



# Western Dairy News

For the West, About the West, From the West

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## Idaho's Agriculture Odor Management Act

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The 2001 Idaho Legislature passed The Agriculture Odor Management Act. This legislation adds to existing law a statement of legislative intent to manage odors, to provide for the design and construction of liquid waste systems, to provide for odor management plans, to provide for inspections and complaints, and to provide for violations and penalties.

The intent of the legislation is important to understand and is as follows.

- (1) The agriculture industry is a vital component of Idaho's economy and during the normal course of producing the food and fiber required by Idaho and our nation, odors are generated. It is the intent of the legislature to manage these odors when they are generated at a level in excess of those odors normally associated with accepted agricultural practices in Idaho.
- (2) Large swine and poultry operations are addressing odor management through the department of environmental quality's rules regulating large swine and poultry operations, and the beef cattle industry will address odor management as needed through implementation of the beef cattle environmental control act and rules promulgated there under.
- (3) The Idaho department of agriculture is hereby authorized as the lead agency to administer and implement the provisions of this chapter. In carrying out the provisions of this chapter, the department will make reasonable efforts to ensure that any requirements imposed upon agricultural operations are cost-effective and economically, environmentally and technologically feasible.

The Director of the Idaho Department of Agriculture is authorized by this legislation to regulate agricultural odors. The legislation outlines the intent and the Department is authorized to promulgate the necessary administrative rules to be in compliance with the code. An odor committee made up of representatives from environmental and agriculture agencies, citizen and ag commodity groups, legislators, and concerned citizens developed rules governing agriculture odor management. A key component in the intent of the legislation is to manage odors when they are generated at a level in excess of those odors normally associated with accepted agricultural practices in Idaho.

These rules are now out for public comment. After the comment period appropriate changes will be made and the rules will be adopted by the legislature next session. Several key issues of the intent of the law surfaced and were strongly debated:

**Definition of accepted agricultural practices:** A key component in the intent of the legislation is to manage odors when they are generated at a level in excess of those odors normally associated with accepted agricultural practices in Idaho. The following definition surfaced:

*(Continue on page 3, under Odor)*



## ***Colorado General Discharge Permit Requirements***

***Trevor Tuell  
Colorado Livestock Association***

Over the last several years Colorado Livestock Association (CLA) along with other interested parties have been working with the Colorado Department of Public Health and Environment (CDPHE) to develop a General Discharge Permit for animal feeding operations, excluding those under the requirements of Amendment 14, that regulate the larger hog operations.

The CDPHE is delegated by the Environmental Protection Agency (EPA) to issue National Pollutant Discharge Elimination System (NPDES) permits to animal feeding operations in Colorado. Membership of CLA has felt for years that producers need the protection of a discharge permit that allows operations to discharge during catastrophic event defined as a storm of large magnitude (e.g., tornado) or a series of storms occurring during a 10-day period that yields a total precipitation unlikely to occur but every 10 years.

The permit is now available at a cost of \$84 per year. Listed below are the requirements that must be met for the submittal of the complete permit application.:

1. A professional engineer (P.E.) must certify that the containment capacity is available for either a 25 yr/ 24 hr, or 10-yr/ 10-day storm, whichever is greater.
2. There must be a designated discharge point for the pond system. This will entail the design and installation of a pond spillway or overflowpipe with flow measurement accurate to within 10%.
3. A pond volume designation must be determined coupled with a pond staff gage and the required storm containment volume must be marked on the staff gage.
4. The pond liner must be certified by a professional engineer that it meets the specified  $1 \times 10^{-6}$  cm/sec seepage rate.

These requirements will allow a permit to be issued. Within 18 months of the permit's issuance date the permittee must develop a Permit Nutrient Management Plan (PNMP). The PNMP must meet the permit prescribed nutrient budget process. This process will require each land application site to have a phosphorus risk assessment conducted. As well, the agronomic rate of application must be developed based on whether the site is nitrogen based or phosphorus based. Once a permit is issued, there will be monitoring and reporting requirements which will be a continual part of the permit process and a data management program. CLA encourages producers to be environmentally responsible and apply for this permit. Contact Trevor Tuell with the Colorado Livestock Association for more information.

## **Standard Operating Procedure: Dairy Manure and Wastewater Storage**

***Jessica Davis,  
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Issues surrounding dairy cow manure are a huge aspect of dairy facilities management. Manure and runoff collection practices, wastewater and manure storage, and manure utilization must be carefully evaluated to avoid jeopardizing the health of the cows, the people and the environment. Following are a list of procedures in the form of a checklist for managing manure and wastewater storage on a dairy. As with all standard operating procedures this list must be tailored to the particular circumstances of an individual dairy and conform to the local regulations. More information on this topic is found at the following website: [cvmbs.colostate.edu/ilm/cdn](http://cvmbs.colostate.edu/ilm/cdn).

