



MICHIGAN DEPARTMENT OF  
ENVIRONMENT, GREAT LAKES, AND ENERGY

# Water Use Advisory Council

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October 8, 2024

# WUAC Chair Order

## October 8, 2024

- Laura Campbell, Michigan Farm Bureau (1-5)
- Bryan Burroughs, Michigan Trout Unlimited (6)
- Pat Staskiewicz, Michigan American Water Works Association, (7-11)

# Agenda

## **Water Use Advisory Council (WUAC) Meeting**

Hosted by the Department of Environment, Great Lakes, and Energy (EGLE)

**Tuesday, October 8, 2024**

**1:00 p.m.- 4:00 p.m.**

**Lee Walker Conference Room, North Atrium, Constitution Hall**

**525 West Allegan, Lansing, MI 48933**

Remote Option Available Via Teams

[Click here to join the meeting](#)

Or call in (audio only)

[+1 248-509-0316, 979460526#](#) United States, Pontiac

**Phone Conference ID: 979 460 526#**

# Agenda (cont.)

## AGENDA

1. Welcome
2. Roll Call
3. Approval of Minutes-Roll Call Vote Discussion
4. Approval of Agenda-Roll Call Vote Discussion
5. Public Comment (Three Minute Limit)
6. Committee Chairs Report
  - a. Data Collection Committee
  - b. Models Committee
  - c. Conservation and Efficiency Committee
  - d. Implementation Committee
    - Discussion of Draft Legislative Report

# Agenda (cont.)

7. Adam Zwickle to Present: Building Capacity for Collaborative Water Management
8. EGLE Update
9. Future
  - a. 2024 Meeting Dates (at Con Hall unless others offer to host) (\*Quorum critical meetings)
    - November 12, 2024\*
    - December 10, 2024
  - b. Formats
  - c. Quorum
10. Open Comments (Three Minute Limit)
11. Motion to Adjourn

# 1. Welcome



## **2. Roll Call**



## **3. Approval of Minutes –Roll Call Vote**



## **4. Approval of Agenda—Roll Call Vote**

# 5. Public Comment

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3 Minute Limit



# 6. Committee Chairs Reports

- A. Data Collection Committee
- B. Models Committee
- C. New Topics Committee
- D. Conservation and Efficiency Committee
- E. Implementation Committee

# Data Collection Committee

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Update

# Models Committee

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Update

# Models Committee Workgroups

(Funded 2020 Recommendations)

- Michigan Hydrologic Framework (MHF) - active
  - Chair: Dave Hamilton
- Compiling Key Aquifer Properties for use in the WWAT – RFP out
  - Chair: Dave Lusch
- 3D Glacial Aquifer Mapping in two counties - active
  - Chair: Dave Lusch
- Michigan Integrated Water Management Database – active, folded into MHF project development
- WWAT user interface update – Models Committee will review

# Models Committee Workgroups

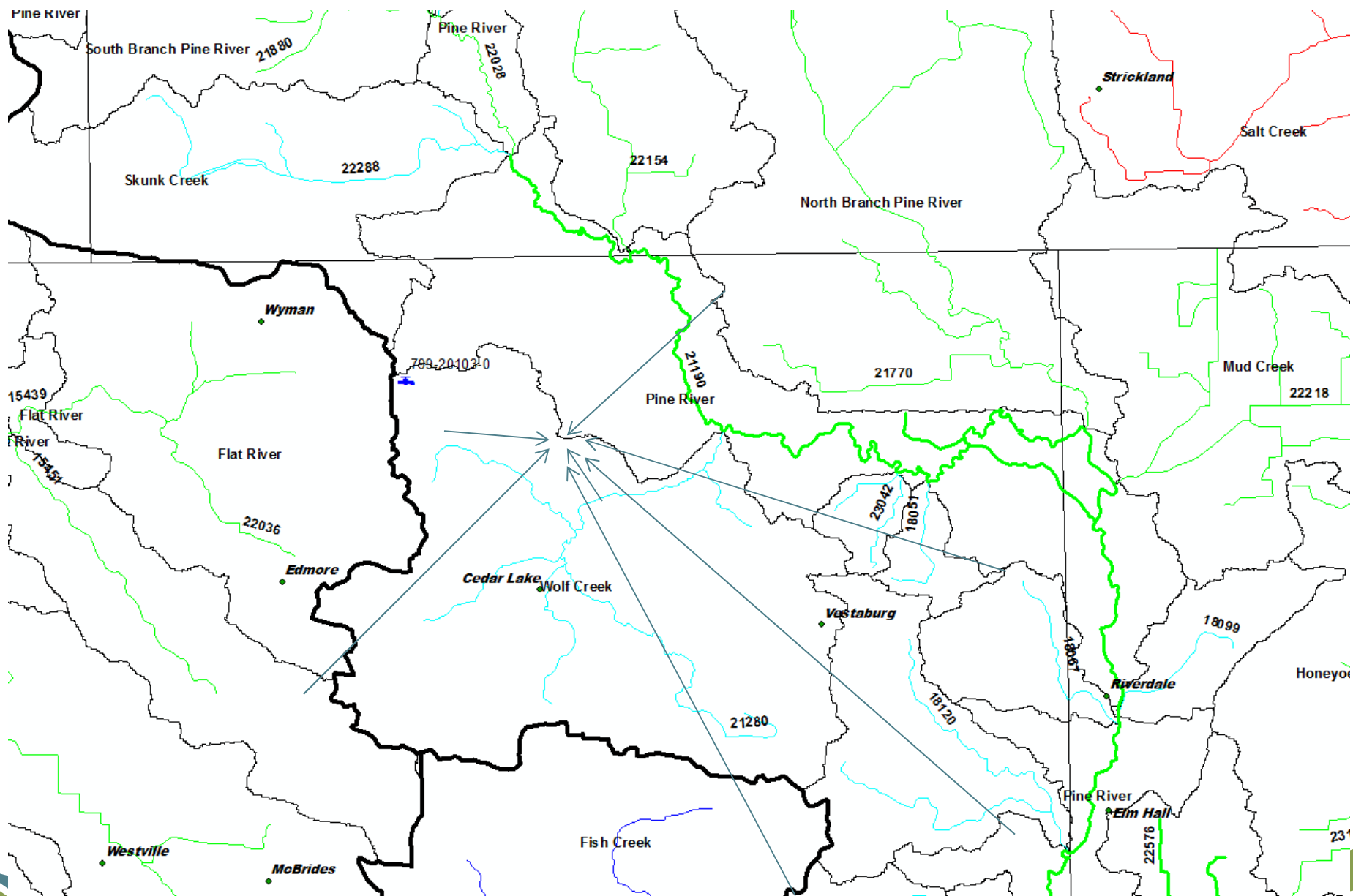
(Funded 2022 Recommendations)

- Conduct Downstream Accounting Research
  - MSU will lead work
  - DNR has funding for similar work, this will be coordinated.
- Evaluate Streamflow Depletion Effects Downstream Through a Stream Network
  - USGS will lead work
  - Agreements are being developed
  - Troy Zorn will chair workgroup for both

# Models Committee Recommendations:

- 1) Fund a project to investigate streamflow depletion in an area with significant large quantity withdrawals using detailed data collection and modeling.
- 2) Revise timeline requirement for Site-Specific Reviews (SSRs)
- 3) Improve the streamflow depletion calculation in the WWAT.

