



Local Air Quality Issues

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Goal

**Help you understand how the
DNRE regulates certain air
quality matters.**





Local Air Quality Issues

- **Outdoor Burning**
- **Asbestos**
- **Odors**
- **Excess Emissions and
Fallout**
- **Dust**

DNRE, Air Quality Division

- The Air Quality division is responsible for ensuring that Michigan's air meets national and state ambient air quality standards and that sources of air emissions big and small do not emit contaminants that pose a risk to human health or the environment.



DNRE, Air Quality Division

Regulatory Authority

Clean Air Act



**Part 55, of the Natural Resources
and Environmental Protection Act**



**Michigan Air Pollution Control
Rules**

DNRE, Air Quality Division

- Headquarters - Lansing
- Southeast MI District
 - Oakland
 - Macomb
 - St. Clair
- Detroit Field Office
 - Wayne



DNRE, Air Quality Division

- **District Office**
 - Conduct inspections
 - Review emission reports
 - Review compliance certifications
 - Respond to complaints



Open Burning



Who Regulates?



How is it Regulated?

- Air Quality Rules – R 336.1310

R 336.1310 Open burning.

Rule 310. (1) A person shall not cause or permit open burning of refuse, garbage, or any other waste materials, except for the burning of any of the following:

Rule 310. (1) A person shall not cause or permit open burning of refuse, garbage, or any other waste materials, except for the burning of any of the following:

(a) Waste disposal material from and at 1- or 2-family dwellings if the burning does not violate any other department rules.

(b) Open burning in an unincorporated area, a priority I area as listed in table 34, or a priority II area as listed in table 34, nor closer than 1400 feet to an incorporated city or village limit and if the burning does not violate any other department rules.

(d) Beekeeping equipment and products, including frames, hive bodies, hive covers, combs, wax, and honey, if burned for bee disease control.

(e) Logs, brush, charcoal, and similar materials that are used in preparing food or for recreation.

(2) The exceptions specified in subrule (1) of this rule do not authorize open burning if prohibited by local law or regulation.

How is it Regulated?

- Solid Waste Rules – R 299.4128

(3) Open burning of solid waste is prohibited, except as provided in subrules (4), (5), and (6) of this rule.

(4) If not prohibited by local ordinance, an individual is not prohibited by the act and these rules from burning solid waste from the individual's own household upon the individual's own land if both of the following conditions are met:

(b) The burning is conducted in an approved container constructed of metal or masonry that has a metal covering device that does not have openings larger than $\frac{3}{4}$ inch.

(5) A person may burn waste for energy recovery in a facility other than an incinerator under R 299.4110.

(6) A person may burn trees, logs, brush, and stumps under R 299.4110.

(7) The open burning of grass clippings or leaves, or both, is prohibited in any municipality that has a population of 7,500 or more persons under section 11522 of the act, unless specifically authorized by local ordinance. A municipality shall report an open burning ordinance to the department within 30 days of the enactment of the ordinance.

How is it Regulated?

- Local Ordinances
 - Can be more restrictive than state regulation

ALPINE TOWNSHIP
KENT COUNTY, MICHIGAN
ORDINANCE NO. 98-1
ALPINE TOWNSHIP BURNING ORDINANCE

An ordinance to protect the public health, safety and general welfare by regulating the use of fire, prohibiting fires within certain prescribed areas, prohibiting fires under certain prescribed circumstances, and providing for the abatement of any violation thereof.

THE TOWNSHIP OF ALPINE ORDINANCE NO. 98-1

Section 1. Purpose

Burning of leaves, grass, wood and/or trimmings and also creates hazardous byproducts that can settle on soil nearby surfaces, create odors and pollutants that can substantially increase the discomfort of people and other respiratory ailments. This Ordinance regulates burning throughout the Township, part of the Township.

This Ordinance recognizes the tradition of burning in agriculture and horticulture and is not intended to conflict with the requirements of this Ordinance.

This Ordinance shall not apply to the burning of

35.100

OPEN BURNING
GRAND HAVEN CHARTER TOWNSHIP
ord. no. 200 eff. June 1, 1994

An Ordinance to regulate open burning, to provide for the abatement of violations as nuisances, and to provide penalties for its violation.