- 1) Locate manure stockpiles and wastewater storage ponds at least 150 ft downstream from any well and above the 100-year flood plain.
- 2) Protect wellheads with grassed buffer areas.
- 3) Locate wastewater storage pond in low permeability clayey soils with a deep watertable.
- 4) Use berms or trenches to keep runoff water away from stockpiles.
- 5) Use grassed filter strips below stockpiles to reduce runoff volume by settling solids and removing nutrients.
- 6) Soil sample downhill from stockpiles to monitor nitrate buildup.
- 7) Remove solids from wastewater with a settling pond or separating screen before it is transported to the storage pond to reduce odors and minimize lagoon loading.
- 8) Seal wastewater storage ponds to prevent seepage. The seepage requirement for wastewater storage is less than 1/32 inch per day.
- 9) Be sure that the wastewater storage pond has the capacity to handle the runoff from a 25-year, 24-hour storm, in addition to the wastewater from the milking parlor.
- 10) Mark the top of the normal storage level in the pond with adequate room above that for the 25-year, 24-  
*(Continue page 3, under Dairy Manure)*

“Management practices conducted in accordance with applicable laws, rules and best management practices, as referenced, or in the absence of referenced best management practices, management practices conducted in a manner that demonstrates reasonable efforts to minimize odors, shall be considered accepted agricultural practices for purposes of this rule”. Applicable rules referenced: “Rules Governing Dairy Waste; Pesticide and Chemigation Use and Application; Rules Concerning Disposal of Cull Onion and Potatoes; and Rules Governing Dead Animal Movement and Disposal.” The following are applicable best management practices, unless an equally protective practice is approved by the Director: “Idaho NRCS Nutrient Management Standard 590, June 1999; Best Management Practices listed in the Idaho Agricultural Pollution Abatement Plan, August 2001; Control of Manure Odors, ASAE Standard EP379.2 Sections 5 and 6 in their entirety, November 1997; and Composting Facility, NRCS Conservation Practice Standard 317, March 2001.”

**Definition of an excess odor:** “An agricultural operation using an accepted agricultural practice that generates odors in excess of levels normally associated with such practice, as determined by the Department on a site specific basis, shall develop and submit an odor management plan to the Director”. The judgment of qualified inspectors will be used.

### **Associated Issues with the Regulation**

**New facilities** No person shall begin construction of a new or modified liquid waste system prior to Departmental approval. All new or modified liquid waste systems shall be designed by, or reviewed and approved by, licensed professional engineers, in accordance with standards and specifications approved for management of odors, and shall be reviewed and assessed by Department engineering staff.

**Compliance:** The Director or his designee is authorized to enter and inspect any agricultural operation and have access to or copy any facility records deemed necessary to ensure compliance with these rules. If a first time violation is determined, the Department shall provide the owner or operator of the agriculture operation with written notice of the violation, and an opportunity for a hearing. First time violators must develop an Odor Management Plan (OMP) with the Department and submit to the Director for approval.

OMPs shall be designed to work in conjunction with any required Nutrient Management Plan and shall be submitted to the Director in writing. The content and time schedules for OMPs would include: Name and telephone number of the owner, physical address, county location, operation description, scaled vicinity map, manure management system, scaled site plan, land application system, climatic data, and facility odor sources.

The OMP also considers tiered implementation and public involvement. A 3-tier process shall be used to reduce odor production from the facility. Each tier shall contain a list of the primary Best Management Practices and Best Available Technologies that are going to be implemented by the facility. The plan shall describe how the public in the area of the facility will be involved in the implementation or evaluation of the OMP.

The Department shall respond to all odor complaints lodged against agriculture operations. Agricultural operations with subsequent violation of these rules shall be assessed a civil penalty by the Department or its duly authorized agent not to exceed ten thousand dollars for each offense and be liable for reasonable attorney’s fees.

hour storm. If rainfall brings the pond level above the marker, the pond should be drawn down within 15 days.

11) For optimal bacterial degradation, never pump out the bottom 6 feet of the pond.

12) Remove solids from the bottom of the pond when it builds up to 8 inches deep.

13) Inspect your pond monthly-maintain vegetated slopes, look for settling or bulges in the slopes, fill rodent holes, repair drying cracks, look for seepage outside of embankments, and inspect inlet and outlet structures and valves.

14) Keep cows away from wastewater storage pond banks to maintain the seal.

15) Consider aerating or covering storage ponds or planting windbreaks if the odor bothers neighbors.

16) Have a plan for wastewater storage or utilization in case of heavy rainfall.

**Western Dairy News** is published as a service to the people interested in the health and welfare of the western dairy industry.

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