A
Other Contaminant	<u>21</u>	N/A
Awards Issued	190	N/A
	Well Compensation and Well Abandonment	Remaining Balances
Grant Awards (estimated obligation)	\$3,210,547.78	\$6,174,452.22

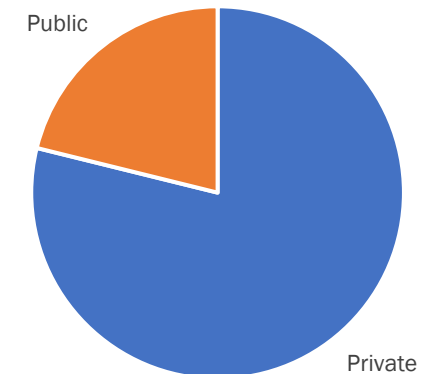
Qualifying Contaminants



Awarded Solutions



Well Classification



PFAS Compliance Sampling

NR 809 – MCL Requirements for PFOS & PFOA

- Rule Changes published August 1, 2022
 - MCL - 70 ng/L (parts per trillion) for total “PFOS and PFOA”
 - Per s. NR 809.20 (1)
 - MCL exceedance will result in public notice and corrective action schedule
 - **DNR may require public notice if state health-based recommended standard is exceeded**
 - [WI DHS Information for PFAS Recommended Standards](#)

Initial Monitoring Requirement Schedule

- Based on population served by system

Population.	Initial Monitoring Period
Pop > 50,000	October – December 2022
Pop. = 10,000 – 49,999	January – March 2023
Pop. = 300 – 9,999	April – June 2023
Pop. = 50 - 299	July – September 2023
Pop. < 50	October – December 2023

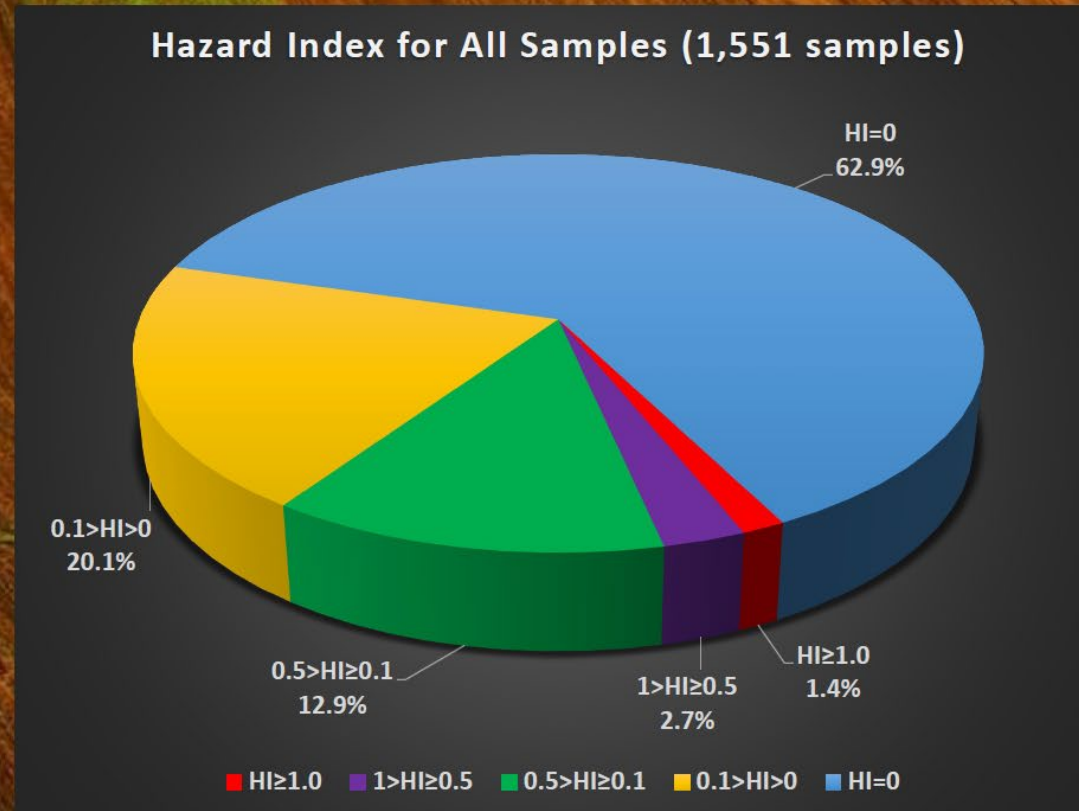
PFAS Compliance Sampling Update

- Approximately 800 public water systems have completed at least one round of sampling.
 - All Municipal Systems
- Over 1,500 individual PFAS samples
 - No WI MCL exceedances
 - 1.4% of samples exceed WI DHS health based recommended standards
- All data is available publicly online
 - [Drinking Water System Portal: Home Page \(wi.gov\)](#)
 - [PFAS Interactive Data Viewer | | Wisconsin DNR](#)