# Revisiting the “Half Max Rule” Streamflow Depletion Apportionment Improve the WWAT with web2







## Depletions calculated by the WWAT

> 1/2 max

- max	
21190	21.6
15451	10.2
23042	6.0
22136	5.1
18120	3.4

**7 WMAs (1 home + 6 adjacent), 2 debited**

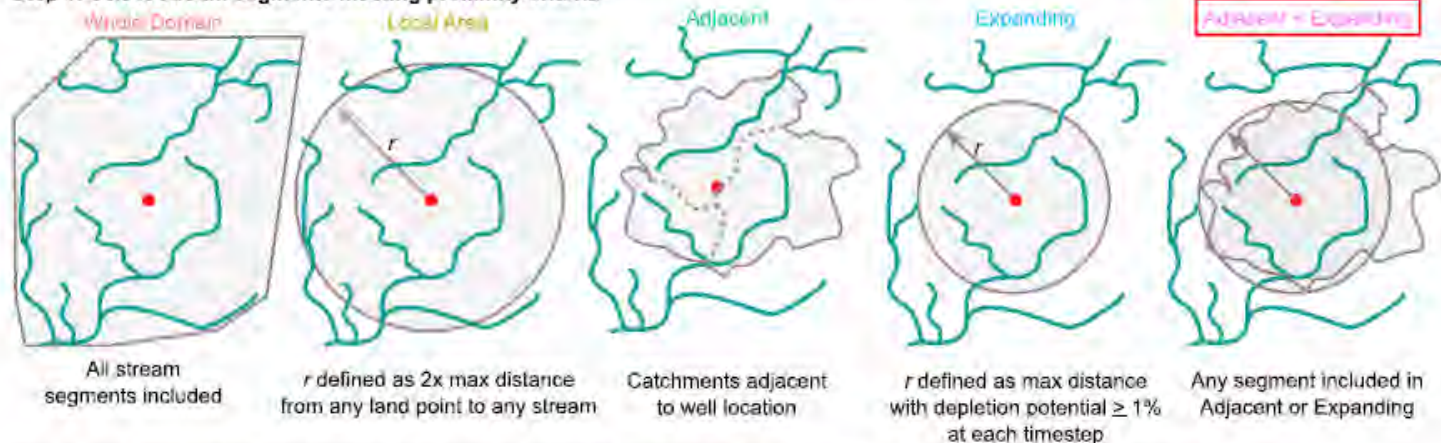
# Rapid and Accurate Estimates of Streamflow Depletion Caused by Groundwater Pumping Using Analytical Depletion Functions

Samuel C. Zipper<sup>1</sup> , Tom Gleeson<sup>1</sup> , Ben Kerr<sup>2</sup>, Jeanette K. Howard<sup>3</sup>, Melissa M. Rohde<sup>4</sup>, Jennifer Carah<sup>3</sup>, and Julie Zimmerman<sup>5</sup>

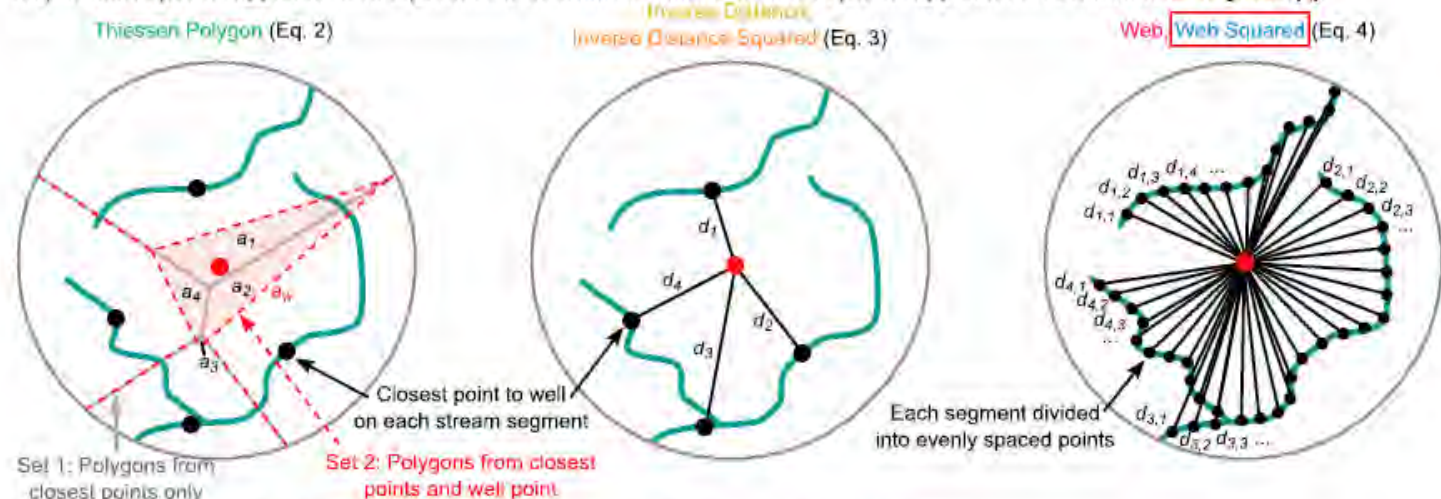
### Overview of analytical depletion functions

Which stream segments will a proposed well impact, and how much will each stream segment be depleted?

#### Step 1: Select stream segments meeting proximity criteria



#### Step 2: Use depletion apportionment equations to estimate the fraction of total depletion apportioned to each stream segment ( $f_i$ )

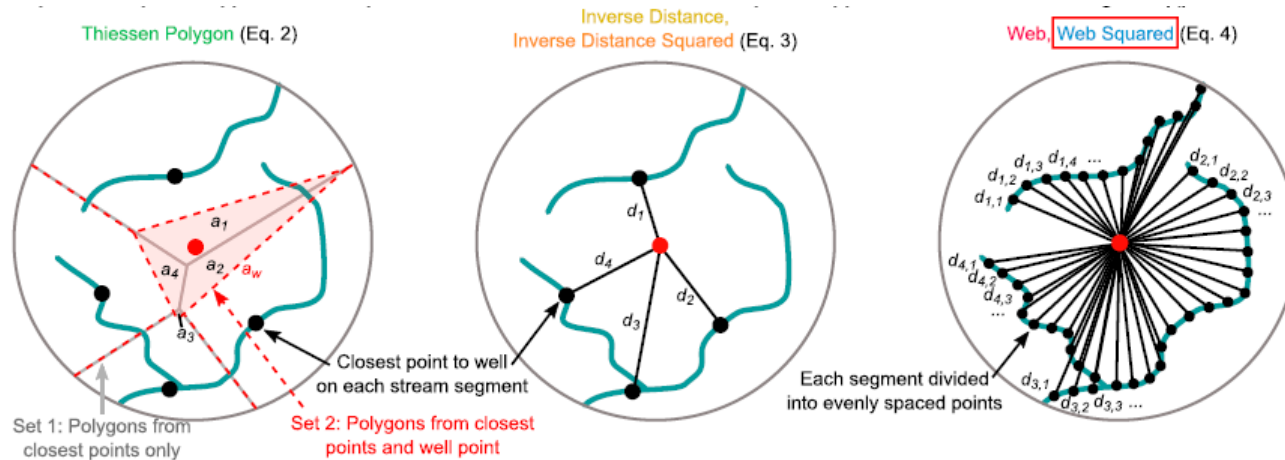


#### Step 3: Calculate streamflow depletion rate ( $Q_i$ ) for each segment using analytical model

Glavin & Fierman (1954), Eq. 1

OR

Hunt (1999), Eq. 6



**Adjacent** streams identified by stream segments with non-zero depletion fractions estimated by the Thiessen polygon depletion apportionment equation.



Comparison original WWAT, WWAT w/total calc depletion, and web2  
and cumulative depletion for all wells in WMA for WWAT and web2

