

A photograph of a white warning sign with a red header, attached to a black chain-link fence. The sign is partially obscured by the fence's diamond pattern. In the background, there are trees and a building.

WARNING

**ENVIRONMENTAL
CONTAMINATION INVESTIGATION
ONGOING AT THIS SITE
NO TRESPASSING**

Who's Paying the Price?

The Legacy of the Part 201 Program in Michigan

Graham Diedrich, Michigan State University

What is a contaminated site?

“Any area, place, or property where a hazardous substance in excess of the established state cleanup standard for residential property has been released, deposited, disposed of, or otherwise comes to be located.”

- MCL 324.20101

What is a contaminated site really?



Image: Countryside Magazine



What is a contaminated site really?



Image: Countryside Magazine



Image: CORDIS - EU

What is a contaminated site really?



Image



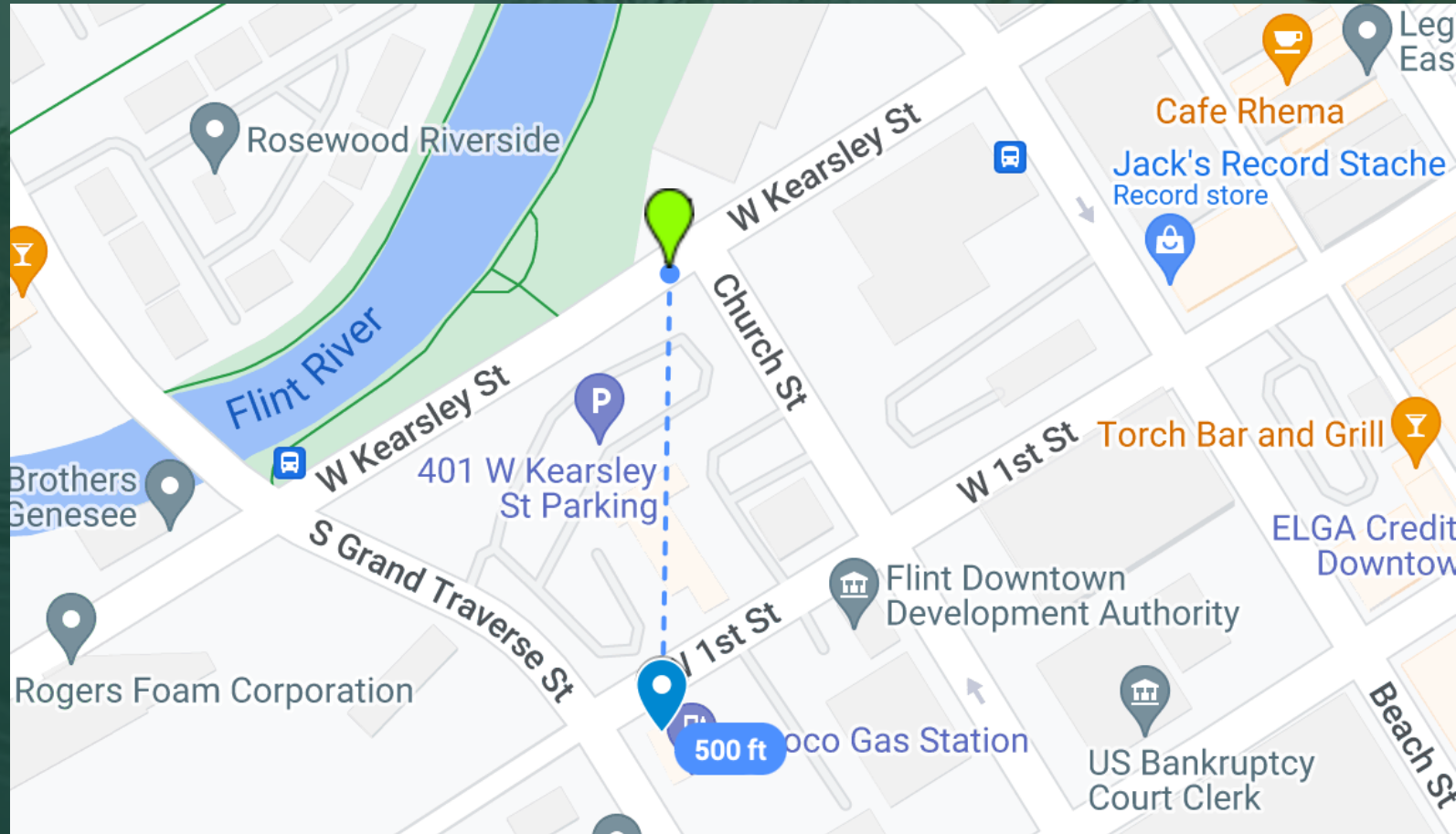
Image: Google Maps



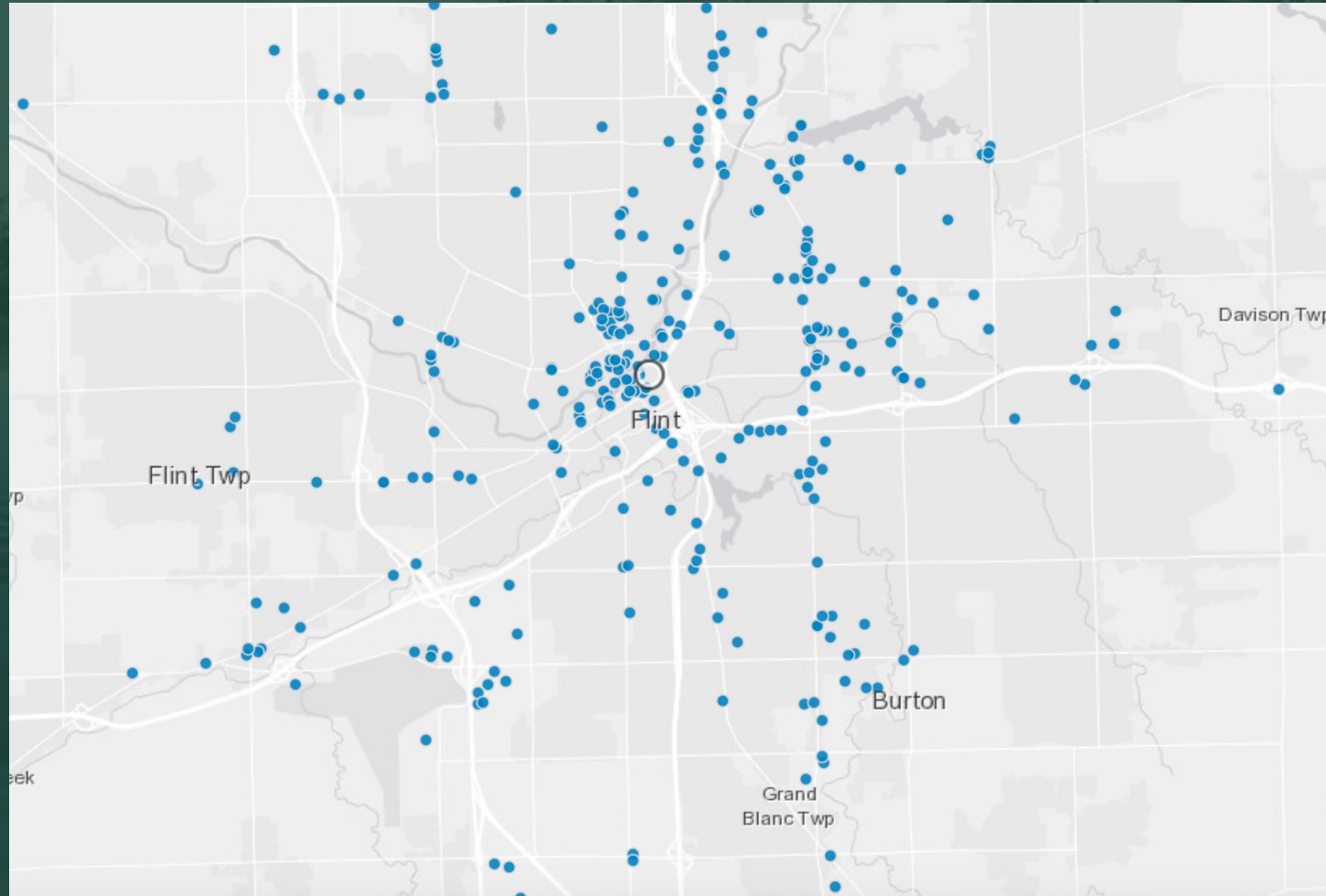
**Sites are more common than you
might expect:**



