

NR 151 Rule Revision

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Authorities and Processes

- Review Scope Statement
- Identify Statutory Authority
- Identify Rule Authority
- Provide Examples of Existing Standards



Scope Statement



Photo by Kevin Erb



Scope Statement

- To establish agricultural nonpoint source performance standards targeted to abate nonpoint source pollution in areas of the state with shallow soils overlaying fractured bedrock (sensitive areas)



Scope Statement

Revisions may include:

- Definition of Sensitive Area
- Performance standards that apply in those areas such as:
 - Spreading rates
 - Pathogen reduction
 - Application timing
 - Setbacks from wells and conduits to groundwater
 - Soil depth verification



Scope Statement

- NR 151 and NR 243:
 - NR 151 performance standards will apply to all agricultural facilities and practices where sensitive area exists
 - if cost sharing is provided to existing facilities
 - Incorporation by reference into NR 243 of the NR 151 performance standards will apply to all permitted CAFOs (where sensitive area exists)

State Statutes



Photo by Joe Baeten



State Statutes – s.281.16

(3) NONPOINT SOURCES THAT ARE AGRICULTURAL.

a) The **department of natural resources**, in consultation with the department of agriculture, trade and consumer protection, **shall promulgate rules prescribing performance standards and prohibitions** for agricultural facilities and agricultural practices that are nonpoint sources. The performance standards and prohibitions **shall be designed to achieve water quality standards** by limiting nonpoint source water pollution. At a minimum, the prohibitions shall include all of the following:



State Statutes – s.281.16

1. No overflow of manure storage structures.
2. No unconfined manure piles in a *water quality management area*.
3. No direct runoff from a feedlot or stored manure into the waters of the state.
4. No unlimited access by livestock to waters of the state where animals prevent the maintenance of adequate sod cover.



State Statutes – s.281.16(1)(g)

(1)(g) "Water quality management area" means any of the following:

- 1. The area within 1,000 feet from the ordinary high-water mark of navigable waters that consist of a lake, pond or flowage, except that, for a navigable water that is a glacial pothole lake, "water quality management area" means the area within 1,000 feet from the high-water mark of the lake.
- 2. The area within 300 feet from the ordinary high-water mark of navigable waters that consist of a river or stream.
- 3. A **site that is susceptible to groundwater contamination** or that has the potential to be a direct conduit for contamination to reach groundwater.



State Statutes – s. 160.19(4)

- (a) If a rule is designed to maintain compliance with a preventive action limit and if a preventive action limit is attained or exceeded at a point of standards application, **the regulatory agency shall review its rules** and, if necessary, **revise the rules** to maintain or achieve the objectives.
- The preventive action limit is zero colony forming units/100 ml – no detect of pathogen indicators



State Statutes – s. 160.19(4)

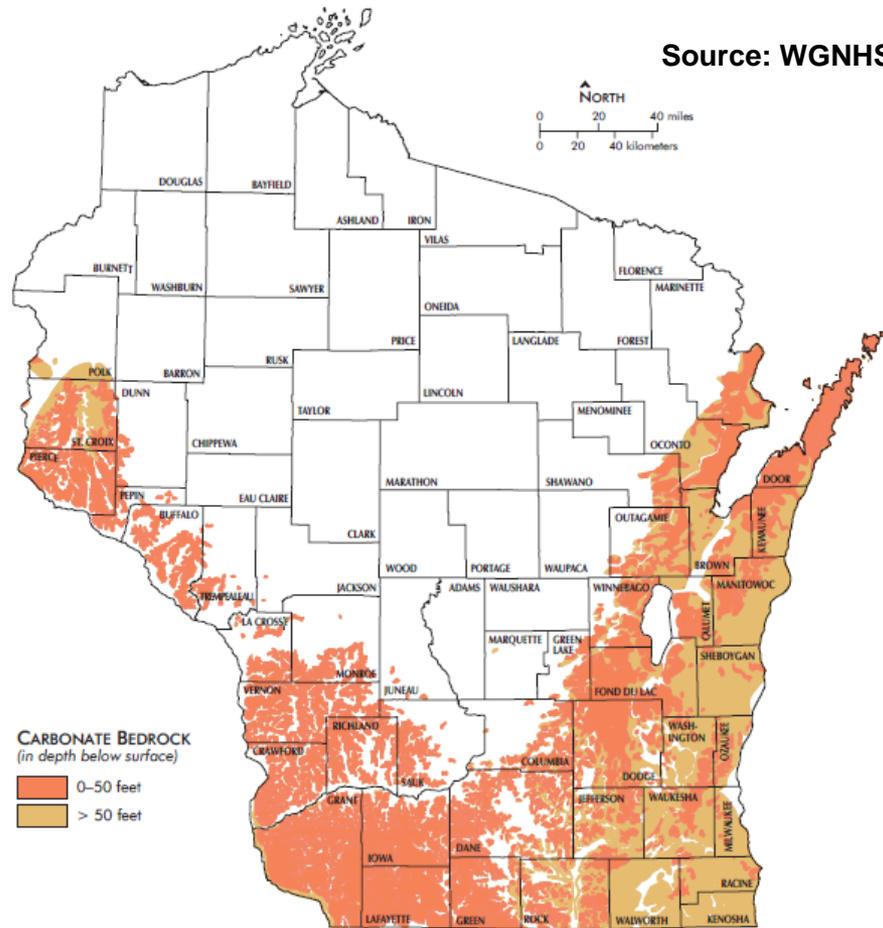
- (b) If an enforcement standard is attained or exceeded at a point of standards application, the **regulatory agency shall review its rules** and, if necessary, **revise the rules to ensure that the enforcement standard is not attained or exceeded** at a point of standards application at other locations in the future.
- The enforcement standard is zero colony forming units/100 ml – no detect of pathogen indicators



