RULES OF THE STATE BOARD OF HEALTH BUREAU OF ENVIRONMENTAL SERVICES

DIVISION OF COMMUNITY ENVIRONMENTAL PROTECTION

CHAPTER 420-3-6 SEPTAGE MANAGEMENT



ADPOPTED BY THE STATE BOARD OF HEALTH

EFFECTIVE DATE FEBRUARY 14, 2021

AMENDED EFFECTIVE SEPTEMBER 14, 2024

ALABAMA DEPARTMENT OF PUBLIC HEALTH BUREAU OF ENVIRONMENTAL SERVICES DIVISION OF COMMUNITY ENVIRONMENTAL PROTECTION SEPTAGE MANAGEMENT ADMINISTRATIVE CODE CHAPTER 420-3-6

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420-3-6-.01 Purpose

The purpose of these rules is to protect public health and the environment by establishing requirements regarding the approval, permitting, siting, operation, record keeping, and closure of land application facilities; regulating septage management practices; requiring minimum sanitary practices for the treatment, storage, and land application of septage and other permitted wastes and authorizing regular inspections.

- (1) This chapter contains the minimum standards for the land application of septage to non-public contact sites as set forth in Title 40 of the Code of Federal Regulations (CFR) Part 503, entitled "Standards for the Use or Disposal of Sewage Sludge."
- (2) In addition, this chapter also establishes minimum standards for sewage tank pumping and the treatment of grease, as defined in these rules, at septage land application sites.

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Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.02 Definitions

When used in this chapter, the following terms and words shall be construed and have the meaning assigned to them as follows, except where the context prohibits:

- (1) **ADEM** the Alabama Department of Environmental Management.
- (2) **ADPH** the Alabama Department of Public Health, the administrative arm of the Board, including variations in the name such as State of Alabama Department of Public Health, State Department of Public Health, State Health Department, or Public Health Department.
- (3) **Agricultural Land** land on which a food crop, feed crop, or fiber crop is grown, including, but not limited to, range land and land used as pasture.
- (4) **Annual Application Rate** the maximum amount of septage, expressed in gallons, that can be applied to a unit area of land during a 365-day period, as determined by the crop nitrogen requirement and the nitrogen content of the septage, according to these rules. This rate may vary throughout the 365-day period based on the season and rotation of crop(s) being grown.
 - (5) **AOWB** the Alabama Onsite Wastewater Board.
- (6) Average Seasonal High Extended Saturation (ASHES) a zone or layer 6 or more inches thick that becomes saturated at least once during most years for a significant duration, typically 20 or more consecutive days or 30 or more cumulative days. ASHES is determined by the observation of common (2 percent or more) soil mottles of colors of chroma 2 or less, using the Munsell color chart, in a mottle or a solid mass.