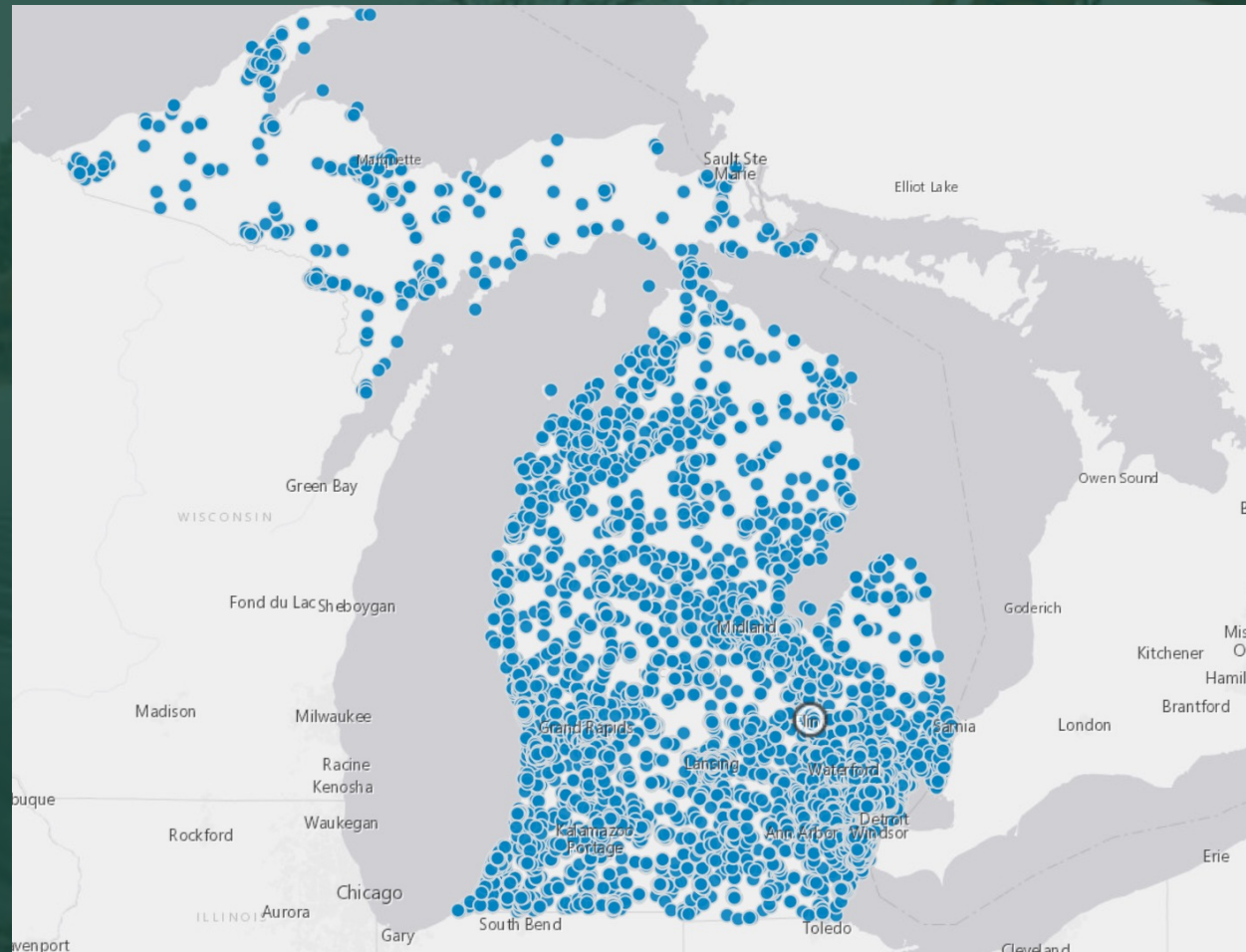
Sites are more common than you might expect:



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Contamination negatively impact health:



**Adverse
Pregnancy
Outcomes**

Contamination negatively impact health:



**Adverse
Pregnancy
Outcomes**



**Childhood
Cancer**

Contamination negatively impact health:



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Cancer**



**Respiratory
Illnesses**

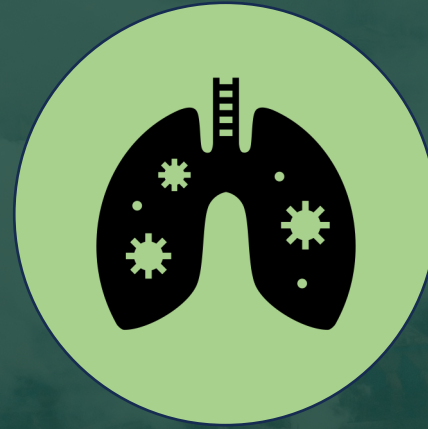
Contamination negatively impact health:



**Adverse
Pregnancy
Outcomes**



**Childhood
Cancer**



**Respiratory
Illnesses**



**Cardiovascular
Illnesses**

**Have we always had this
many sites?**

The background image shows an industrial or contaminated site. In the foreground, there are several large, dark, cylindrical tanks or drums, some partially obscured by tall grass. In the mid-ground, there are more industrial structures, including what looks like a distillation column or a large storage tank. In the background, there is a multi-story building with many windows, possibly an apartment complex or a factory building. The entire image has a dark green overlay.

5,070

contaminated sites in 1991

The background image shows a dark, teal-tinted scene of an industrial or contaminated site. In the upper left, there is a multi-story building with many windows. To its right, there are industrial structures, possibly storage tanks or processing units, with pipes and scaffolding. In the foreground, there is a body of water, possibly a pond or a reservoir, which is dark and reflects the sky. The overall atmosphere is somber and industrial.