THE CHARTER TOWNSHIP OF GRAND HAVEN, OTTAWA COUNTY, MICHIGAN, ORDAINS:

35.101

Sec. 1 DEFINITIONS

As used in this Ordinance the following terms are defined as follows:

Commercial Waste

- **Burning commercial waste
PROHIBITED**



Household Waste

- Persons may burn waste from a one or two family dwelling
- Must be in an approved container
- not prohibited locally



! **DNRE Proposing New Rules that will prohibit residential trash burning**

Grass Clippings & Leaves

- Prohibited in municipalities with population over 7,500
- Locals can allow via ordinance



Trees & Brush

- **Conducted further than 1,400 feet from boundary of city or village**
- **Not in a listed priority area**
- **Burn permit may be required**



Fire Suppression Training

- For fire department training only!
- Must notify DNRE Asbestos coordinator 10 days before event



Agricultural Burning

Farms are not allowed to burn:

- **Empty fertilizer/pesticide packaging**
- **Manure**
- **Livestock carcasses**
 - **Bodies of Dead Animals Act**
 - **Burial, incineration, composting, rendering**



What's Not Regulated

- **Patio burners/chimneaus**
- **Agricultural Land Clearing**
- **Outdoor Wood-fired boilers**
- **Corn Boilers**



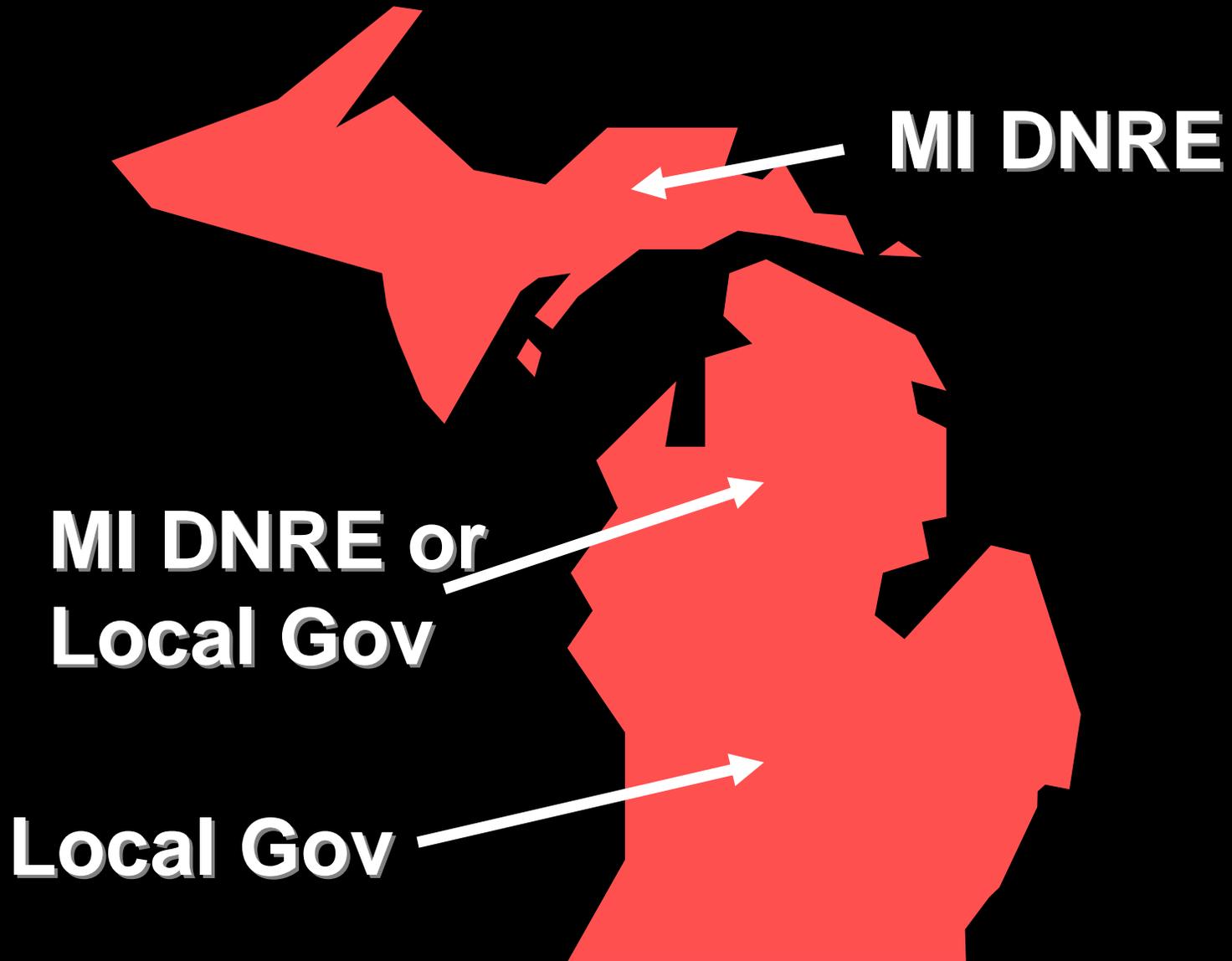
When is burn permit required?