- (7) **Bedrock** a general term for the consolidated rock that underlies the soil and other unconsolidated material or that is exposed at the surface.
- (a) Hard bedrock is known as a lithic contact and is described as a boundary between soil and continuous, coherent, underlying material. The underlying material shall be sufficiently coherent to make hand-digging with a spade impractical. If it is a single mineral, its hardness is three (Mohs scale), and gravel size chunks that do not disperse with 15 hours shaking in water or sodium hexametaphosphate solution.
- (b) Soft bedrock is known as a paralithic contact and is similar to a lithic contact except that it is softer and can be dug with difficulty with a spade. A single mineral shall have a hardness less than three (Mohs scale), and gravel size chunks shall partially disperse within 15 hours shaking in water or sodium hexametaphosphate solution.
- (c) Practical application of the Mohs scale: When hit with a spade, a definite ring indicates a Mohs rating of three or greater. If no ring but more of a thud occurs, it indicates a rating less than three.
- (8) **Best Management Practice** an activity or action, based on a formal plan, implemented in the approved manner, and properly maintained, that protects the public's health and the environment.
- (9) **Board** the Alabama State Board of Health as defined by §22-2-1, *Ala. Code* 1975.
- (10) **Certified Crop Advisor (CCA)** an individual who has obtained and maintained the Certified Crop Advisor Credential from the American Society of Agronomy.
- (11) **Covenant(s) Running with the Land** an agreement between the property owner and another which is recorded in the office of the Probate Judge or other records office and which is intended to bind successors in title.
- (12) **Easement** a legally executed interest in land or property owned by other person(s) which entitles the holder to specified use or enjoyment.
- (13) **Engineer** a person registered as a professional engineer with the State of Alabama Board of Licensure for Professional Engineers and Land Surveyors, practicing under the Rules of Professional Conduct (Code of Ethics).
 - (14) **EPA** The United States Environmental Protection Agency.
- (15) **Facility** all land and appurtenances thereon used for the storage, treatment, and land application of septage or other permitted waste. For sewage tank pumpers, a facility is defined as that location where the trucks are stored, cleaned, and maintained.
- (16) **Flood Prone Area** an area that is generally subject to being flooded or ponded more than 50 times in 100 years or greater than a 50 percent chance in any year. This definition refers to an area that is subject to frequent flooding as observed, or as indicated by soil characteristics defined in the standards of the National Soil Survey Handbook, United States Department of Agriculture.
- (17) **Forest Land** a tract of land covered by a concentration of trees and related vegetation in non-urban areas sparsely inhabited by, and infrequently used by, humans.

- (18) **Frequent Flooding** flooding is likely to occur often under usual weather conditions; more than a 50 percent chance of flooding in any year or more than 50 times in 100 years.
- (19) **Grease** oil, animal fat, vegetable fat, and similar wastes generated from food preparation activities at a domestic residence, restaurant, retail food service operation, school, or institutional source that are captured in a grease trap. Industrial waste is excluded from this definition.
- (20) **Grease Trap** a watertight tank or receptacle in which the grease present in sewage is intercepted.
 - (21) **Groundwater** water below the land surface in the zone of saturation.
- (22) **Hydrogeologist** a person registered as a professional geologist with the Alabama Board of Licensure for Professional Geologists and practicing under the Rules and Regulations and Code of Ethics of such with a specialty in hydrogeology.
- (23) **Industrial Waste** any liquid waste, grease, sludge, or other waste resulting from any process of industry, manufacture, trade or business, other than food preparation, or from the development of natural resources.
- (24) **Land Application** the spraying or spreading of septage onto the land surface so that the septage can either condition the soil or fertilize crops or vegetation grown in the soil.
- (25) **Lime Stabilization** the addition of a sufficient quantity of quicklime or hydrated lime to septage or other permitted waste to raise and maintain the pH at 12 or higher for a minimum period of 30 minutes.
 - (26) **Local Health Department (LHD)** a county health department.
- (27) **Marine Sanitation Waste** sewage or similar waste generated on board a boat or water-going vessel and stored in a holding tank before discharge or removal.
- (28) **Observation Pits** soil inspection trenches that shall be a minimum of 3 feet wide and 60 inches deep unless rock is encountered. Pits shall be constructed in such a fashion as to be safely accessible for the evaluator.
- (29) **Onsite Sewage Treatment and Disposal System (OSS)** a system that collects, transports, treats, and provides subsurface dispersal of sewage from establishments or dwellings.
- (30) **Other Permitted Waste** grease, portable toilet waste, or marine sanitation waste.
- (31) **Pathogen** a disease-causing organism, including, but not limited to, certain bacteria, protozoa, and viruses.
- (32) **Person** an individual, firm, partnership, corporation, state agency, municipal corporation, party, company, association, or other public or private legal entity.
- (33) **pH** the logarithm of the reciprocal of the hydrogen ion concentration and a measure of alkalinity on a scale of 1 to 14. On said scale, 1 is extreme acid and 14 is extreme alkaline.