17,413

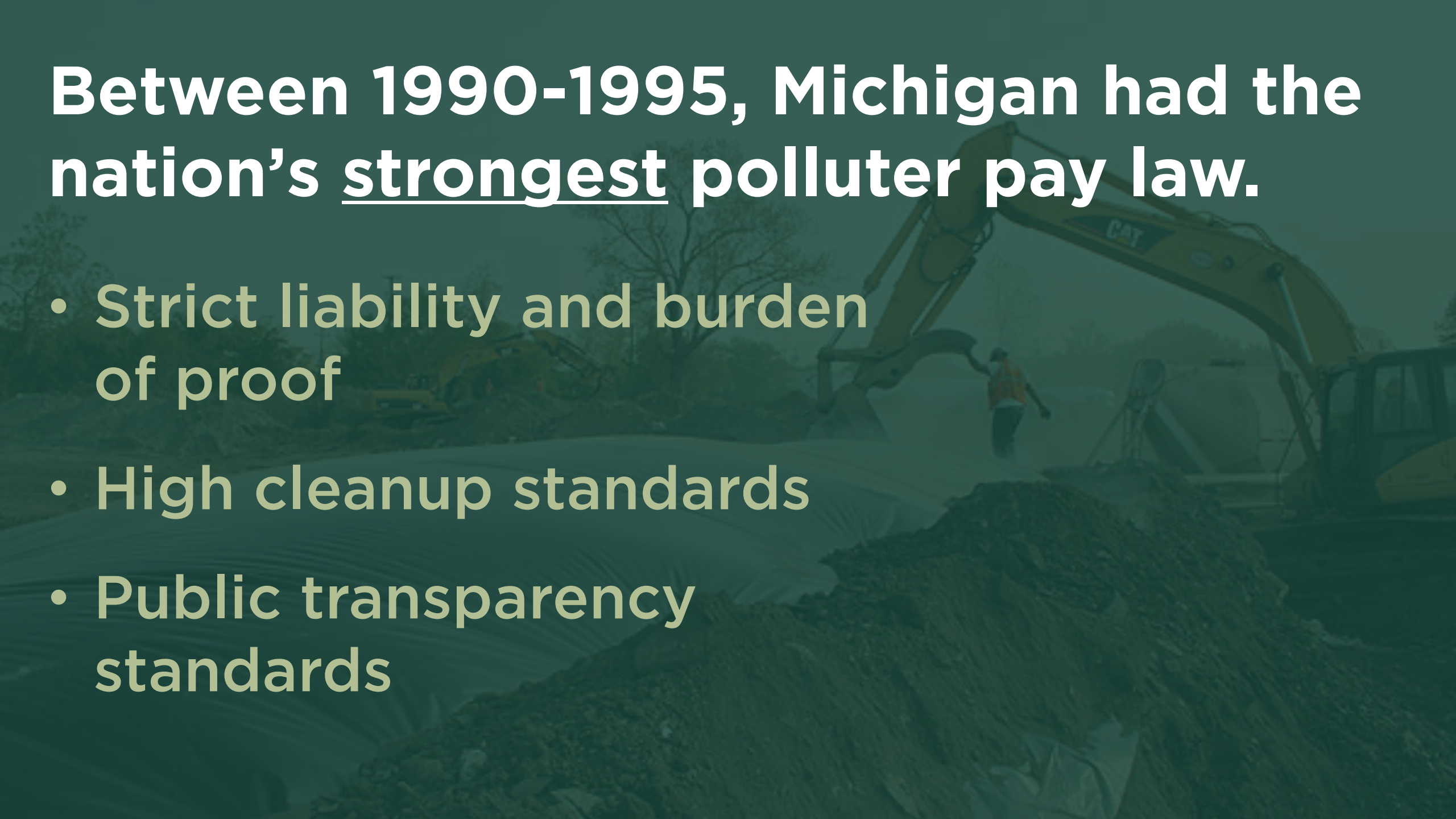
contaminated sites in 2023



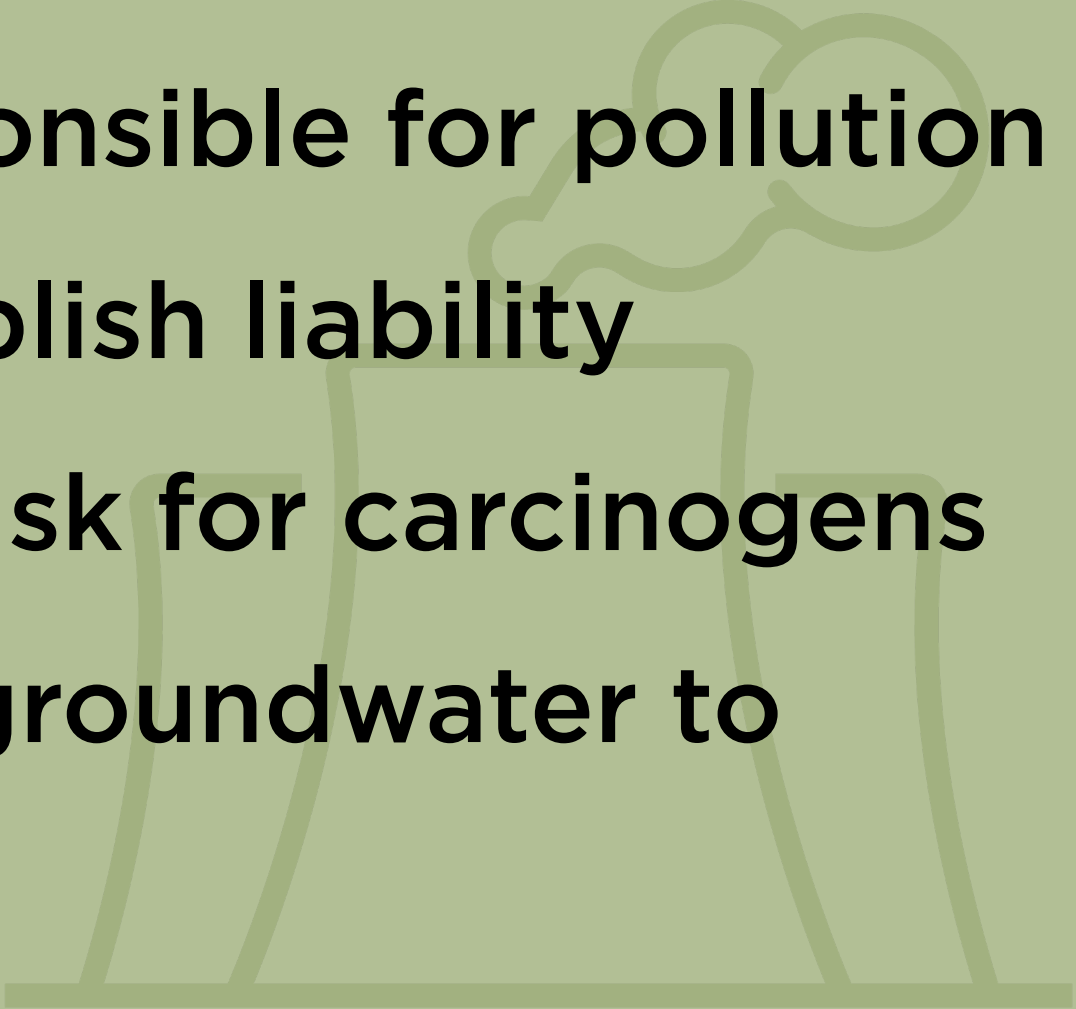
**Which policy choices explain
the increasing number of
sites?**

