## **Online Public Meeting**

# Wolverine's Draft Residential Well Resampling Response Activity Plan

Tuesday, June 23, 2020 6:00 – 7:00pm



MICHIGAN DEPARTMENT OF ENVIRONMENT, GREAT LAKES, AND ENERGY

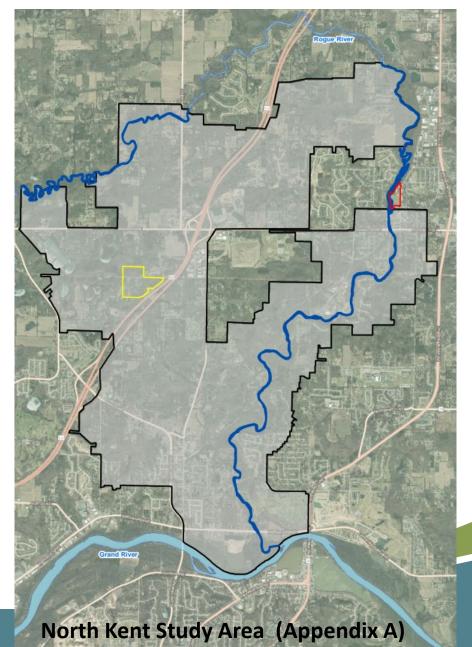


## February 19, 2020 Consent Decree

 Consent Decree (CD) between the State of Michigan (Plaintiff), Plainfield and Algoma Townships (Intervening Plaintiffs) and Wolverine (Defendant) became effective on Feb. 19, 2020

(www.Michigan.gov/Belmont)

- Serves as the framework for all future PFAS response activities performed by Wolverine in the "North Kent Study Area"
- Wolverine will conduct these activities under EGLE oversight



## **Requirements of Consent Decree**

General actions Wolverine must take under the Consent Decree:

- Municipal Water Expansion (Section 6.0)
- Filter Operation & Maintenance (Section 7.5)
- ➤ Residential Drinking Water Well Sampling (Section 7.6 and Appendix M )

Residential Well Resampling Response Activity Plan

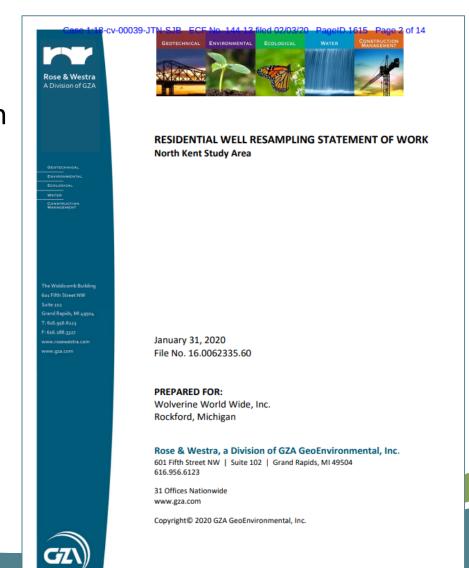
- Tannery Site Source Control (Section 7.7)
- ➤ House Street Disposal Site Source Control (Section 7.8)
- ➤ Groundwater Investigations (Section 7.9)
- Groundwater-Surface Water Interface (GSI) Investigation (Section 7.10)



## **Consent Decree: Appendix M**

#### Residential Well Resampling Statement of Work

- Appendix M contains a Statement of Work (SOW) which proposed the general approach and rationale for Wolverine's Residential Well Resampling in the "Filter Areas" of the North Kent Study Area.
- This SOW was included as part of the Consent Decree which had a public comment period in February 2020.



## **Consent Decree Appendix M:**

Established the general outline for residential well resampling:

- Homes located in Filter Areas, which do not have whole-house filters (POETs), and that haven't been sampled at least two times as of the CD effective date.
- Phased/staggered sampling approach based on:
  - Number of samples collected from each well historically
  - PFAS concentrations
  - > Well depth
  - Area geology
  - groundwater flow

## Residential Well Resampling Response Activity Plan:

Subject to THIS Comment Period

Contains details regarding the work that was outlined in Appendix M.