Example	Single well								Cumulative depletion for all wells in WMA						Result of cumulative depletion for all wells in WMA		
	WWAT		Recalc		WWAT w/total		web2				WWAT		web2		Classification	Zone	Zone
	Well ID	Depletion (gpm)	A	Depletion (gpm)	Depletion (gpm)	A	Depletion (gpm)	A	Home WMA	#wells	Depletion (gpm)	A	Depletion (gpm)	A			
Kalkaska1	869	15.1	1	30	26.4	7	30.3	4	841	1	15	1	26	4	cold stream	A	A
VanBuren1	1711	2	1	3.8	2.8	5	3.2	2	4196	3	132	1	136	1	cold stream	A	A
Tuscola1	3117	23.5	1	29	25.8	7	29.2	1	7727	3	451	1	468	5	warm stream	A	A
Barry1	1839	267.5	1	570	501	6	552.5	3	9929	2	280	1	515	3	cool stream	A	A
Oceana1	2947	94	3	172	134.6	11	157.5	4	10172	2	98	1	142	4	cold transitional large river	B	B
Newago1	858	29.3	1	98	59.4	9	58.5	3	11740	10	351	1	725	7	cool stream	A	A
Hillsdale1	1522	265.5	2	468	415.6	7	457.6	3	12203	13	2569	4	3827	6	cool stream	D	D
Iron1	609	33.4	2	53	42.5	6	48.1	3	12219	3	64	2	95	3	cold transitional stream	B	B
Montcalm1	1474	202.6	1	206	203.4	7	204.3	3	12585	2	327	1	229	2	cool stream	B	A
Oceana2	1962	1.1	1	2.7	2.1	6	2.3	3	13535	2	1	1	2	3	cold stream	A	A
Leelanau1	3150	1.6	1	4	3	5	3.3	4	14687	3	10	1	12	6	cold stream	A	A
Livingston1	2792	1.5	2	2.1	1.6	10	1.4	2	17034	5	115	3	161	5	warm small river	A	A
St. Joseph1	2414	76.7	1	117	98.2	7	96.3	2	19845	10	1014	1	1225	8	warm stream	D	B
St. Joseph2	954	147.4	2	195	184.5	4	183.8	4	19996	7	1799	4	2213	4	warm stream	D	D
StJoseph4	3125	175.8	1	249	228.9	9	220.1	3	20060	22	3147	4	4411	10	cold stream	D	D
St Joseph5	2102	303.6	1	759	492.1	9	602.2	2	20720	55	9624	5	12934	8	warm small river	C	D
St. Joseph3	1281	165	1	246	197.9	6	208.7	2	20762	22	3784	4	4302	8	warm stream	D	D
Cass2	1995	17.1	1	37	30	9	34	4	20775	8	1138	4	693	11	cool stream	A	A
Gratiot1	3137	97.6	1	134	116.7	6	93.4	2	20939	16	874	1	1075	5	warm stream	D	D
Kalamazoo2	2228	70	2	97	85.2	4	79.8	2	20953	11	879	3	1214	5	cool stream	C	C
Gratiot2	1086	44	1	50	45.8	7	39.5	2	20979	5	292	1	320	3	warm stream	D	D
Calhoun1	1493	628.1	1	1165	982.8	18	1127.6	1	20988	27	3844	7	5284	14	warm small river	B	B
Calhoun2	3102	101.4	1	215	128.1	18	145	2	20988	27	3844	7	5284	14	warm small river	B	B
Montcalm2	799	135.5	2	219	181.9	7	92	5	21280	15	407	5	577	9	cold transitional stream	D	D
Kalamazoo1	2706	131.7	1	214	168.8	7	192.9	2	21337	13	1111	2	1421	3	warm stream	D	D
Berrien1	1292	5.4	1	11	7.3	9	9.4	3	21350	18	1061	2	1257	6	warm stream	C	D
Newago2	2406	151.3	1	306	187.2	9	267.3	1	21888	26	2057	6	2558	9	cool stream	C	C
Ottawa1	2261	26.7	1	32	29.1	11	26.3	4	22726	38	2879	2	3694	12	warm stream	D	D
Cass1	2720	56.9	2	84	71.9	5	73.3	3	990073	13	797	3	1003	5	cool stream	C	D
Berrien2	707	40.9	2	71	63.2	5	67.6	3	990076	5	473	2	626	7	cold stream	D	D

Recalc = Use half max rule to identify WMAs to be depleted, then recalculate depletions using those

A = #WMAs with depletion summed in method

March 24, 2023

# New Topics Committee

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Update

# Conservation and Efficiency Committee

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Update

# Implementation Committee

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Update



# Accomplishments from 2020

## Recommendations

2018 PA 509 codified the Water Use Advisory Council (WUAC) to make reports to the Michigan Department of Environment, Great Lakes, and Energy (EGLE), the Michigan Department of Agriculture and Rural Development (MDARD), the Michigan Department of Natural Resources (DNR), and the Michigan Legislature on the implementation of the water withdrawal assessment process at least every two years. As a result, the WUAC submitted its first report in December of 2020, including a list of recommendations for funding to improve data collection, modeling, water conservation, and education related to water withdrawal and natural resources protection across the state. 2022 PA 53 and 2022 PA 166 appropriated \$13 million to provide this vital work. The WUAC is pleased to report that work is underway to implement or complete all 2020 recommendations. A brief summary of work underway or completed thanks to the Legislature's 2022 appropriation is below. Several items are highlighted as requiring additional funding for operations, maintenance, and as part of ongoing projects and data collection, which the WUAC urges the Legislature to continue funding as part of EGLE's ongoing budget, and which are also summarized in Section XX of this report highlighting new funding requests:

### RECOMMENDATIONS TO ADVANCE WATER CONSERVATION

1. Advance Michigan's Water Conservation and Efficiency Efforts through State Climate, Energy, and Water Infrastructure Initiatives. Assess current climate, energy, sustainability, and water infrastructure policies and programs to identify gaps and opportunities to incorporate water conservation and efficiency, technological improvements, other state and national programs, and education. \$50,000 for one year.

A 12-month grant has been awarded to the Alliance for Water Efficiency (AWE) to identify innovations and technological advancements in water conservation practices and summarize sectors' existing processes and best management practices, with a focus on business and industry sectors. The team will also collect information and research water sectors implementing innovative and advanced water conservation BMPs across the region and broader U.S. to inform Michigan's Water Conservation and Efficiency Program.

2. Increasing Water Efficiency and Conservation Practices in the Agriculture Industry. Provide funding for two Full-Time Equivalent (FTE) positions through Michigan State University Extension (MSUE) to develop and launch an educational program for agricultural water use efficiency for both plant and animal industries. \$600,000 over three years (\$200,000 per year).

MSUE has hired two Extension positions to launch this educational program: one in May of 2024 and one in August of 2024. MSUE may need to request an extension on this program given the additional time involved in bringing the new hires into this educational program.

## RECOMMENDATIONS TO CONTINUE AND IMPROVE CURRENT OPERATIONS AND DATA COLLECTION

1. Michigan Integrated Water Management Database. A database to facilitate geologic and hydrologic data collection and modeling by making current data accessible and available in a common geospatial format. \$250,000 over two years (\$125,000 each year).

Michigan State University (MSU) and EGLE signed a grant agreement for MSU to implement both the Michigan Integrated Water Management Database (MIWMD) and the Michigan Hydrologic Framework (MHF) projects. The U.S. Geological Survey (USGS), Midwest Water Science Center, is a subcontractor to MSU for the MHF portion of this grant project. The MSU and USGS project teams have ongoing meetings with both EGLE staff and members of the WUAC Models Committee.

2. Well Driller Trainings for Improved Data. Information collected for the water withdrawal assessment program depends on accurate and consistent subsurface data input to the Wellogic database submitted by well drillers, who must be trained to accurately identify and submit subsurface and well data. \$4,000 over 2 years (\$2,000 each year).

Michigan Geological Survey (MGS) is conducting this training with private well drillers as part of an ongoing program to improve knowledge and capacity for accurate Wellogic data submission. MGS brings geologic core samples from the Michigan Geological Repository for Research and Education (MGRRE) to these training sessions to improve the drillers' geologic descriptions in their well logs. MGS also invites EGLE staff from the Drinking Water and Environmental Health (DWEHD) and Geologic Resources Management Division (GRMD) to give presentations on their respective programs during these trainings.

3. USGS and EGLE Streamflow Gages. This program is funded from several local, state and federal sources. State funding sources include legislative appropriations to implement the 2020 and 2022 WUAC recommendations, as well as groundwater proposal for change (PFC) funding. Long-term funding needs to be provided for both the installation of new gages, operation and maintenance of existing and new gages, and miscellaneous (one-time) flow measurements.

EGLE and USGS have entered into a joint agreement to install 8 new stream gages by the end of 2024, and EGLE is working on additional agreements to install an additional 12 gages. \$4.5 million out of \$15 million total in EGLE's budget for stream gages, miscellaneous streamflow measurements, and monitoring wells will go toward these 8 gages to depleted water management areas and other high priority areas for updated data collection.