- (34) **Portable Toilet Waste** a waste resulting from chemical toilets, privy holding tanks, or other equipment designed for temporary collection and storage of waste containing human feces or residuals of such, or any other such waste having similar characteristics.
- (35) **Public Contact Site** land that has a high potential for contact or use by the public, including, but not limited to, public parks, athletic fields, cemeteries, golf courses, and highway shoulders and medians.
- (36) **Redoximorphic (Redox) Features** features formed by the processes of reduction, translocation, and/or oxidation of iron (Fe) and manganese (Mn) oxides. These features were formerly called mottles and low chroma colors. Redox features are indicators of current conditions of saturation, usually of significant duration.
- (37) **Refusal Layer** a layer of highly compacted soil, boulders, rock, or other compacted material, below the soil surface, that is difficult or impossible to penetrate with soil boring equipment, such as a hand auger.
- (38) **Septage** the solids and liquids removed during the pumping of an OSS pre-treatment device. For the purposes of these rules, the term septage shall exclude marine sanitation and portable toilet wastes that have not been pre-treated in a manner approved by the Board.
- (39) **Septic Tank** a tank that receives sewage and that meets the requirements of septic tanks as provided by Chapter 420-3-1, Onsite Sewage Treatment and Disposal.
 - (40) **Sewage** for the purpose of these rules, the term refers to the following:
- (a) Sewage waterborne or non-waterborne waste of similar composition and strength as may be found in the typical residence or dwelling and that has a wastewater (sewage) concentration of BOD5 250 mg/l, Total Suspended Solids 250 mg/l, Ammonia 10 mg/l, and Total Phosphorus 9 mg/l.
- (b) High Strength Sewage waterborne or non-waterborne waste from establishments, such as kitchen waste, that is of similar composition but of higher strength than would be found in a typical dwelling.
- (41) **Sewage Tank Pumper** a person engaged in the business, operation, or practice of removing and disposing of sludge, grease, septage, or solid or liquid waste from sewage tanks and who is appropriately licensed by the AOWB and permitted by the LHD.
- (42) **Sewer System** the conduits, sewers, and all devices and appurtenances by means of which sewage is collected, pumped, treated, and disposed of, all of which are owned and operated by a municipality, utility, a legally constituted agency of government, or a private enterprise.
- (43) **Sinkhole** a natural depression formed as a result of subsurface removal of soil or rock materials and causing the formation of a collapse feature that exhibits internal drainage. The existence of a sinkhole is typically indicated by closed depression contour lines on a United States Geological Survey 7.5-minute quadrangle topographic map, or as determined by field investigation. A sinkhole begins at the outer margins of the depression, as determined at the site by a professional geologist.

- (44) **Soil Classifier** a person registered as a professional soil classifier with the State of Alabama Board of Registration for Professional Soil Classifiers and practicing under the rules and regulations and Code of Ethics of such.
- (45) **Spill Prevention, Control, and Countermeasure Plan (SPCC)** the document that details the equipment, workforce, procedures, and steps to prevent, control, and provide adequate countermeasures to a discharge of septage and other permitted wastes.
- (46) **Storage Tank** a watertight container with a minimum capacity of 5,000 gallons.
- (47) **Surface Water** water above the surface of the ground, including, but not limited to, waters of a bay, river, stream, watercourse, pond, lake, swamp, wetland, spring, or artesian well, located partially or wholly within the state, including the Gulf of Mexico. Generally, these features exhibit some characteristic(s) indicating a degree of permanence (i.e., a river bank, a depression that holds water for a few days after a rain, or a wet weather spring does not qualify).
- (48) **Ten-Year One-Hour Storm** a predetermined rainfall event that yields 5-10 inches of rainfall in a 24-hour period. Reference U.S. Soil Conservation Service Technical Release 55: Urban Hydrology for Small Watersheds (June 1986).
- (49) **Vector** an organism that is capable of carrying or transmitting a human pathogen, or human disease-causing agent, from one host to another.
- (50) **Vermin** any of various small animals or insects that are destructive, annoying, or injurious to health, including, but not limited to, flies, cockroaches, rodents, foxes, and weasels.
- (51) **Vicinity Map** a map which indicates the region near or about a place and the proximity to prominent, permanent, or established landmarks, and which indicates correct road or street names and/or numbers, and which is sufficiently accurate to locate the property without additional direction or assistance.
- (52) **Water Table Elevation** the upper limit of the portion of the ground wholly saturated with water.
- (53) **Wet Season Water Table** the water table elevation occurring during that portion of the year which receives the highest amount of rainfall, as observed during actual measurement or as determined by a soil classifier based on established soil indicators (redoximorphic features).
- (54) **Wetlands** a transitional area between aquatic and terrestrial ecosystems that is inundated or saturated for long enough periods to produce hydric soils and support hydrophytic vegetation.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, Thad Pittman, Richard Smith, and Boyd Rogers.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.03 Limitations