- Burning outside of a burn barrel
- Ground not snow covered



www.michigan.gov/burnpermit

Where to Get Burn Permit



Outdoor Wood Furnaces

- DNRE does not regulate residential
- Commercial units need permit if larger than 6 MMBtu/hr.
- Recommend local ordinance





















For More Information

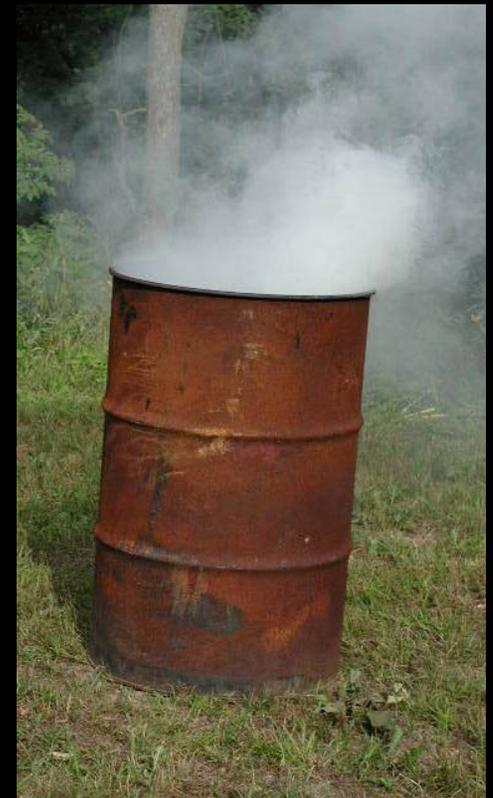
- www.michigan.gov/deqair (select “Wood Burning and Air Quality”)
- Contact OWB manufacturer

Why Should You Care?

- **MDEQ does not regulate residential Outdoor Burning and OWBs**
- **Improperly sited or operated OWBs generate numerous smoke and odor complaints**
- **Unhealthy for you community**

What Can You Do?

- **Address the issue**
- **Help us to educate citizens**
- **Promote alternatives**
- **Regulate and Enforce**
 - **Add ordinance language**
 - **Train police and fire officials**
 - **Authorize officials to issue fines and penalties**



Ordinances

- **OWBs**
 - Prohibit
 - Moratorium
 - Restrictions
- **Trash Burning**
 - Prohibit
 - Restrictions

MODEL ORDINANCE

**FOR
OUTDOOR AND OPEN BURNING**

**A Guide for Michigan Counties, Cities,
Villages, and Townships**



DEQ Michigan Department of Environmental Quality, Clean Air Assistance Program
Jennifer M. Granholm, Governor • Steven E. Chester, Director • www.michigan.gov/deq • (800) 662-9278

September 2006

Outreach

Publications



Fire
En

Michigan Department of Environment

All fire suppression training should follow the National Fire Protection Association (NFPA) Standard on Fire Protection for preparing a structure for a live fire. You can access this information about compliance with NFPA 1403, (517) 322-1924 or www.michigan.gov/marshall).

In addition to conforming to the requirements with applicable environmental regulations, the environment. This guidance document to conducting fire suppression training.

- Choose an acceptable location. Training should be conducted at a nursing home, hospital, or other public building.
- Contact residents that may be affected by the burning. The DEQ Air Quality Division (AQD) may receive complaints are received by the district office.
- Choose an acceptable accelerant. Straw, corn cobs, and other natural materials are acceptable. **Do not** use tires, gasoline, garbage, or other fuels are listed in NFPA 1403).
- Contact the DEQ's Asbestos Coordinator. Federal regulations require that asbestos be contacted 10 working days prior to fire suppression. Contact the "Notice of Intent to Renovate/Demolish (EQF) at www.michigan.gov/deq (click on "Air" then "Open Burning").
- Remove all asbestos. If a structure contains asbestos, it must be removed by a licensed asbestos abatement contractor before burning.

Open Burning Regulations in Michigan



What is Open Burning?