Between 1990-1995, Michigan had the nation's strongest polluter pay law.

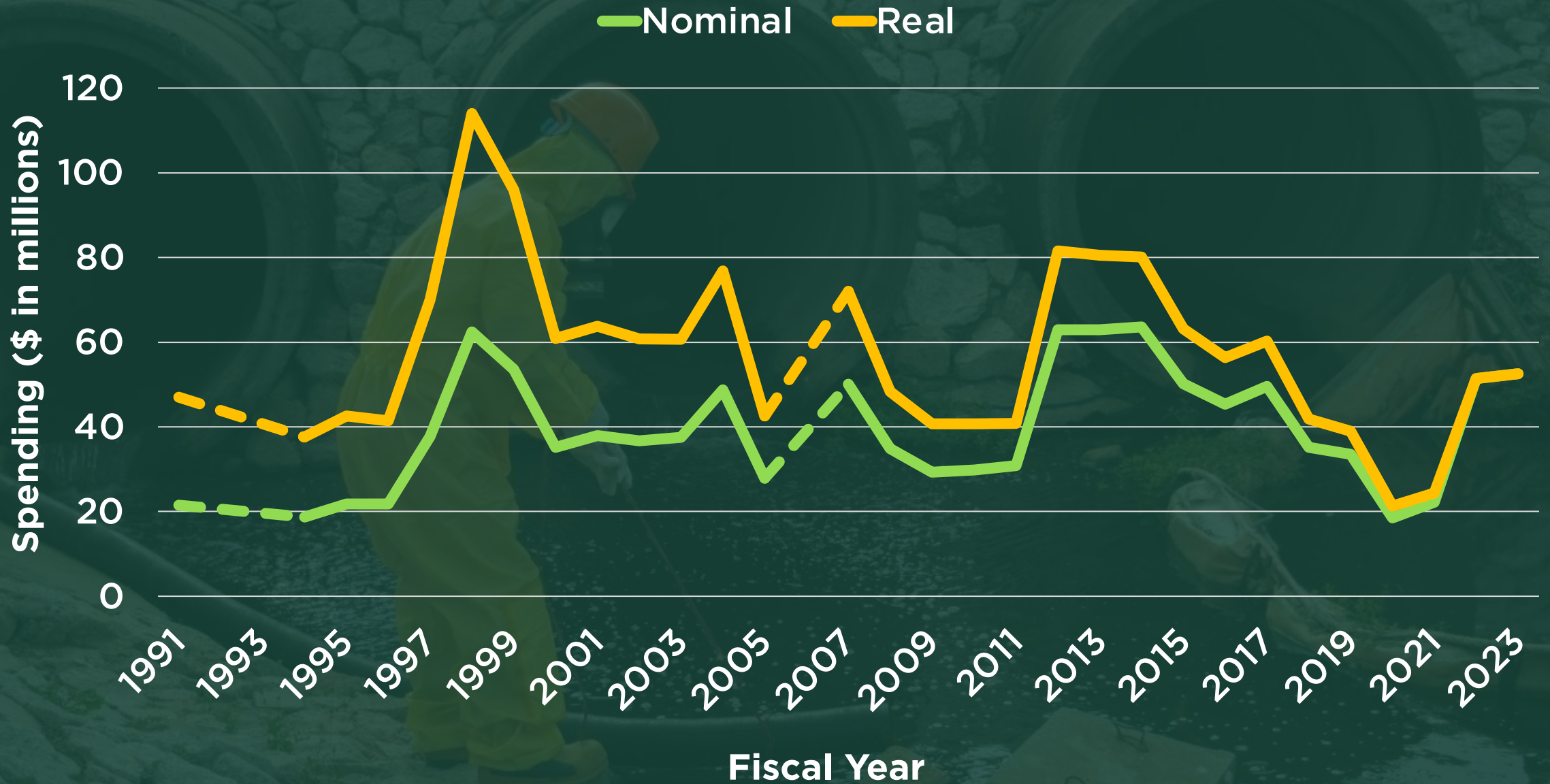
- Strict liability and burden of proof
- High cleanup standards
- Public transparency standards