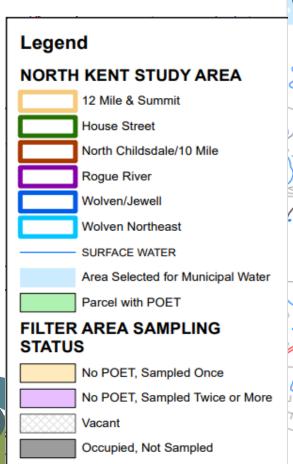
- > Figures and tables
- Sampling and analytical procedures/protocols
- Proposed schedule

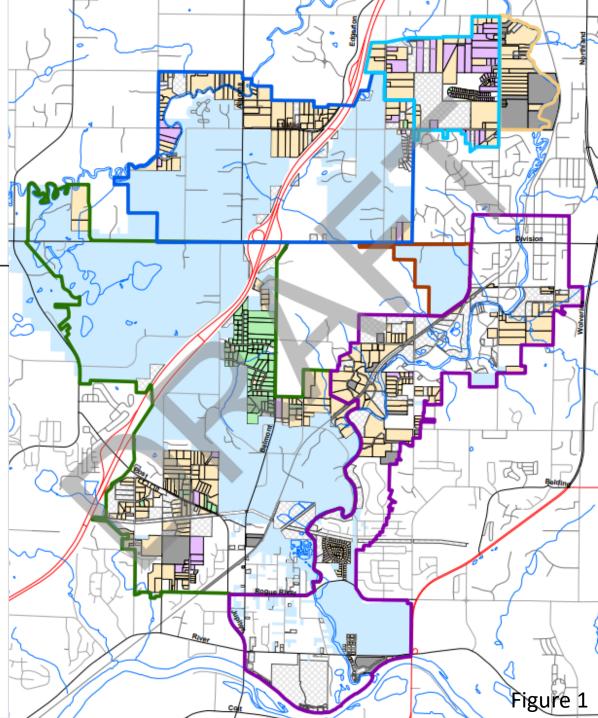




#### **STUDY OBJECTIVE:**

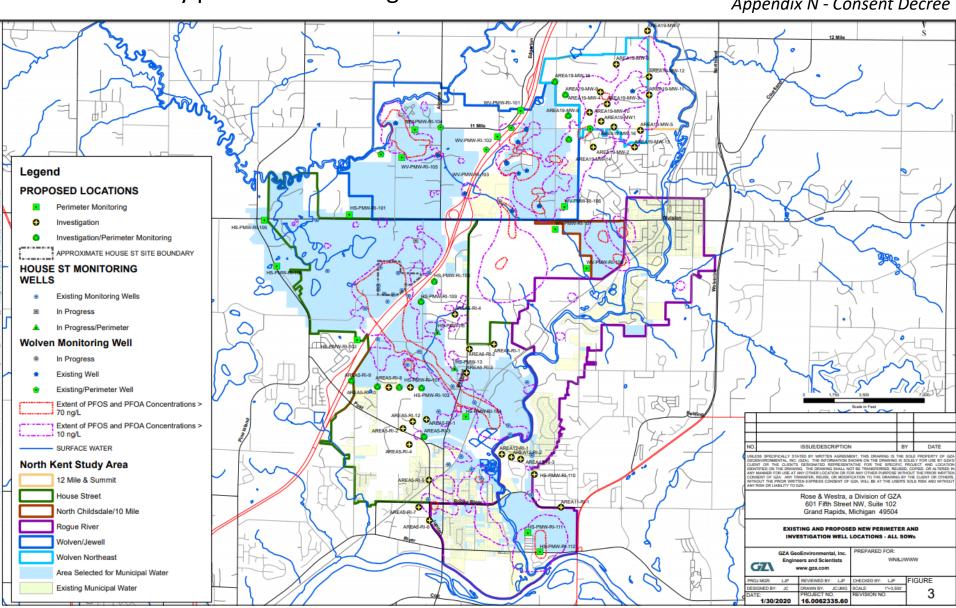
Provide testing data to supplement data collected from Groundwater Investigations in order to monitor for any potential PFAS migration