## RECOMMENDATIONS FOR NEW OPERATIONS TO IMPROVE DATA COLLECTION AND MODELING

1. Michigan Hydrologic Framework (MHF). The MHF will a) Facilitate the creation of groundwater/surface water models to improve water management decision making through centralized access to up-to-date hydrologic data, comprehensive hydrologic analysis, and other models. The MHF will incorporate new data and analysis, and link GIS databases and the MIWMD to help create regional models. b) Create three regional models to more accurately assess water withdrawal impacts within the MHF, and to assess its functionality. c) Assess metamodeling processes on a regional model to develop a rapid method to evaluate potential water use impacts. \$2,100,000 over three years (\$900,000 in year 1, \$700,000 in year 2, and \$500,000 in year 3).

See Item 1 in the Recommendations to Continue and Improve Current Operations and Data Collection for a discussion of the grant agreement between MSU and EGLE to implement both the MIWMD and MHF projects.

2. Geologic Data Collection and Mapping in up to 25 targeted areas of Michigan. Expands geologic information with data from drilling, soil sampling, seismic and gamma ray logging to produce accurate geological maps, static groundwater levels, and bedrock topography. Michigan Geologic Survey will conduct data collection, which can be used in multiple program areas including the water withdrawal assessment program, PFAS tracking, waste leachate tracking, sand and gravel assessments, and others. \$3,000,000 annually.

MGS received funding to conduct this work via 2022 PA 53. This funding will be critical to continue so that MGS can not only perform its data collection but also expand to additional priority counties to complete its goal of 25 targeted areas.

3. Monitoring Well Network. Install monitoring wells and join the National Groundwater Monitoring Network (NGWMN). EGLE and U.S. Geological Survey to partner on effort. \$259,000 for first year and then \$226,000 thereafter.

EGLE received a two-year grant (ending in July 2025) for \$92,915 to become a new data provider to the NGWMN. The initial grant provides funding for EGLE to link its databases to the NGWMN and begin providing groundwater elevation data from inactive USGS wells and new wells installed by MGS. EGLE can apply for future grants for activities such as adding additional wells to the network, repairing or abandoning damaged wells, and adding equipment (e.g., transducers) in the wells. Once EGLE's Groundwater Data Management System [using the Environmental Quality Information System (EQulS) software] is created, it will be linked to the NGWMN so that EGLE can query EquIS to report data directly to the NGWMN.

## RECOMMENDATIONS FOR ADDITIONAL ACTIVITIES TO IMPROVE DATA COLLECTION AND MODELING AS CONTINUED AND NEW OPERATIONS ARE UNDERWAY

1. Long-term planning. Analysis of streamflow, groundwater, and geologic data to identify critical gaps and needs, and identify data collection priorities. \$100,000 over two years (\$50,000 each year).

EGLE is working with the WUAC on work plan finalization, and has acquired the EquiS software platform to capture and store long-term trends.

2. Water Withdrawal Assessment Tool (WWAT) user interface update. Display registration information and current status of water management areas. \$50,000 single expense in one year.

The Michigan Department of Technology, Management, and Budget (DTMB), and EGLE combined the user interface and compiling key aquifer properties projects into a larger information technology (IT) project to improve the Water Withdrawal Assessment Tool (WWAT). The joint DTMB and EGLE team is reviewing contractor bids. A contract should be awarded by the end of 2024.

3. Compiling Key Aquifer Properties for use in the WWAT. Update statewide estimates of transmissivity, and identify water management areas where storage coefficients may be changed to more accurately reflect geologic conditions. \$110,000 over two years (\$55,000 each year).

Updating the aquifer properties used by the WWAT's groundwater model is another part of the same IT project mentioned in the previous item.

4. 3D Glacial Aquifer Mapping in Two Counties. Use transition probability geostatistical mapping in two Michigan counties: Cass and Calhoun, to assess the ability of this mapping process to identify glacial aquifer properties and compare with Geological Survey 3D interpretations. \$80,000 over two years (\$40,000 each year).

A grant has been awarded to Barr Engineering. They are obtaining data sets from the MGS and have begun their analysis work.

5. Wellogig Digitization and Database Population. A two-year project to be conducted by MGS to digitize and geolocate Wellogig records to improve data collection and capacity. \$1.7 million over two years.

MGS is working through the digitization project and maintains an online dashboard to detail their progress on this project.

## NEW AND ONGOING ACTIVITIES THAT DO NOT NEED ADDITIONAL STATE FUNDING

1. Develop Water User Committee (WUC) User's Manual. This manual will equip WUCs with information, tools, and resources to develop realistic shared solutions to sustainably manage water use. \$250,000 will be provided by the EGLE Office of the Great Lakes through the Michigan Great Lakes Protection Fund to develop this manual and convene one to two WUCs as case studies to inform the manual development.
2. Develop standards & protocols for collection and use of new data within the program. This process is ongoing with EGLE staff and the Water Use Advisory Council (WUAC).
3. Well-owner outreach on registration completion requirements. This process is ongoing with EGLE staff and the WUAC.
4. Continue review and work on Cass County water use pilot study model. This process is ongoing with EGLE staff, partners, and steering and technical committee members for the pilot project.

The first three projects are underway and nearing completion. To continue work on the Cass County water use pilot study model, the WUAC has formed a work group to discuss how to improve the Cass County pilot study's groundwater model. In the meantime, EGLE WUAU staff use the data collected by the Cass County study, when appropriate, in their site-specific reviews.

# 7. Building Capacity for Collaborative Water Management

## **Project Team:**

Adam Zwickle

Jeremiah Asher

Brockton Feltman

Maria Claudia Lopez

Laura Schmitt Olabisi

Glenn O'Neil

Sarah Zwickle

Proposal title:  
Building Capacity for Collaborative Governance  
through a Participatory Modeling Approach



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# Project Goals

1. Learn the current barriers associated with the convening of a WUC
2. Determine what is needed to overcome these barriers
3. Understand:
  - a) What information, tools, and strategies are needed for a WUC to reach an agreement for sustainable collective water use
  - b) What is the best process for using these resources to reach an agreement
4. Communicate this information in a broadly accessible WUC guide
5. Pilot the effectiveness of this guide by convening 2-3 pilot WUCs using the developed guide



## Project Overview

- Assembled stakeholder advisory board – *summer 2022*
- Water user survey – *fall 2022*
- Focus groups – *spring 2023*
- Development of WUC guide – *summer 2023 - summer 2024*
- Participatory Case studies – *spring 2024*

# Water User Survey – 2022

## **Wave 1: MDARD**

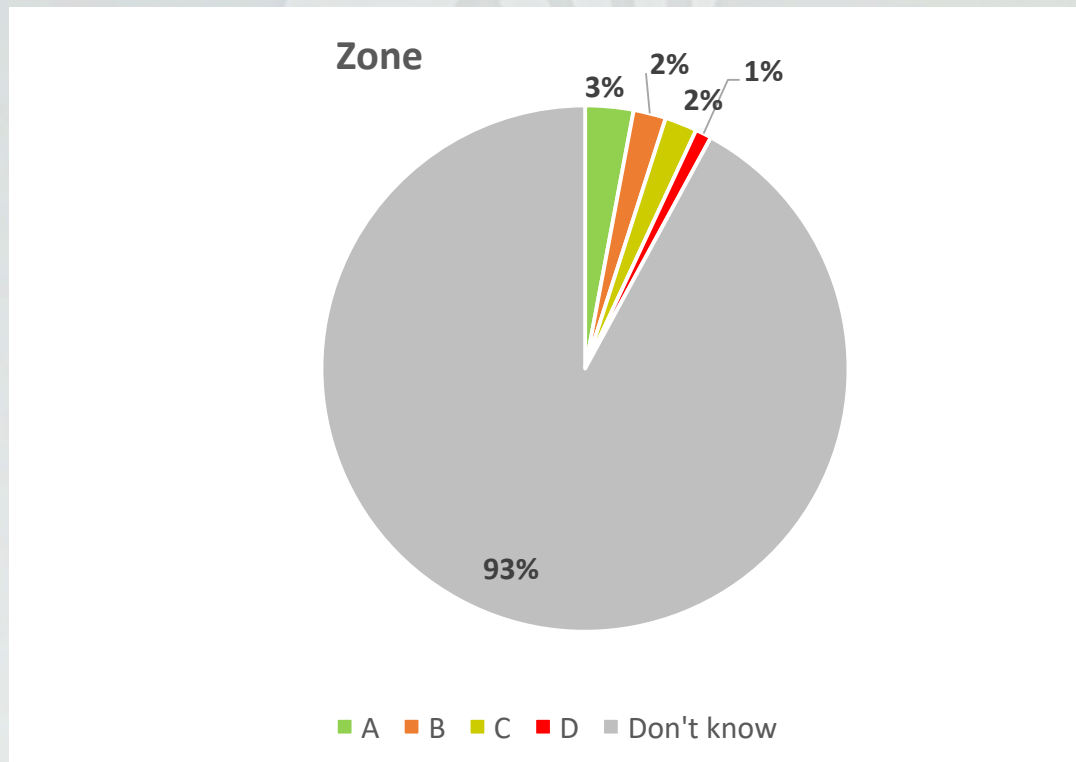
- 1788 water users emailed on September 23.
- Four follow up emails sent: 9/26, 9/27, 10/2, and 10/6.
- 555 respondents, 31% response rate.