In 1996, amendments weakened liability and cleanup requirements for polluters.

- **Only initial owners responsible for pollution**
 - **Burden on state to establish liability**
 - **Increase the allowable risk for carcinogens**
 - **Allowed contaminated groundwater to remain untreated**
- 
- A faint, light green illustration of a person with their hand on their chin, appearing to be in deep thought or listening intently. The person is wearing a suit and has a thought bubble above their head. The illustration is positioned on the right side of the slide, behind the main text.

Part 201 Appropriations, FY 1991-2023



Reporting requirements and modeling parameters were significantly altered.

Act 307

- DNR required to submit a list and rank all known sites (including those receiving state funding) by relative risk annually

Part 201



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Act 307

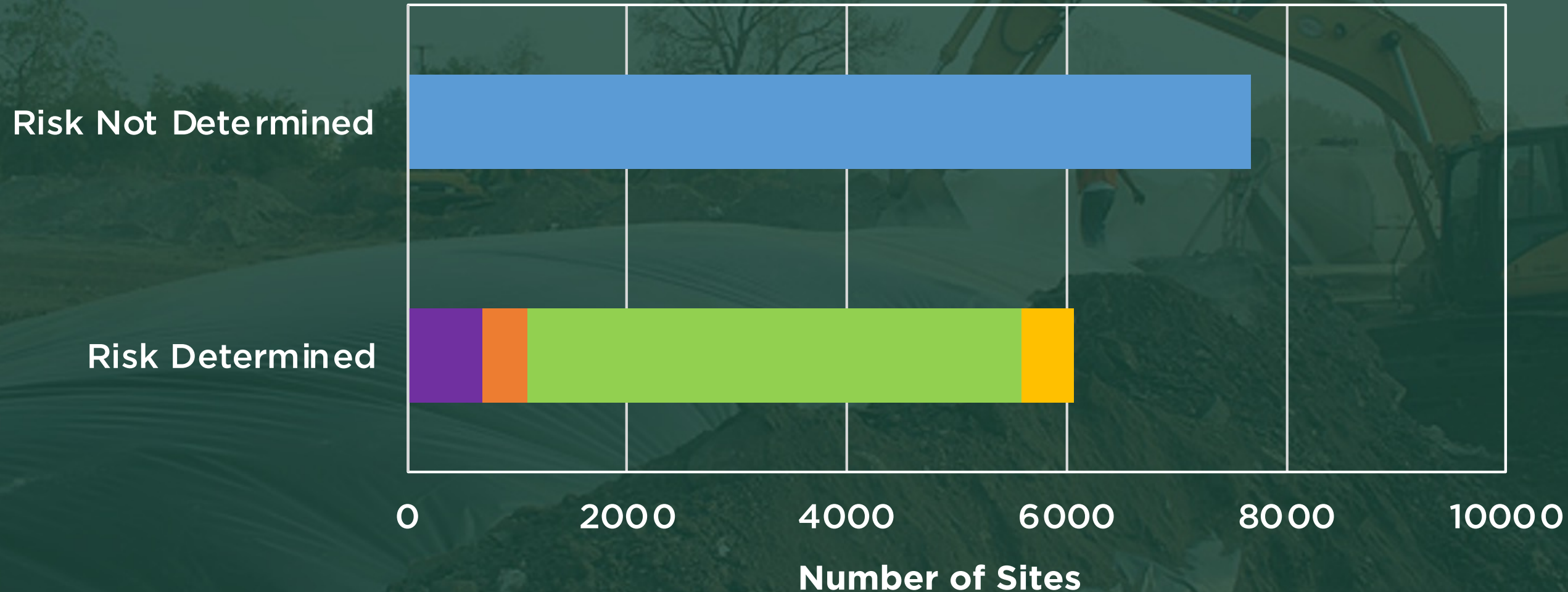
- DNR required to submit a list and rank all known sites (including those receiving state funding) by relative risk annually