**STUDY OBJECTIVE:** Provide testing data to supplement data collected from Groundwater Investigations in order to monitor for any potential PFAS migration

Appendix N - Consent Decree



### Residential Well Resampling Response Activity Plan

- Introduction and Background (Sections 1.0 & 2.0)
- General Approach (Section 3.0)
- Proposed Statement of Work (Section 4.0)
- Sampling & Analytical Procedures (Section 5.0)
  - Sampling Locations
  - Sample Collection and Labeling
  - Sample Shipping
  - Analytical Method and Parameters
- Data Quality Assurance and Control (Section 6.0)
- Investigation Derived Waste (Section 7.0)
- Anticipated Schedule (Section 8.0)
- Figures (1, 2, A, B, C, D)
- Tables (1 4)





Photo Source: MPART Website



#### Residential Well Resampling ResAP – Statement of Work

#### Sampling will be completed over a 3-year period (Section 4) as described below:

#### **❖** Years 1, 2 and 3: 43 parcels

■ These 43 parcels will be sampled each year since they have maximum PFOS + PFOA concentrations exceeding 10 parts-per-trillion (ppt) (but less than 70ppt PFOS & PFOA).

## The parcels included below, have historically been sampled one time, and have detections of PFOA & PFOS below 10 ppt:

#### **❖** Year 1: 181 parcels

These 181 parcels are located near a data point exceeding 10 ppt PFOS & PFOA.

#### ❖ Year 2: 148 parcels

■ In addition to these 148 parcels, any parcel sampled during year 1 that found concentrations exceeding 10ppt PFOS + PFOA (or any new applicable cleanup criteria) will also be resampled.

#### **❖** Year 3: Remaining 141 parcels

 In addition to these 141 parcels, any parcel sampled during year 1 or 2 that found concentrations exceeding 10 ppt PFOS + PFOA (or any new applicable cleanup criteria) will also be resampled.



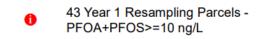
### **Section 4: Proposed Statement of Work**

The following table summarizes the approximate sampling dates, intervals, and parcels planned for sampling.

Sampling Dates	Number of NKSA Parcels*	Table Containing List of Parcels	Total Resampling Events Post CD
Annually as listed below	43	1	Up to 3
Between 2-19-2020 and 2-19-2021	181 (plus the 43 parcels above)	2	Up to 3 (for 1st year set)
Between 2-19-2021 and 2-19-2022	148 (plus parcels with > 10 ppt)	3	Up to 2 (for 2 <sup>nd</sup> year set)
Between 2-19-2022 and 2-19-2023	141 (plus parcels with > 10 ppt that have not yet been sampled 3 times)	4	1 (for 3 <sup>rd</sup> year set)

<sup>\*</sup> These numbers vary from those presented in Appendix M of the CD. The changes are due to several items, including some parcels being connected to municipal water after Appendix M was completed. Specifically, in sampling year 1, the number of parcels is likely artificially large as there is several parcels that appear to be either vacant or unoccupied listed. Each address will be confirmed for status during the corresponding sampling year.

