

How is drilling in the Marcellus and Utica Shales regulated in Ohio?

Ohio EPA's water quality certification requirements **help reduce impacts to wetlands, streams, rivers or other waters of the state** from the construction of a drill site. For units or activities at the site that emit air pollutants, Ohio EPA may require a permit-to-install and operate (PTIO). A general permit is available for emissions associated with the production phase of the oil or gas well. Where drill cuttings come into contact with sources of contamination (e.g. synthetic drilling muds, oils and chemical additives) and cuttings are to be shipped off-site for disposal, Ohio EPA considers these materials contaminated soil, which must be managed as a solid waste.

These solid wastes must be sent to a permitted solid waste disposal facility. Ohio EPA will also consider proposals to beneficially reuse contaminated soils. If a company is interested in beneficially reusing contaminated soils, it must get authorization for this activity from Ohio EPA's Division of Materials and Waste Management (DMWM) prior to sending the cuttings off-site.

The **Ohio Department of Natural Resources, Division of Mineral Resources Management** (ODNR-DMRM) has primary regulatory authority over oil and gas drilling activity in Ohio, including rules for well construction, siting, design and operation.

ODNR-DMRM regulates brine disposal in Ohio, including permitting and oversight of Class II underground injection wells used for disposal of waste fluids from oil and gas drilling/production operations. ODNR also registers transporters hauling these fluids in Ohio.

<http://www.epa.state.oh.us/marcellusanduticashale.aspx>

More info at: <http://www.shaleinfo.ohio.gov/>

Summary of ODNR & Ohio EPA Regulatory Authority Over Oil/Gas Drilling & Production Activities

Who Regulates	Ohio Department of Natural Resources	Ohio Environmental Protection Agency
Drilling in shale deposits	<ul style="list-style-type: none"> Issues permits for drilling oil/gas wells in Ohio. Sets requirements for proper location, design and construction requirements for wells. Inspects and oversees drilling activity. Requires controls and procedures to prevent discharges and releases. Requires that wells no longer used for production are properly plugged. Requires registration for facility owners with the capacity to withdraw water at a quantity greater than 100,000 gallons per day. 	<ul style="list-style-type: none"> Requires drillers obtain authorization for construction activity where there is an impact to a wetland, stream, river or other water of the state. Requires drillers obtain an air permit-to-install and operate (PTIO) for units or activities that have emissions of air pollutants.
Wastewater and drill cutting management at drill sites	<ul style="list-style-type: none"> Sets design requirements for on-site pits/lagoons used to store drill cuttings and brine/flowback water. Requires proper closure of on-site pits/lagoons after drilling is completed. Sets standards for managing drill cuttings and sediments left on-site. 	<ul style="list-style-type: none"> Requires proper management of solid wastes shipped off-site for disposal.
Brine/flowback water disposal	<ul style="list-style-type: none"> Regulates the disposal of brine and oversees operation of Class II wells used to inject oil/gas-related waste fluids. Reviews specifications and issues permits for Class II wells. Sets design/construction requirements for Class II underground injection wells. Responds to questions/concerns from citizens regarding safety of drinking water from private wells from oil/natural gas drilling. 	
Brine/flowback water hauling	<ul style="list-style-type: none"> Registers transporters hauling brine and oil/gas drilling-related wastewater in Ohio. 	
Pumping water to the drill site from a public water supply system		Requires proper containment devices at the point of connection to protect the public water system.

<http://www.shaleinfo.ohio.gov/Basics/SummaryofRegulatoryAuthority.aspx>

7 primary federal laws that form the basis of environmental regulation:

- Solid Waste Disposal Act (1965)
- Clean Air Act (1970)
- Clean Water Act (1972)
- Safe Drinking Water Act (1974)
- Resource Conservation and Recovery Act (RCRA) (1976)
- Toxic Substances Control Act (ToSCA)(1976) (lead, PCBs, asbestos, etc)
- Comprehensive Environmental Response Compensation and Liability Act (CERCLA, aka Superfund) (1980)

US Environmental Protection Agency:

USEPA implements these laws via their regulations under Title 40 of the Code of Federal Regulations (CFR).

USEPA authorizes states to implement the laws/regulations.

- States implement them by creating their own environmental agencies and adopting the 40CFR rules under state administrative codes.
- Federal law requires that state environmental regulations be no less stringent than the federal regulations.
- Some states have regulations that are more stringent.
- In Ohio and several other states, state law requires that state environmental regulations be no more stringent than the federal ones.
- USEPA periodically reviews state programs to ensure adequate enforcement of environmental regulations. USEPA may withdraw state authorization if they deem the state is doing an inadequate job.

Ohio EPA

Four Divisions:

- Division of Air Pollution Control: regulates air emissions from industrial sources through the issuance of permits, open burning. DAPC authorizes some local governments to enforce air pollution rules and issue permits.
- Division of Surface Water: industrial discharges to "waters of the state" and discharges from public and private wastewater treatment plants, and storm water runoff from industrial and certain other sources (construction, government facilities like maintenance yards). DSW authorizes municipalities to regulate industrial discharges and issue permits into municipal sewer systems.
- Division of Drinking and Groundwater: public drinking water systems (drinking water treatment plants, wells that have public use like rural restaurants, nursing homes, trailer parks, etc)

- Division of Materials and Waste Management: Solid waste landfills, Construction and Demolition Debris Landfills, and hazardous waste from industrial and commercial sources. Solid Waste section authorizes counties to implement certain parts of the solid waste program.
- Division of Environmental Response and Revitalization: Emergency response to spills, clean-up of contaminated former industrial sites.

What Ohio EPA does NOT regulate:

- Private water wells
- Septic systems
- Household hazardous waste
- Pesticides, herbicides, rodenticides (Ohio Department of Agriculture)
- Substances under ToSCA (left to USEPA)
- Underground Storage Tanks (Bureau of Underground Storage Tank Regulations)
- Mining (Ohio Dept. of Natural Resources-ODNR)
- Wildlife (ODNR)
- Oil and gas drilling (ODNR)

Ohio EPA's jurisdiction with respect to oil & gas drilling is very limited:

- Air permits for certain types of equipment and activities that emit pollutants.
- General air emission permits for the production phase of oil and gas development.
- Fugitive dust from access roads
- Air emissions from open pit storage of drilling liquids
- Protection of waters of the state from drill site construction.
- Off-site disposal of drill cuttings.