"Open burning" is the burning of unwanted materials, such as paper, trees, brush, leaves, grass and other debris, where smoke and other emissions are released directly into the air. During open burning, air pollutants do not pass through a chimney or stack, and/or combustion of solid waste is inadequately controlled.

Open burning pollutes the air and poses a forest fire hazard. The air pollution created by open burning can irritate eyes and lungs, obscure visibility, soil nearby surfaces, create annoying odors or pose other nuisance or health threats.

Because of the problems created by this activity, state and local laws prohibit open burning of many materials. Many people are either unaware of the regulations or unsure about which regulations apply to their burning activity.



Michigan Open Burning Guide Regulations & Alternatives

Michigan Clean Air Assistance Program

Michigan Department of Environmental Quality • Environmental Science & Services Division • (800) 662-9278

In This Guide

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What is Open Burning?

Open burning is the burning of unwanted materials such as paper, trees, brush, leaves, grass, and debris, where smoke and other emissions are released directly into the air without passing through a chimney or stack. It also includes using incineration devices that do not control emissions. Open burning pollutes the air and poses a fire hazard. The air pollution created by open burning can irritate eyes and lungs, obscure visibility, soil nearby surfaces, create annoying odors, and pose other nuisance or health threats to those with respiratory conditions.

Open burning rules are very restrictive. Only certain material may be burned provided that it meets the requirements. What may be burned usually depends on the type of material (such as brush) and who is doing the burning (such as a business or household). This document explains when open burning is allowed and when it is prohibited. A discussion of open burning regulations begins on page 2. Several open burning alternatives are also included in this document to make sure that your waste is disposed of properly.

Who Regulates Open Burning?

Outreach

- **Website**

www.michigan.gov/deqair

(select “Open Burning Information”)

Open Burning Information - Microsoft Internet Explorer

File Edit View Favorites Tools Help

Back Forward Stop Home Search Favorites Media Print W

Address http://www.michigan.gov/deq/0,1607,7-135-3310_4148-65250--,00.html Go



Department of Environmental Quality



Michigan.gov
An Official State of Michigan Web Site

[Michigan.gov Home](#) |
 [DEQ Home](#) |
 [Online Services](#) |
 [Permits](#) |
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GO!
more options

AIR

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- > [Permits](#)

inside DEQ

key topics

news & events

pollution prevention

[\[Printer Friendly\]](#) [\[Text Version\]](#)

Open Burning Information

Contact: Environmental Assistance Center (800) 662-9278

Open burning is the burning of unwanted materials such as paper, trees, brush, leaves, grass, and other debris, where smoke and other emissions are released directly into the air without passing through a chimney or stack. Open burning also includes incineration devices that do not control the combustion air to maintain an adequate temperature and do not provide sufficient residence time for complete combustion (R 336.1115(b) and R 299.4104). Open burning pollutes the air and poses a fire hazard. The air pollution created by open burning can irritate eyes and lungs, obscure visibility, soil nearby surfaces, create annoying odors, and is a danger to those with respiratory conditions.



Open burning regulations are enforced by each [District Office of the Air Quality Division, Michigan Department of Environmental Quality](#).

▶ More State Web Sites

Related Content

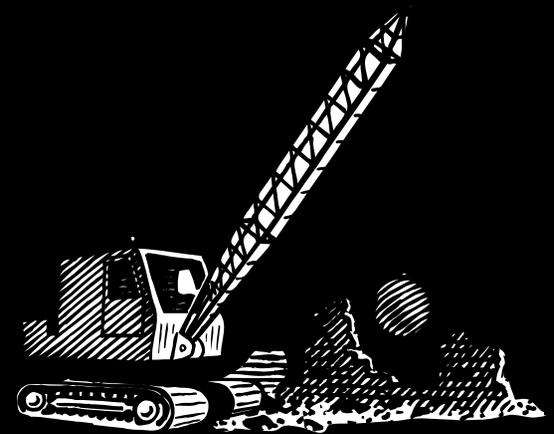
- [Air Pollution 101](#)
- [What is an Air Contaminant/Pollutant?](#)
- [Emissions and Opacity Monitoring](#)
- [Dust and Fallout](#)
- [Lithographic Printers](#)
- [Michigan Air Emissions Reporting System \(MAERS\)](#)



Asbestos

Asbestos

- **Who Regulates it?**
 - DNRE
 - MIOSHA
- **Asbestos National Emission Standard for Hazardous Air Pollutants (NESHAP)**
 - Commercial structures
 - Demolition/Renovation