## **Wave 2: EGLE**

- 1531 water users emailed on November 11.
- Three follow up emails sent: 11/15, 11/18, and 11/22.
- 450 respondents, 29% response rate.

- Presented to WUAC: October 10<sup>th</sup>, 2023

In the Michigan Water Withdrawal Assessment Tool, in what zone were the majority of your proposed water withdrawal screening results located?



## Limited knowledge of Michigan water law

The large water user community is unfamiliar with WUCs or the legal requirements for them

- “Precontemplative”
  - Motivated by vulnerability
  - Before introducing WUCs as an opportunity, communicate the challenge
- “Knowledgeable”
  - Motivated by efficacy
  - Will a WUC reduce my risk?

*Risk Analysis, Vol. 27, No. 4, 2007*

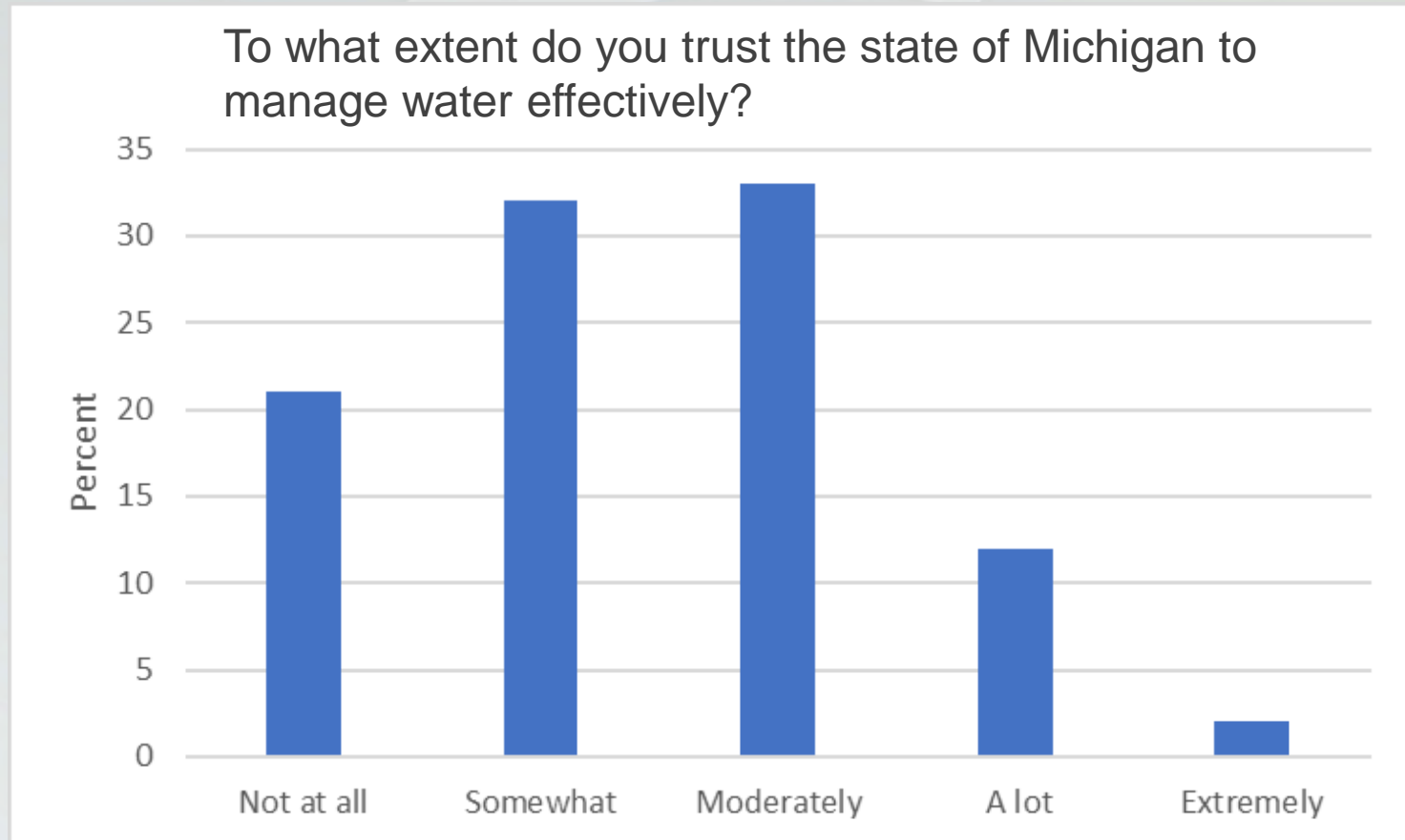
DOI: 10.1111/j.1539-6924.2007.00930.x

### **What Motivates Individuals to Protect Themselves from Risks: The Case of Wildland Fires**

**Ingrid M. Martin,<sup>1\*</sup> Holly Bender,<sup>2</sup> and Carol Raish<sup>3</sup>**

This research investigates the cognitive perceptual process that homeowners go through when faced with the decision to protect themselves from the risk of wildfires. This decision can be examined by looking at the interaction between the integrated protection motivation theory—

## Low trust in state



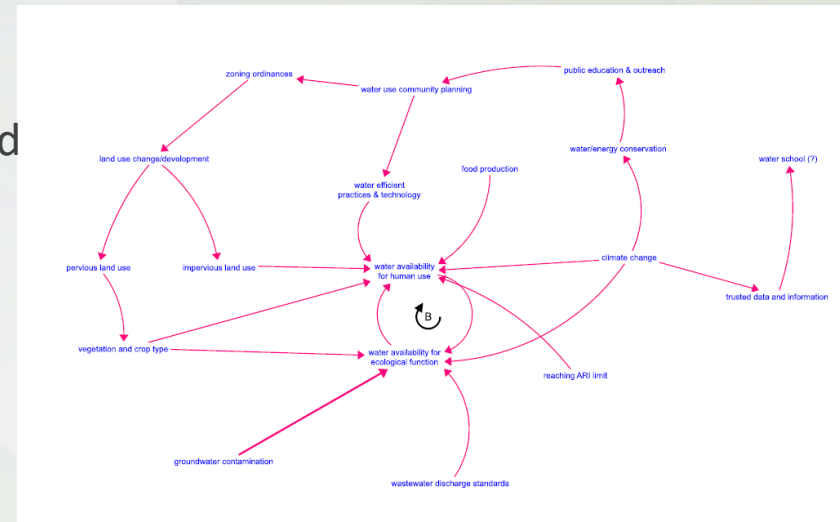
## Other takeaways...

1. Salient risks facing water users:
  - Water quality
  - Government overreach
  - Water quantity
2. Perception that water is abundant and not very threatened



## Focus Groups – 2023

- Gathered stakeholders in two sessions
- Discussion
  - Issues behind how SSRs, Zone C & D classifications, and WUCs are communicated to water users
- Participatory modeling exercise
  - The connection between water quantity and quality was highlighted



## Development of WUC Guide(s) – 2023-2024

- Numerous rounds of iterative feedback
- Convener
  - Responsible for assembling the group
- Facilitator
  - Responsible for leading the group
- Participant
  - Large quantity water user representative of local government
- Not set in stone...future updates needed





## Participatory Case Studies – 2024

- Two water management areas were chosen in collaboration with the leadership team
- Local extension agents helped establish initial meetings
- Both groups eventually declined to participate
  - Offered various criteria for participating
- MSU's Institutional Review Board of ethical research prohibits further contact after someone has opted out
  
- Valuable lessons were learned...