Nothing in these rules shall be construed to limit the authority of a municipal or county government to adopt more stringent requirements to be used in conjunction with these rules.

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Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994

420-3-6-.04 Other Approvals Not Implied

Approval of any land application facility or operation by the LHD or the Board does not constitute or imply approval by a county, municipality, or other agency having planning, zoning, or other legal jurisdiction. Similarly, approval of a land application facility or operation by other agencies does not negate the required approval by the LHD or the Board in accordance with this chapter.

Author: John-Paul O'Driscoll, Christie L. White, and George B. Allison.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994.

420-3-6-.05 Applicability

This chapter applies to any person who pumps sewage tanks, prepares septage that is applied to the land; to any person who applies septage to the land; to the septage that is applied to the land; and to the land on which septage is applied. In addition, this chapter applies to the treatment of other permitted waste at land application facilities.

For land application permits issued prior to the effective date of these rules, the permitted person shall, within 45 days of the expiration of the land application permit, submit jointly to the LHD and the Board, an application for a Land Application Permit and all accompanying information as required in these rules.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.06 General Requirements for Septage Management

Septage and other permitted waste shall be treated and disposed of by means of a publicly or privately-owned sewage treatment plant, approved landfill, or other approved facility, where such facilities are available, and where septage or other permitted waste is accepted by those facilities.

(1) If access to a sewage treatment plant, sanitary landfill, or other approved facility is denied, or is not feasible due to cost, distance, or other factor, the application

of septage or septage mixed with other permitted waste at a land application facility may be approved pursuant to these rules, if deemed appropriate by the LHD or the Board and not otherwise prohibited. To be considered accessible, facilities listed above shall be located within 30 miles of proposed land application site.

- (2) Where septage or septage mixed with other permitted waste is land applied, it shall be collected, stored, transported, treated, and applied in a manner consistent with the requirements of this chapter and all applicable laws of the local, state, and federal government or agency, and in such a manner as to prevent the creation of a nuisance, insanitary condition, or a potential health hazard.
- (3) In determining whether septage or septage mixed with other permitted waste to be land applied, or that was land applied, constitutes an endangerment to the public health, the Board or LHD shall consider the quantity and composition of the waste, the location and condition of the application area, the presence and extent of pathogens or vectors, and other factors which would warrant special concern.
- (4) Options that are permissible under state and federal law for the treatment or disposal of septage and other permitted waste are as follows:
- (a) Discharge of the waste to a publicly or privately-owned sewage treatment plant for disposal, in accordance with EPA's regulations in 40 CFR Part 503 pertaining to sewage sludge.
- (b) Disposal of the waste in a municipal solid waste landfill in accordance with EPA's regulations in 40 CFR Parts 257 and 258, which, among other things, require free-flowing liquids to be dried or solidified before disposal.
- (c) Land application of the waste in strict accordance with the provisions of these rules, provided that options (a) and (b) above are not feasible due to distance, access, or other limitations.
- (d) The treatment of the waste at a composting facility in accordance with EPA's regulations in 40 CFR Part 503.
- (e) The treatment of the waste by incineration in accordance with EPA's regulations in 40 CFR Part 503.
- (f) Other proposed methods which comply with all applicable local, state, and federal laws.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.07 Prohibited Practices