Asbestos in Buildings

- Demolition: removing load-supporting member
- Renovation: removal of asbestos from components
- Work Practice Standards
- Notification of Intent to Renovate/Demolish Form





- Notification of Intent to Renovate/ Demolish

DNRE, Asbestos Program

- Receive and review demolition/asbestos removal notifications.
- Conducting inspections of asbestos removal projects and demolition projects to determine compliance with the NESHAP regulations.
- 800.662.9278
- www.michigan.gov/deqair (click on “compliance” then “asbestos NESHAP”)

MIOSHA, Asbestos Program

- Assure that the people working with asbestos are properly trained and the individuals performing asbestos removal comply with rules governing the work activity.
- 517.322.1320
- www.michigan.gov/miosha (click on “compliance” then “asbestos program)
- Michigan Licensed Asbestos Abatement Contractors - [View](#)

Fugitive Dust



Fugitive Dust

- **What is fugitive dust?**
 - **Uncontrolled Dust/Particulate**
- **What are the regulations?**





Sources of Fugitive Dust



Trackout and unpaved lots



Street Sweepers



Construction Sites



Storage Piles

Facilities That Generate Fugitive Dust

- Asphalt plants
- Crushers
- Construction sites
 - Soil erosion



Fugitive Dust Regulations

AQD

- **Part 55 , ACT 451**
 - 324.5524 Fugitive Dust Sources or Emissions



Fugitive Dust Regulations

AQD

- **Michigan Air Pollution Control Rules**
 - R 336.1301 Standards for Density of Emissions
 - R 336.1371 Fugitive Dust Control programs other than areas listed in Table 36
 - R 336.1372 Fugitive Dust Control Program
 - R 336.1901 Air Contaminant or Water Vapor, when prohibited

Michigan Administrative Rule 901

Rule 901. Notwithstanding the provisions of any other department rule, a person shall not cause or permit the emission of an air contaminant or water vapor in quantities that cause, alone or in reaction with other air contaminants, either of the following:

- (a) Injurious effects to human health or safety, animal life, plant life of significant economic value, or property.
- (b) Unreasonable interference with the comfortable enjoyment of life and property.

Fugitive Dust Complaints

Residential
Neighborhood



Controlling Fugitive Dust

- **Wet suppression**
- **Sweeping**
- **Calcium chloride**
- **Manage storage pile properly**
- **Drop distance – loading/unloading**



Resources

Michigan Department of Natural Resources and Environment
Office of Pollution Prevention and Compliance Assistance
Environmental Assistance Program

Guidelines for Selecting Dust Suppressants to Control Dust and Prevent Soil Erosion

OVERVIEW

Fugitive dust is generated when vegetation is removed and soil is exposed to wind. Light winds can pick up and transport silty soils, fine sands, and clays. Course sands can also become erodible when winds are strong. Soil particles and any attached chemicals such as fertilizer and pesticides may settle out in surface waters. Airborne particles can scour leaves and tender shoots of vegetation. Clouds of dust can create a traffic hazard and impact human health.

Dust suppressants are used to minimize fugitive dust emissions and control erosion and maintenance costs on unpaved roads and lots. The mechanisms by which suppressants abate dust vary with product type; some form crusts or protective surfaces on the soil, others act as binding agents causing particles to agglomerate together, and some attract moisture to the soil particles.

Potential environmental impacts of dust suppressants include surface and groundwater quality deterioration, soil contamination, toxicity to soil and water biota, toxicity to humans during and after application, air pollution from volatile dust suppressant components, accumulation in soils, changes in hydrologic characteristics of the soils, and impacts on native flora and fauna populations.

In spite of the growing use of dust suppressants, there are no agreed upon definitions or standards of performance, and very little regulation has been passed to address dust suppressant contents, application rates, or management practices. The Department of Natural Resources and Environment (DNRE) does not have an official list of approved dust suppressants, but you must comply with the requirements listed herein.