Part 201

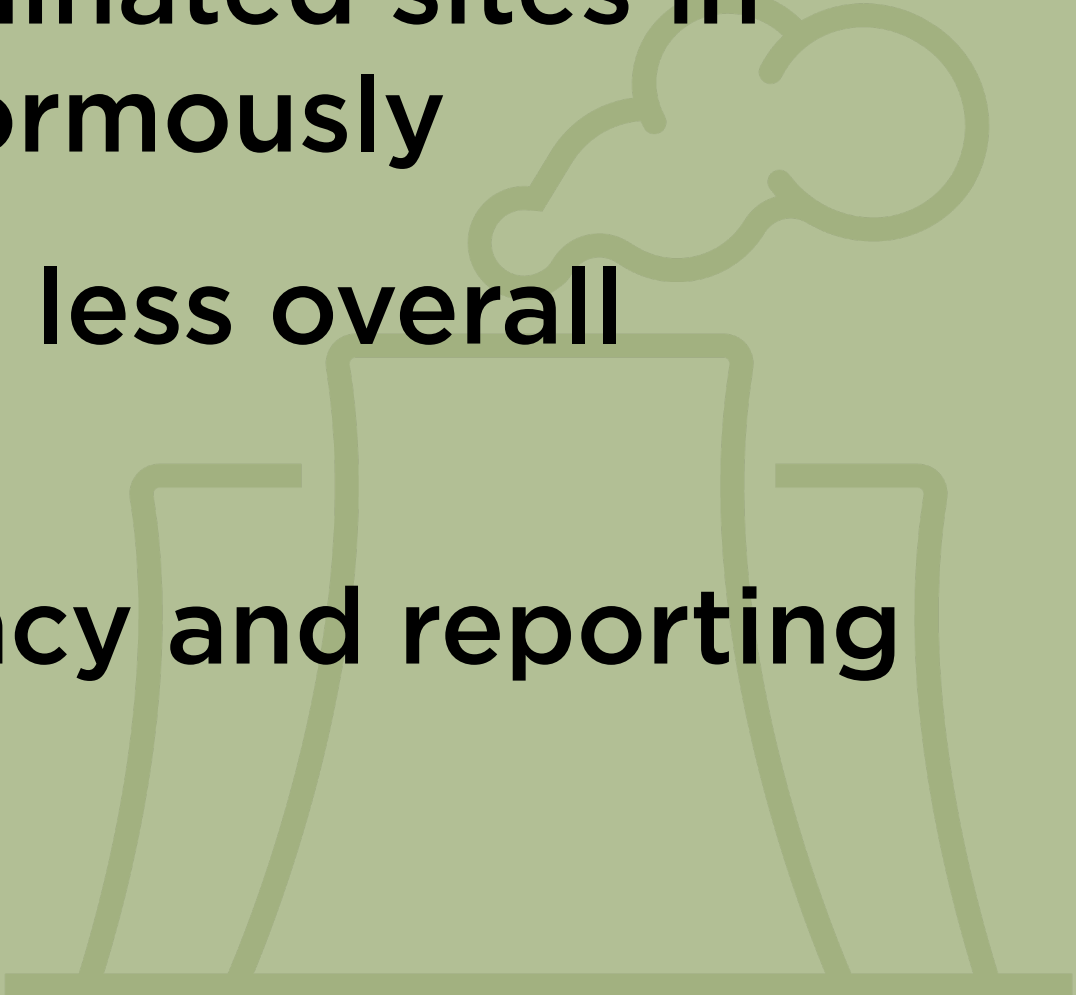
- MDEQ required to annually submit a list of sites where public funds are being received (sorted in alphabetical order)

Risk Classification of Part 201 Sites

- Risk controlled
- Risk present, short-term action required
- Risk present and immediate
- Risk present, long-term action required



3 key issues identified:

- 1. The number of contaminated sites in Michigan has risen enormously**
 - 2. Part 201 operates with less overall funding than Act 307**
 - 3. Removal of transparency and reporting requirements**
- 

Without solving these issues, we cannot adequately address contaminated sites:



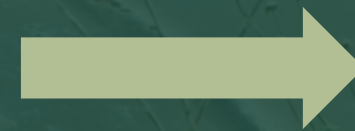
Decreasing funding



Lack of reporting and transparency



Sites are not remediated

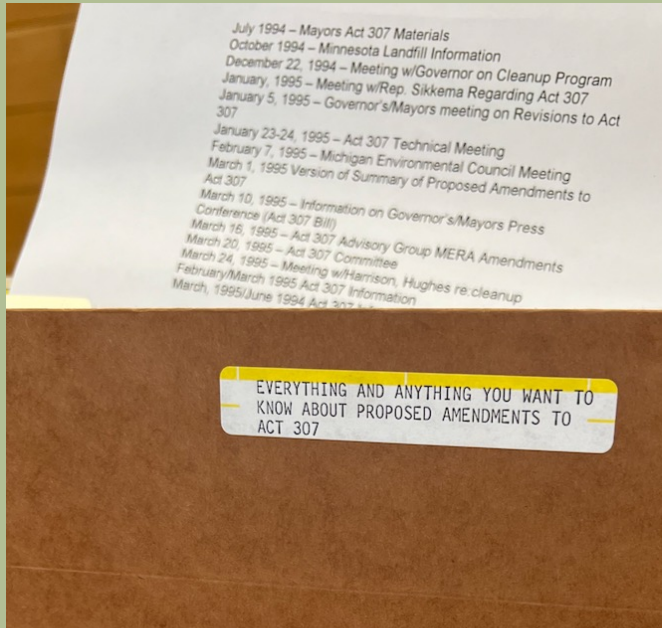


Number of sites continues to increase



Methodology

Evaluatory Framework



35 Public Acts



**Remediation
Components**

**Legal
Components**

**Administrative
Components**

**33 Programmatic
Components**



+1 Expansive
0 No change
-1 Restrictive

Scoring System

Programmatic Component Categories

Remediation Components

Legislative provisions relating to the cleanup of sites.