Any person who prepares septage or other permitted waste that is applied to the land, who applies septage or septage mixed with other permitted waste to the land, or who owns or uses the land on which septage or septage mixed with other permitted waste is applied, shall employ measures necessary to prevent those activities and practices that are prohibited under this rule.

- (1) Such prohibited activities and practices shall include the following:
- (a) The spraying, spreading, or depositing of septage or septage mixed with other permitted waste on any land for which a current Land Application Permit has not been issued by the LHD.
- (b) The spraying, spreading, or depositing at a permitted land application facility of the following materials:
- 1. Septage from persons who have not been issued a current Sewage Tank Pumper Permit by the LHD in accordance with Rule 420-3-6-.23.
- 2. Grease or similar waste from residences, restaurants, schools, or other sources that are served by a sewer system, except in accordance with the requirements of these rules.
 - 3. Sewage sludge or similar waste from sewage treatment plants.
- 4. Portable toilet waste and marine sanitation waste which has not been pretreated in a manner acceptable to the Board.
 - 5. Industrial waste.
- (c) The land application of septage or septage mixed with other permitted waste at a public contact site.
- (d) The disposal of grease in dewatering pits, or the surface or subsurface application of grease on any land, except when mixed with septage pursuant to requirements of Rule 420-3-6-.15 Operation of Land Application Facilities.
- (e) The land application of septage or septage mixed with other permitted wastes that have not been lime-stabilized to a pH of 12 or higher for a minimum period of 30 minutes.
- (f) The use of alkaline materials or substances other than lime to stabilize septage or other permitted waste for land application without prior written approval from the Board.
- (g) The discing of septage or septage mixed with other permitted waste into the soil, except in conjunction with the cultivation for, and the establishment of, a new crop or vegetative cover.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.08 Professionals Required

- (1) The applicant shall employ an engineer to complete the following requirements in this rule:
 - (a) 420-3-6-.09(2)(d) Septage management plan.
 - (b) 420-3-6-.09(2)(g) Protective measures.

- (c) 420-3-6-.10(1) Plat map.
- (d) 420-3-6-.10(3) Vicinity map.
- (e) 420-3-6-.12 Storage tank requirements.
- (2) The applicant shall employ a soil classifier to complete the requirements of Rule 420-3-6-.10(2) High Intensity Soil Map.
- (3) The applicant shall employ a certified crop advisor to complete the requirements of Rule 420-3-6-.11 Annual Crop Management Plan.
- (4) The applicant shall employ a hydrogeologist to complete the requirements of the following:
 - (a) Rule 420-3-6-.10(4) Hydrogeological report.
 - (b) Rule 420-3-6-.14(4) Contamination sources.
- (5) All submittals by professionals shall contain the appropriate signatures and seals as required by the appropriate licensing board.
- (6) Subsequent applications for permit renewal may be signed and submitted by the applicant, except for the updated annual crop management plan as required in Rule 420-3-6-.11, provided that no significant changes have occurred to the facility or the operation.

Author: Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-

26-1; 22-26-2; 22-26-3.

History: New Rule: Filed December 17, 2020; effective February 14, 2021.

420-3-6-.09 Land Application Permits

No person shall apply septage or septage mixed with other permitted waste to any land of this state for which a current Land Application Permit has not been issued in accordance with these rules.