State Statutes - s.281.16(3)

(b) The **department of agriculture, trade and consumer protection**, in consultation with the department of natural resources, **shall promulgate rules prescribing conservation practices to implement the performance standards and prohibitions** under par. [\(a\)](#) and specifying a process for the development and dissemination of technical standards to implement the performance standards and prohibitions under par. [\(a\)](#).

Administrative Rules





NR 151.004

- **NR 151.004 State targeted performance standards.** Implementation of the statewide performance standards and prohibitions in this chapter may not be sufficient to achieve water quality standards under chs. [NR 102](#) to [105](#) or groundwater standards under ch. [NR 140](#). In those cases, **using modeling or monitoring, the department shall determine** if a specific waterbody or area **will not attain** water quality standards or **groundwater standards after substantial implementation of the performance standards and prohibitions in this chapter.**



NR 151.004 Continues

- **If the department finds** that water quality standards or groundwater standards will not be attained using statewide performance standards and prohibitions but **the implementation of targeted performance standards would attain** water quality standards or **groundwater standards**, the department **shall promulgate** the targeted performance standards **by rule**.



NR 151.004 Continues

- **Note:** Pursuant to s. [281.16 \(2\) \(a\)](#) and [\(3\) \(a\)](#), Stats., the performance standards shall be designed to meet state water quality standards.
- **Note:** Pursuant to s. [281.16 \(3\)](#), Stats., the department of agriculture, trade and consumer protection shall develop or specify the best management practices, conservation practices or technical standards used to demonstrate compliance with a performance standard developed under s. [NR 151.004](#).



Sites Susceptible to GW Contamination

151.015 (18) "Site that is susceptible to groundwater contamination" under s. 281.16 (1) (g), Stats., means any one of the following:

- (a) An area within 250 feet of a private well.
- (b) An area within 1000 feet of a municipal well.
- (c) An area within 300 feet upslope or 100 feet downslope of a direct conduit to groundwater.
- (d) A channel that flows to a direct conduit to groundwater.
- (e) An area where the soil depth to groundwater or bedrock is less than 2 feet.