## Conclusions - Barriers

- Lack of clarity surrounding the regulatory process in general, and what role WUCs can play in helping water users
- Limited understanding of how the WWAT works, how it is used to make watershed determinations, and when data is collected to verify it
  - Confusion, miscommunication, and deliberate obfuscation
- Lack of incentive or support for participating in a WUC
- No precedent or guidelines for what constitutes an acceptable WUC agreement

## Conclusions - Barriers

- All of these contribute to an overall lack of trust in EGLE

## Conclusions - Barriers

- Water users do not believe there is a problem worth addressing
  - Scarcity is a key driver in collaborative natural resource management

## Conclusions - Recommendations

- Better communication with water users
  - What zone they are in
  - How that is determined
  - The reasoning behind WUCs
  - *Be available to answer questions*





## Conclusions - Recommendations

- Provide resources to support the convening and facilitation of WUCs
  - Local water data
  - Maps
  - Facilitators

## Conclusions - Recommendations

- Clearly define who is *required* to be in a WUC and who *can* be part of a WUC

## Conclusions - Recommendations

- Define the criteria by which WUC agreements will be judged
  - Develop a set of acceptable and unacceptable practices
  - Determine what role “preventative measures” can play



## Conclusions - Recommendations

- Lay out issues of enforcement
  - Determine what happens when a WUC agreement is accepted but not upheld
  - Determine who is responsible for monitoring
  - Define conditions under which the agreement can/must be revisited

# Questions?

Thank you!

Water Use Advisory  
Council





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# Program Update

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Water Use Advisory Council

October 8, 2024

# Outline

- GRMD hiring updates
- 2020 Recommendations
- USGS NGWMN Grant
- Part 327 metrics (calendar year)
- Questions

# GRMD Hiring Updates

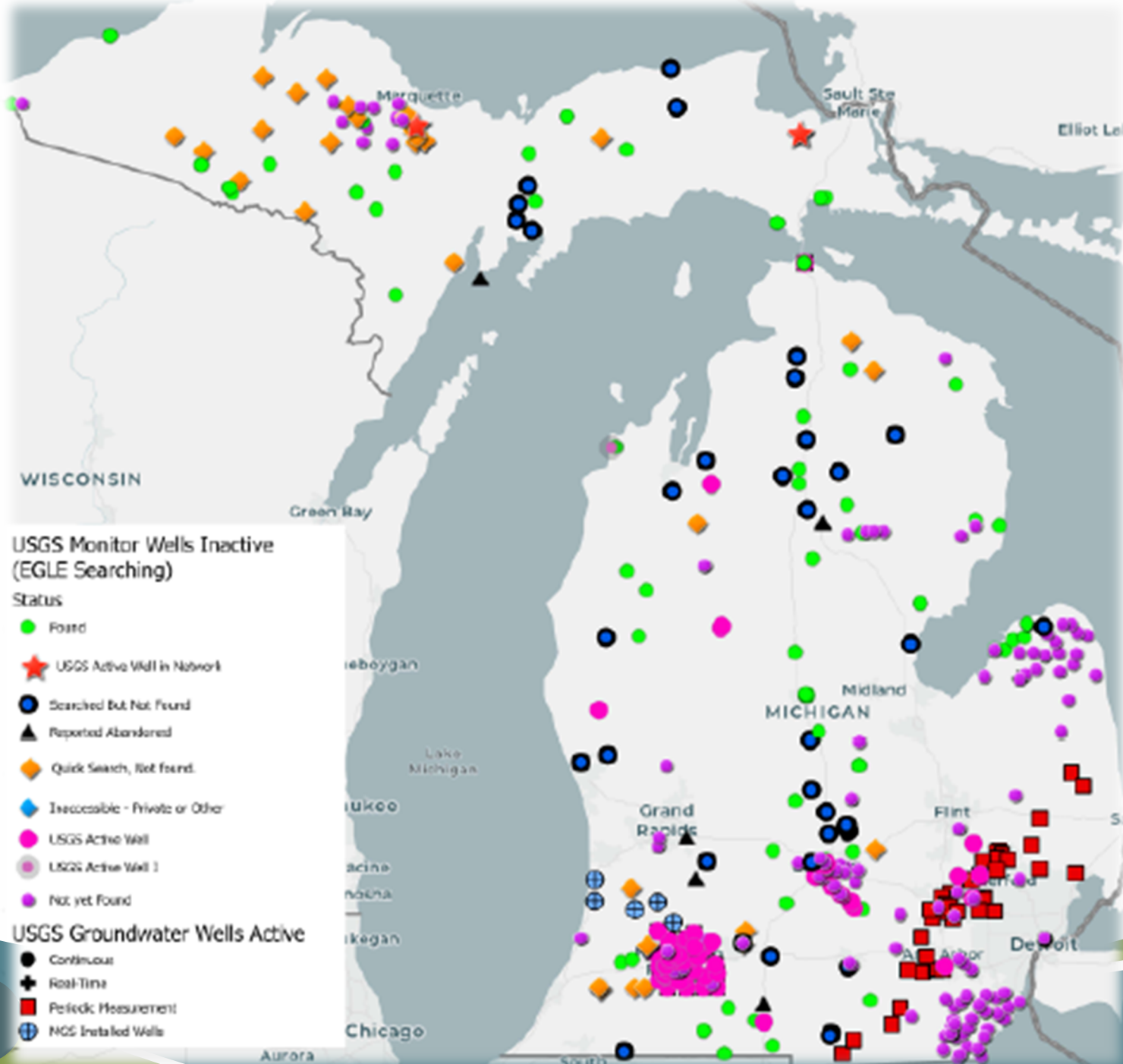
- Sydney Ruhala Geology Specialist 13 in Groundwater Data Unit (GDU)
- Geologist 9-11 (GIS Support) in GDU
- Groundwater & Geological Services Section (GGSS) Manager
- Geologist 9-11 (SSR) in WUAU

# 2020 Recommendations

- Michigan Hydrologic Framework & MI Integrated Water Management Database
- Transition Probability Mapping
- Aquifer Properties RFP published

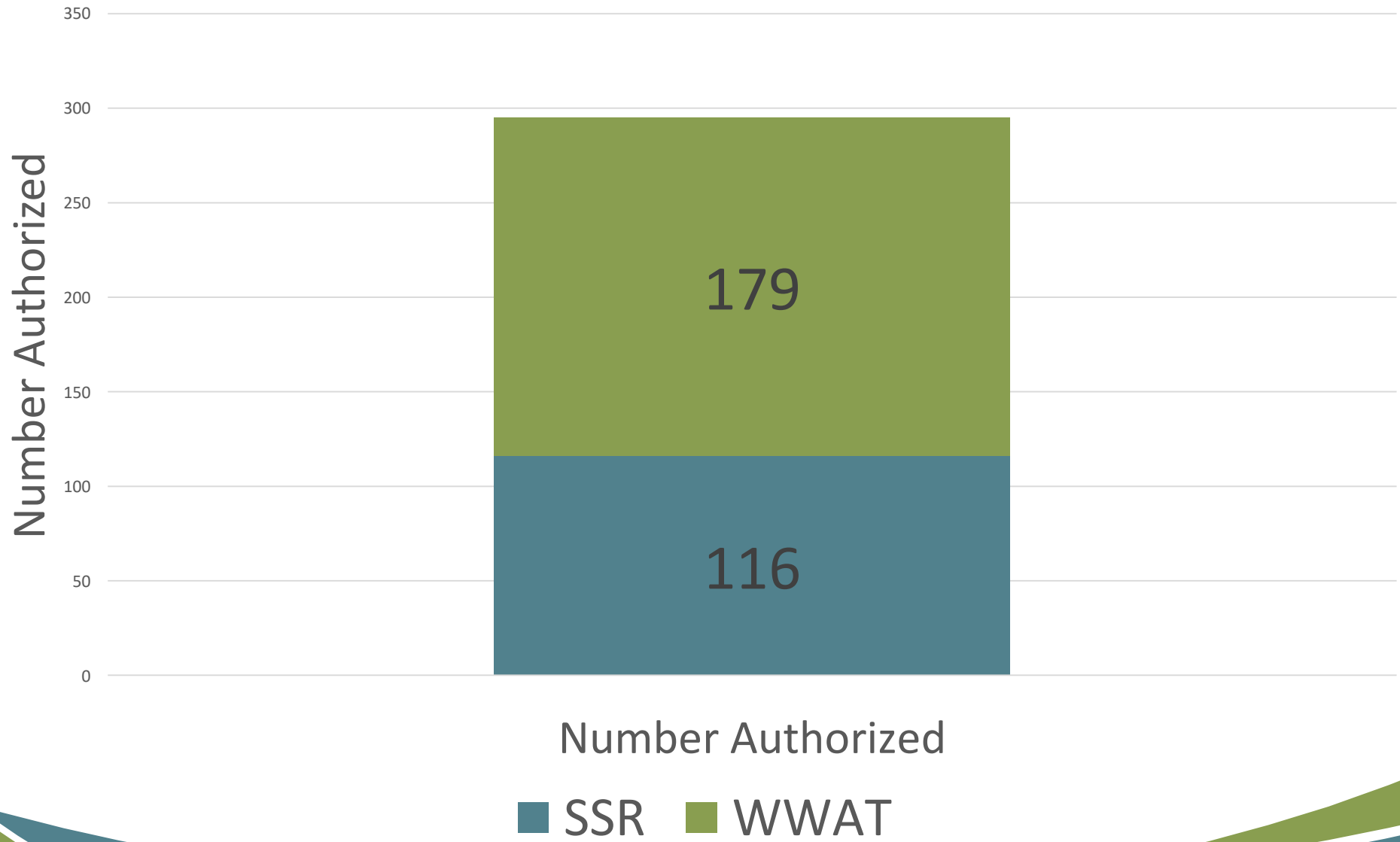
# USGS National Ground Water Monitoring Network