## Figure 2: Resampling Parcels



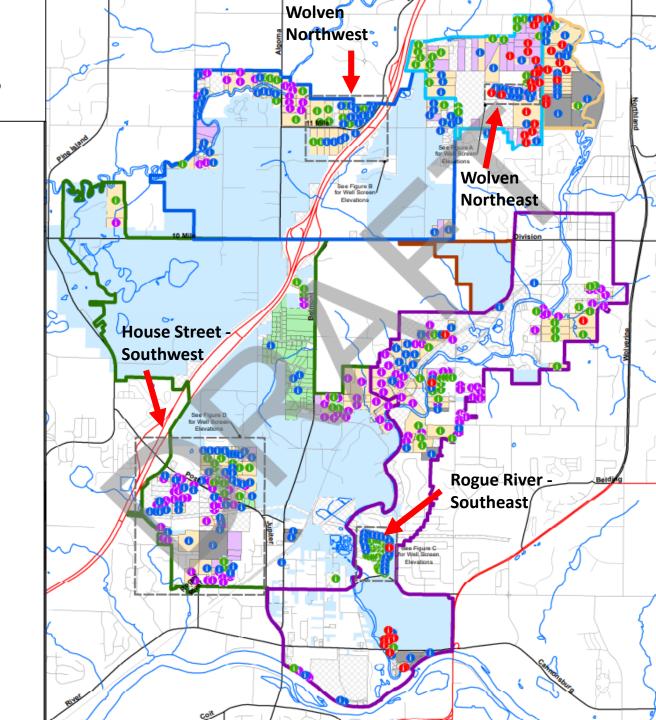
- 1 Year 1 Resampling Parcels
- Year 2 Resampling Parcels
- 1 Year 3 Resampling Parcels

#### NORTH KENT STUDY AREA

- 12 Mile & Summit
- House Street
- North Childsdale/10 Mile
- Rogue River
- Wolven/Jewell
- Wolven Northeast
- Study\_Areas\_Outline
- Study\_Areas\_Outline
  - SURFACE WATER
  - Area Selected for Municipal Water
- Parcel with POET

### FILTER AREA SAMPLING STATUS

- No POET, Sampled Once
- No POET, Sampled Twice or More
- Occupied, Not Sampled
- Vacant



## Figures A, B, C & D



Legend

Residential Well Screen Elevation (Ft)

## Report Review Next Steps

### Take Comments

EGLE will take written public comments:

EGLE-RRD-Housestreet@michigan. gov through July 18,

2020.

Prepare Response Document

EGLE will prepare a response document to summarize and address the public comments received.

## Respond to Wolverine

EGLE will complete its review of the Res. Well Resampling Plan and provide Wolverine a response regarding edits and comments.

This response document will be posted to www.Michigan.gov/belmont



#### **Wolverine Response Activity Plan Due Dates:**

Response Activity Plan	Due Date to EGLE	Public Meeting Date	<b>Comment Period</b>
Filter Operation and Maintenance (O&M)	4-6-2020	5-26-2020	5-14 to 6-13-2020
Groundwater Surface Water Interface (GSI)	4-20-2020	5-27-2020	5-14 to 6-13-2020
Residential Well Resampling	5-4-2020	6-23-2020	6-11 to 7-18-2020
Groundwater Investigation - Area 5	TBD 6-18-2020 (1 meeting to discus	(1 meeting to discuss	At least 30 days
Groundwater Investigation - Area 6			
Groundwater Investigation - Area 11			
Groundwater Investigation - Area 12			
Groundwater Investigation - Area R-1 (19)			
Perimeter Wells	8-17-2020	TBD	At least 30 days

TBD: To be determined

Consent Decree and Response Activity Plans are posted online at:

www.Michigan.gov/belmont

## We want to hear from you!

You can continue to submit your written comments through July 18, 2020 to:

EGLE-RRD-Housestreet@michigan.gov

Or by mail to:

Karen Vorce EGLE-RRD 350 Ottawa Avenue NW, Unit 10 Grand Rapids, MI 49503

**Questions?** 

**Karen's Contact Info:** 

Phone: 616-439-8008

Email: vorcek@Michigan.gov

When submitting comments, make sure to note which Response Activity Plan you are commenting on