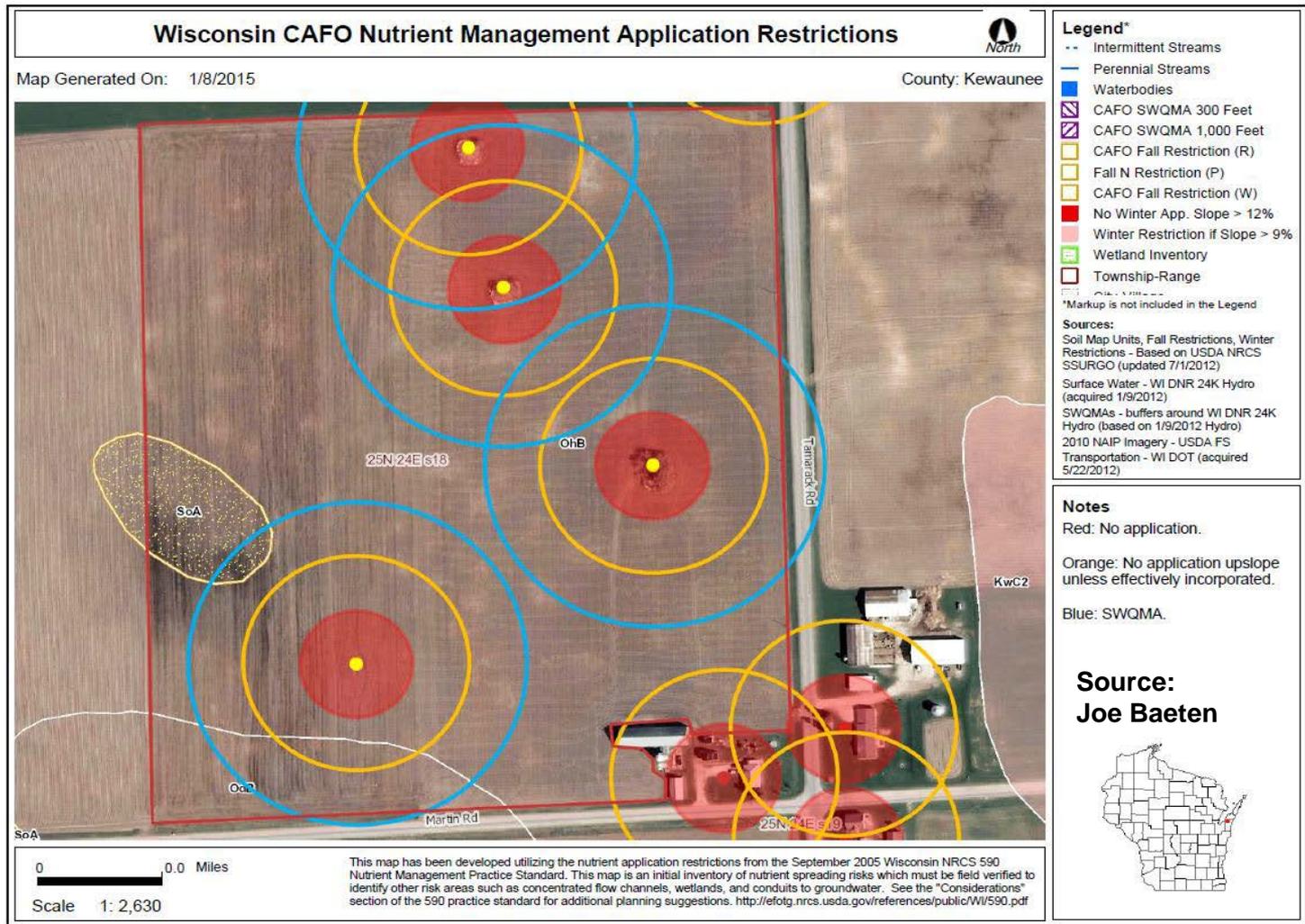
Sites Susceptible to GW Contamination

(f) An area where the soil does not exhibit one of the following soil characteristics:

1. At least a 2-foot soil layer with 40% fines or greater above groundwater and bedrock.
2. At least a 3-foot soil layer with 20% fines or greater above groundwater and bedrock.
3. At least a 5-foot soil layer with 10% fines, or greater above groundwater and bedrock.

Note: See s. NR 151.002 (32) for definition of percent fines.

Examples of Standards





NR 151 Performance Stds

- Tolerable soil loss ("T")
- Tillage Setback
- Phosphorus Index
- Manure Storage Facilities
- Process Wastewater Handling
- Clean Water Diversions
- Nutrient Management
- Manure Management Prohibitions



Nutrient Management

DNR Performance Std NR 151

- Manure, commercial fertilizer and other nutrients shall be applied according to a NMP.
- The NMP shall limit or reduce the discharge of nutrients to waters of the state for the purpose of complying with groundwater standards.

DATCP Technical Std ATCP 50

- ATCP50.04(3)
- All fields including pastures
- Qualified planner
- Soil tests
- DATCP certified lab
- Follow UW Recs A2809
- Meet NRCS Tech Std 590
- Include all source of nutrients



Manure Storage

DNR Performance Std NR 151

Manure storage facilities shall be designed, constructed and maintained to **minimize the risk of structural failure** of the facility and **minimize leakage** of the facility in order to **comply with groundwater standards**.

DATCP Technical Std ATCP 50

- ATCP50.62(5)
- Design, construction and maintenance
- System capacity is for winter storage
- Comply with well location requirement under NR 812
- NRCS Tech Stds 313, 634



Take Home Message

- Statute requires DNR to develop performance standards for agricultural practices
- Statute requires DNR to design rules that are protective of water quality (surface and groundwater)
- Code has an established process to develop a targeted performance standard by rule

Questions



**Manure Injection over
cover crop :
Photo by Joe Baeten**