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Legal Components

Approaches to liability, property interests, and civil action.

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Administrative Components

Impacts to program operations (funding, modeling, oversight bodies).



Results

Between 1990-2018, most programmatic components were restricted:

76%

**Experienced a
contraction.**

1%

**Experienced no
change.**

33%

**Experienced an
expansion.**

Net scores broken down by component categories:

Remediation Components:

82%

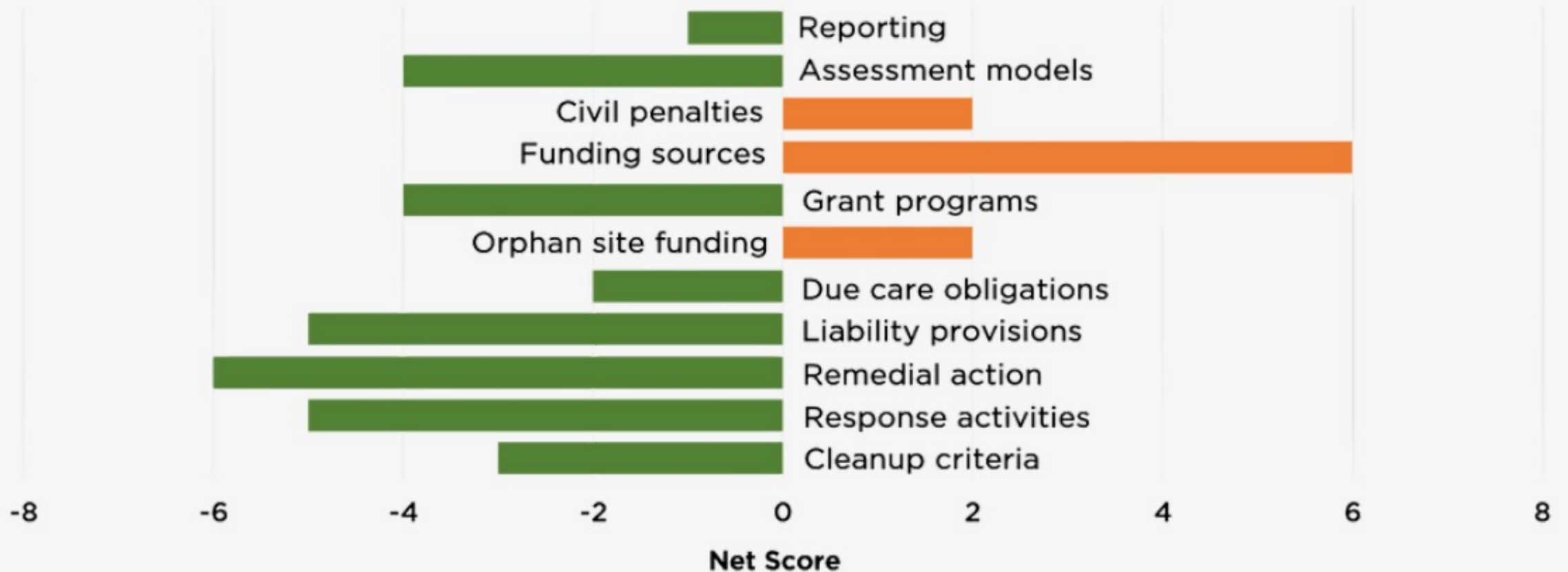
Legal Components:

64%

Administrative Components:

82%

Result summary, by key program components:



Takeaways

- Expanded components mostly related to funding arrangements
- Altering liability provisions, cleanup requirements, due care obligations, and reporting requirements → difficult to establish liability and exact payment
- Fundamental changes are needed to how we regulate and remediate sites

Policy Recommendations

- Strengthen monitoring and reporting requirements
- Expanding liability and reduce allowable exemptions
- Limiting the utilization of institutional controls over full remediation
- Alter cleanup criteria, shifting away from land-use categories
- Develop a new fund for Part 201



Thank you!

**Any questions or
comments?**

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References

Brender, J. D., J. A. Maantay, and J. Chakraborty. (2011). "Residential Proximity to Environmental Hazards and Adverse Health Outcomes." *American Journal of Public Health* 101, no. 1 (Suppl 1): S37-S52. doi: 10.2105/AJPH.2011.300183.

Michigan Department of Environment, Great Lakes, and Energy (EGLE). "Part 201 Environmental Contamination Sites." Retrieved from <https://gis-egle.hub.arcgis.com/datasets/egle::part-201-environmental-contamination-sites/explore>