PFAS Compliance Sampling Update

HAZARD INDEX

Hazard Index	# of samples	Percent
≥ 1.0	22	1.4%
≥ 0.5	64	4.1%
≥ 0.1	264	17.0%
> 0	575	37.1%
0	976	62.9%



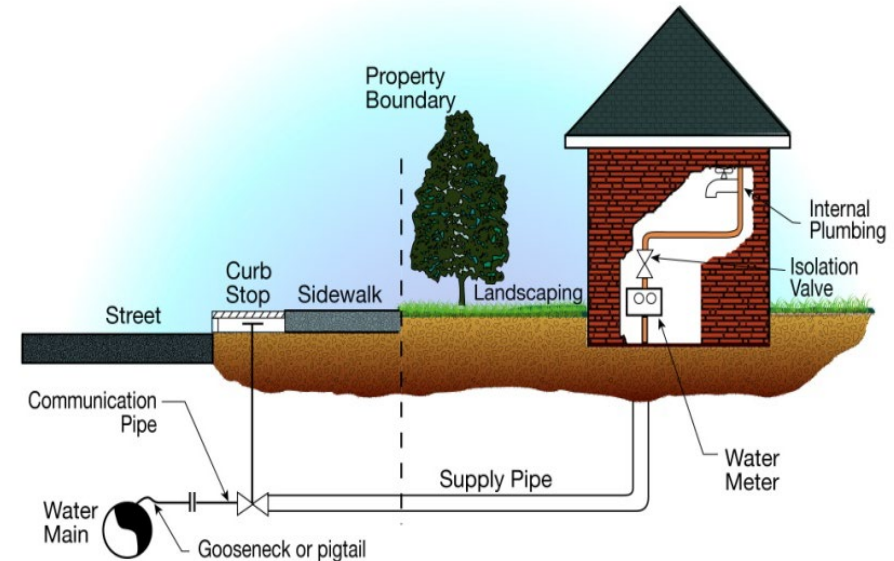
PFAS Federal Updates

- EPA Proposed a Draft MCL in March, 2023
 - PFOS – 4 ppt, PFOA – 4 ppt
 - Mixture of 4 other PFAS compounds
 - GenX – 10 ppt
 - PFBS – 2000 ppt
 - PFNA – 10 ppt
 - PFHxS – 9 ppt
 - EPA intends to propose final rule at the end of 2023
 - When finalized, DNR will update rule to match the federal standard

Lead & Copper Rule

Federal Lead & Copper Rule Revisions (LCRR)

- Went into effect on December 16, 2021.
- Compliance date is October 16, 2024.
- EPA intends to propose “Lead and Copper Rule Improvements” (LCRI) in 2023
- Must complete Materials Inventory by October 16, 2024
 - DNR is working on a technical assistance contract to help small systems with this requirement.
 - More information should be available soon on the contractor



Lead Service Line Replacement Accelerator

December 2022

Lead Service Line Replacement Accelerators Community Initiative



Wisconsin included as a pilot state

1. **Community Engagement Plans** that invite community input, provide educational resources, and meaningfully engage affected community members while identifying and replacing LSLs;
2. **LSL Inventories** that are necessary to identify funding and public notification needs and meet requirements in the 2021 Lead and Copper Rule Revisions (LCRR) for a complete inventory by October 2024.
3. **Lead Service Line Replacement Plans** that provide communities with a roadmap for identification, prioritization, and replacement of all LSLs, including public and private portions; and/or
4. **SRF Funding Applications** that help communities receive DWSRF funding for LSL replacement projects.

Federal Lead & Copper Rule Revisions

- **Complete service line materials inventory by October 16, 2024**
- **Expect more information from EPA regarding Lead and Copper Rule Improvements (LCRI) this fall (2023)**
- **LCRI expected to expand lead service line replacement requirements**
- **Federal funding now available for lead service line replacements**

Administrative Rules Updates

Drinking Water and Groundwater Administrative Rules Update



NR 811 – Community Water System Design and Operation

- Final approval was granted at the Natural Resources Board meeting April 12, 2023
- Legislative committee did not call for a hearing
- Rule changes will go into effect by early 2024

Drinking Water and Groundwater Administrative Rules Update



NR 140 – Groundwater Standards

- Natural Resources Board (NRB) approved bacteria changes in February 2023
- Continued work on PFAS changes under an open scope statement, including a stakeholder meeting held July 14
- Considering proposing a new scope statement that would include additional PFAS

Drinking Water and Groundwater Administrative Rules Update



NR 812 – Well and Pump Code

- Revision to allow limestone cement is nearing completion
- Drafting scope statement for changes to pump installation requirements

NR 146 – Driller and Pump Installer Licensing Code

- Drafting scope statement for changes related to licensing requirements and continuing education

CONNECT WITH US

Next Meeting | November 2, 2023

The meeting recording will be posted on the Drinking Water and Groundwater Study Group webpage.



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"WILD WISCONSIN:
OFF THE RECORD"