- EGGLE awarded \$92,915 grant
- 2-year grant, ending in July 2025
- Covers EGGLE becoming new data provider
- Year 1 progress report sent to USGS

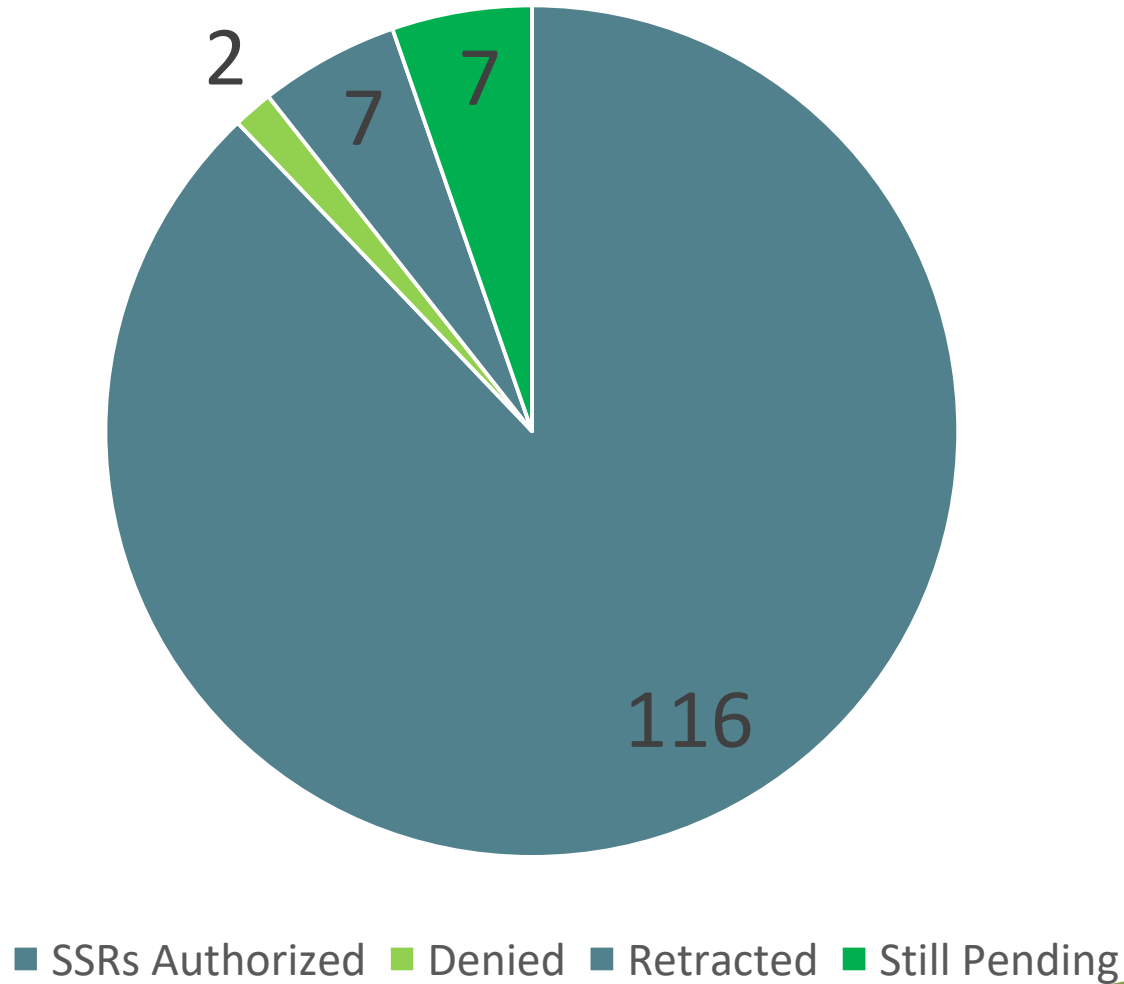




# LQWs Requested in 2024: WWAT & SSR



## Total SSRs Received and Determinations Made During 2024



## 2024 Timeliness

Average Number of Business Days  
from Receipt of SSR Request:

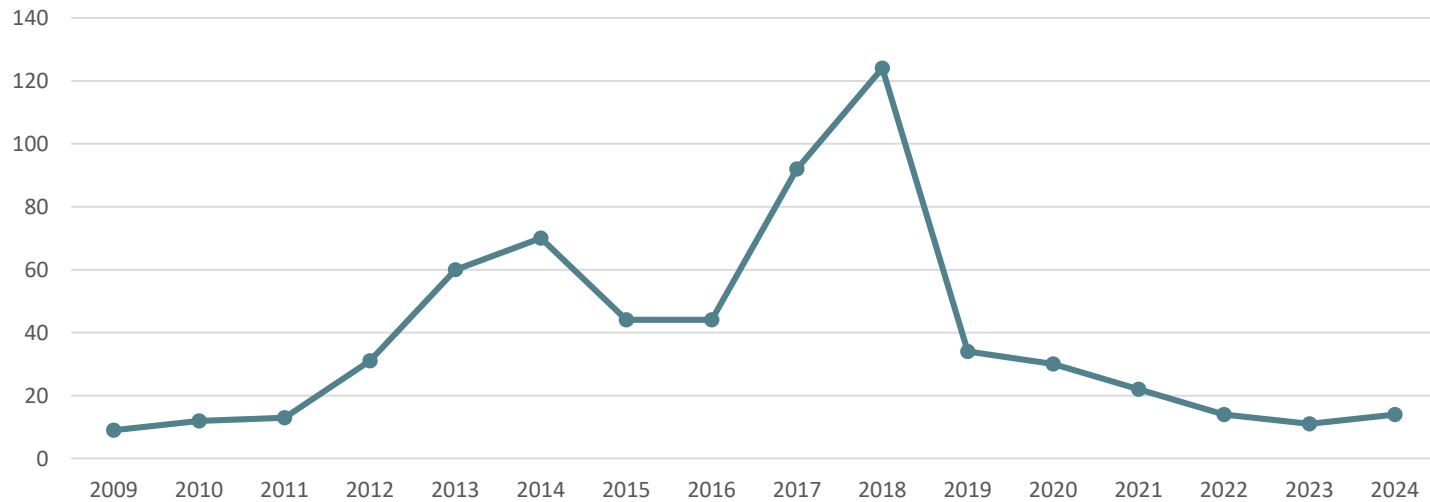
**14.6 Days**

Percentage of SSRs completed  
within 10 Business Days:

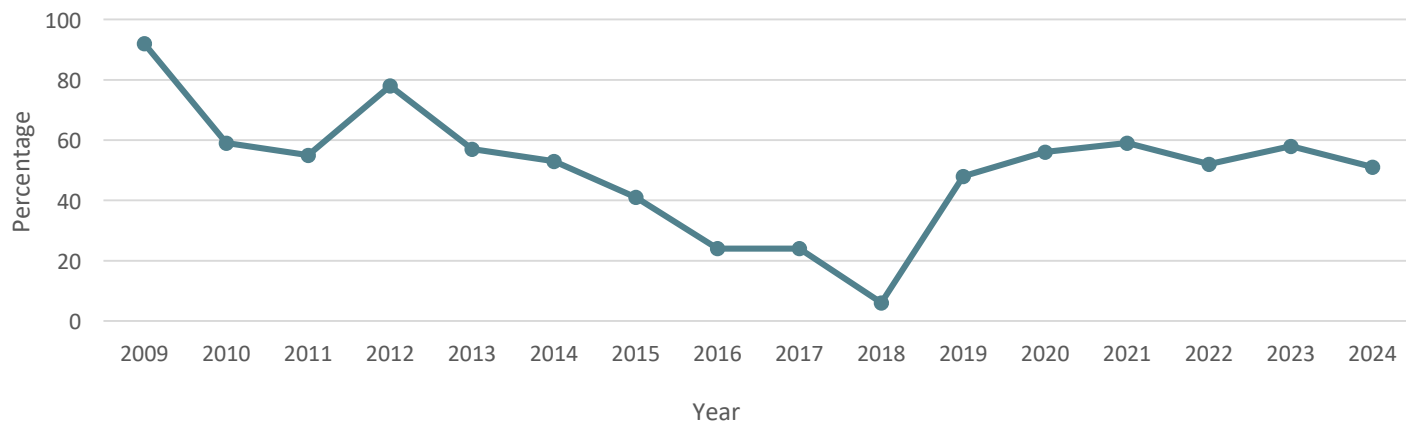
**51 %**

Statutory Deadline: 10 Business Days

Average Number of Business Days from Receipt of SSR Request



Percentage of SSRs Completed within 10 Business Days



Statutory Deadline: 10 Business Days

# Pre-Screening Review Metrics

January 2, 2024, to September 27, 2024

- 20 Total Pre-Screening Reviews Completed
  - 5 Zone A
  - 2 Zone A/Geology Pass
  - 9 Zone B
  - 2 Zone C
  - 0 Zone D
  - 2 Baseline Capacity Replacements

# 327 Permit Metrics

As of October 1, 2024:

- 1 permit issued
- 6 applications pending

# Compliance Metrics

## January 2024 to October 1, 2024

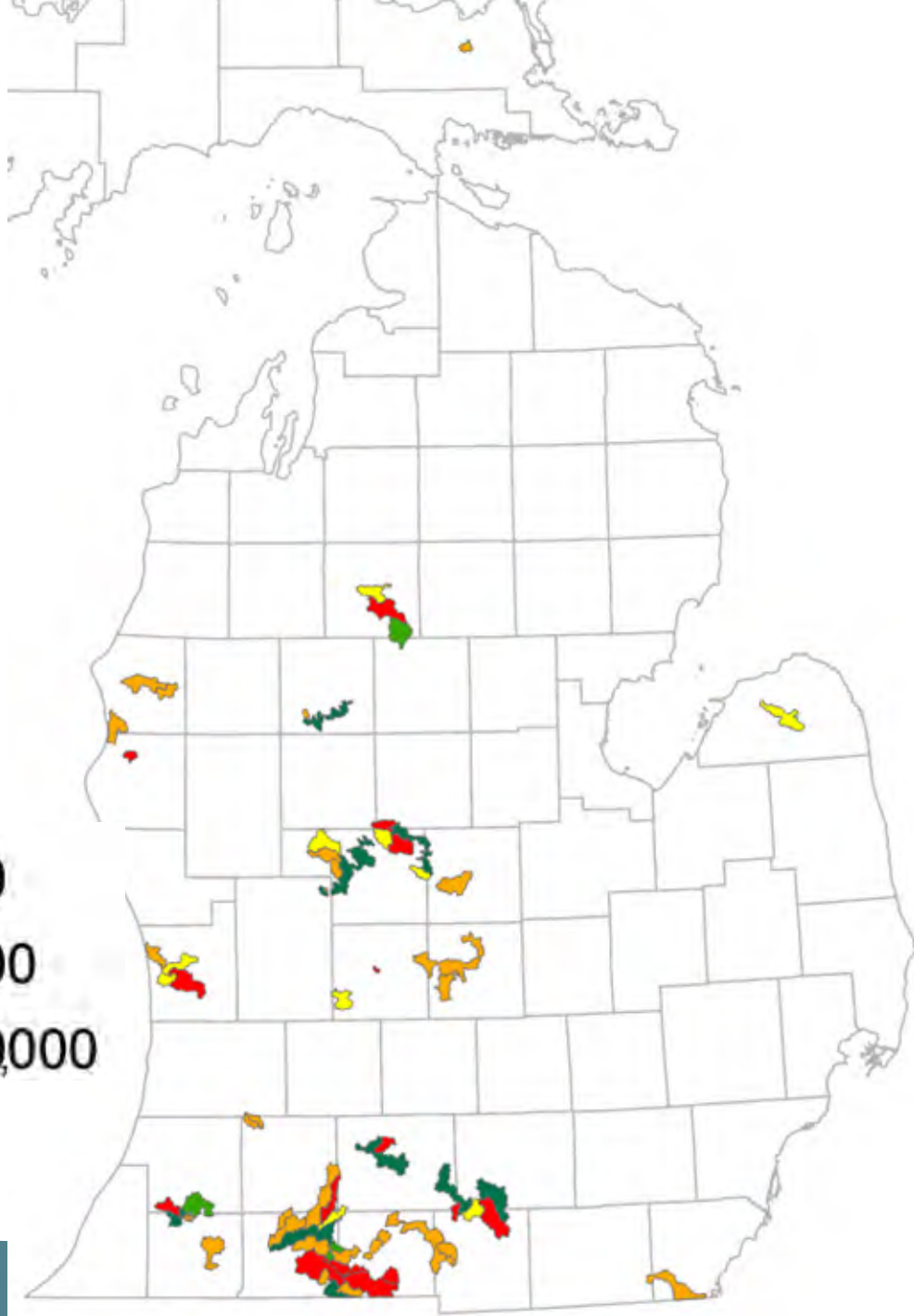
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- Compliance Communications 88
  - After the Fact Registration 4
  - Missing Pump Information Requests 1
  - Revised Registrations 58
  - Installation Verifications 25
- First Violation Notices 15






# WMAs debited by SSRs that received a Zone D Determination





WMA Number	Available Streamflow	WMA Number	Available Streamflow	WMA Number	Available Streamflow	WMA Number	Available Streamflow
3452	-517	20711	3	3377	26	19745	597
10018	-357	19608	4	11927	38	11978	869
21337	-353	21048	4	22072	51	15601	1,159
19923	-121	15572	5	19610	52	13410	1,472
22288	-110	22426	5	7372	63	21009	2,171
10445	-66	6245	6	20839	63	21338	3,993
20781	-52	21614	9	7235	68	10535	4,462
13883	-42	10642	10	20038	90	20775	5,060
19606	-40	20944	12	21393	118	21190	5,889
21710	-12	21198	12	22036	145	10745	20,919
21280	-3	21975	12	10164	153	23229	33,003
11650	0	15503	15	22726	158	15216	79,272
15183	0	21730	15	9987	184		
16079	0	11651	16	15367	208		
19937	0	20807	16	21276	263		
21773	0	3392	19	12873	270		
19671	1	19936	22	16300	337		
20762	1	20720	22	11079	462		
12949	3	23083	22	21759	594		



# Questions?

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**Environment, Great Lakes, and Energy**

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# 9. Future

## a. 2024 Meeting Dates (at Con Hall unless others offer to host) (\*Quorum critical meetings)

- November 12, 2024\*
- December 10, 2024

## b. Formats

## c. Quorum

# 10. Open Comments

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3 Minute Limit

# 11. Motion to Adjourn