GROUND WATER REQUIREMENTS

The DNRE's Groundwater Program regulates discharges to groundwater under Part 31 (Water Resources Protection) of the Natural Resources and Environmental Protection Act, Public Act 451 of 1994, as amended (Act 451) and Part 22

Managing Fugitive Dust

A Guide for Compliance with the Air Regulatory Requirements for Particulate Matter Generation



Michigan Department of Environmental Quality
Environmental Science and Services Division

Jennifer M. Granholm, Governor
Steven E. Chester, Director
www.michigan.gov/deq
(800) 862-9278
2005

www.michigan.gov/deqair
("clean air assistance" then "dust and fallout")



Other Air Quality Complaints:

Odors, Opacity, and Fallout



**Visible
Emissions
from stacks**



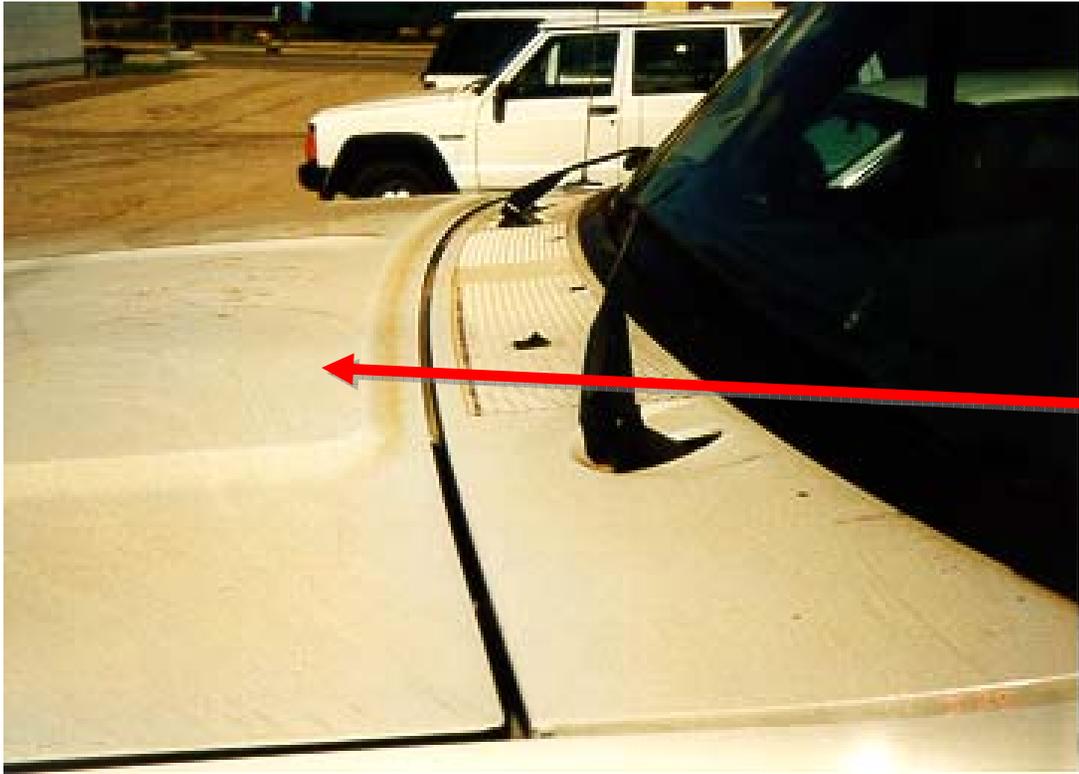
**Visible
Emissions
from stacks**

A photograph showing two tall, cylindrical industrial smokestacks against a clear blue sky. The stack on the left is taller and has a thick plume of dark, billowing smoke rising from its top. The stack on the right is shorter and also emits a smaller plume of dark smoke. The smoke appears dense and is drifting towards the right. The overall scene illustrates industrial air pollution.

**Visible
Emissions
from stacks**



**Opacity Violation or
Water Vapor?**



Fall out





**Is control equipment
operating properly?**

Odors



What is the Source?

- Odors from Industrial/Commercial Source
- Odors from WWTP or sewers - WB
- Odors from landfills - WHMD or AQD
- Odors compost - WHMD or MDA
- Agricultural Odors - MDA



Complaints

- **AQD Receives Complaint**
- **Evaluate Situation**
- **Determine appropriate response**



Complaints

R 336.1901 Air contaminant or water vapor, when prohibited.

Rule 901. Notwithstanding the provisions of any other department rule, a person shall not cause or permit the emission of an air contaminant or water vapor in quantities that cause, alone or in reaction with other air contaminants, either of the following:

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(b) Unreasonable interference with the comfortable enjoyment of life and property.



Local issues not regulated by AQD

- **Noise**
- **Burning at residence
indoor/outdoor**
- **Zoning issues**
- **Indoor air quality**
- **Black mold**
- **Landfills/compost**
- **Agricultural odors**



Contacts

- **Wayne County**
 - Detroit Field Office **313-456-4712**
- **Southeast MI**
 - Warren District Office **586-753-3732**

800.662.9278