- (1) Before any person may establish, operate, or materially alter or modify a land application facility for the purpose of receiving, treating, or land applying septage or septage mixed with other permitted waste, he or she shall apply to and obtain from the LHD a Land Application Permit on forms provided by the Board and in accordance with the requirements of this rule.
- (2) The initial application for a permit shall be made jointly to the LHD and the Board and shall be accompanied by the following information:
- (a) The name(s), mailing address(es), and telephone number(s) of the applicant, business, and property owner, and the street address, or location, of the proposed land application facility.
- (b) A copy of the property deed, including any easements or "Covenant(s) Running with the Land" and a letter from the property owner, if other than the applicant, granting permission, for a period of at least 2 years, to the applicant to use the property for the treatment and application of septage or septage mixed with other permitted waste.
- (c) Evidence of an investigation of alternative options locally available to the applicant for the disposal of septage and other permitted waste. Such evidence must

demonstrate, to the satisfaction of the LHD and the Board, that the land application of septage and septage mixed with other permitted waste is the only option available to the applicant. Such evidence shall include, but not be limited to, the following:

- 1. A list of sewage treatment plants, municipal solid waste landfills, or other approved disposal facilities, within 30 miles of proposed land application site, available to the applicant.
- 2. Statement(s) from each sewage treatment plant, municipal solid waste landfill, or other approved disposal facility, indicating whether septage or other permitted waste are accepted at those facilities.
- (d) A Septage Management Plan describing the methods to be used to transport, store, lime-stabilize, screen, and land apply septage or septage mixed with other permitted waste to comply with requirements of Rule 420-3-6-.15 Operation of Land Application Facilities and methods to be used to control erosion, surface run-off, and infiltration. The plan shall address the method by which other permitted waste, if accepted at the facility, will be mixed with septage and lime-stabilized before spreading on the land. In addition, a tracking system shall be proposed in the management plan to ensure that septage is spread uniformly over the area of the facility and to ensure that the annual application rate, specified in Rule 420-3-6-.15 Operation of Land Application Facilities, is strictly observed over the entire area. Such a tracking system may consist of a division of the application area into sectors to be marked by flagging, or other method which would facilitate the rotation of individual applications and effective record keeping. The LHD or the Board may direct the permit holder to make changes to the Septage Management Plan at any time, if deemed necessary to protect public health and the environment.
- (e) The name(s), address(es), telephone number(s), and Sewage Tank Pumper Permit number(s) of the person(s) who will deliver septage or other permitted waste to the land application facility. Those persons who will land apply septage or septage mixed with other permitted waste at the proposed facility shall be clearly indicated.
- (f) The expected volumes in gallons of septage or other permitted waste to be received, stored, and land applied at the facility annually. In addition, the type of crop(s) growing or to be grown on the land, the anticipated crop yield per acre, and the crop nitrogen requirement in pounds per acre per 365-day period, as proposed by the Certified Crop Advisor.
- (g) A description of measures that will be used to properly store or dispose of septage or other permitted waste in the event of equipment failure; when access to the facility is restricted due to flooded, frozen, snow-covered, or other conditions; or during an emergency. Such measures may include the cessation of additional deliveries of septage or other permitted waste to the facility; the use of storage tanks; or the disposal of septage or other permitted waste at a sewage treatment plant or approved landfill. Evidence of agreements made with a sewage treatment plant or an approved landfill shall be presented.
- (3) The permit holder shall ensure that all persons who deliver, store, treat, or land apply septage or septage mixed with other permitted waste, or perform other practices or operations at the facility, comply with all the requirements of these rules. Any violation at the facility shall be treated as a violation by the permittee, who shall be the subject of enforcement actions taken or initiated by the Board.

(4) All land application permits are annual and shall be renewed in December of each year. In order to continue operating the permitted site, the permit holder shall, at least 45 days prior to the expiration date, make an application to renew a permit to the LHD on forms provided by the Board. The LHD in conjunction with the Board may request additional information if necessary.

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Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.10 Site Suitability Information for Land Application Permits

All applications to land apply any permitted septage shall include the following information:

- (1) A plat map showing the exact location of the proposed facility, indicating the total acreage and the setback distances from key natural and man-made features referenced in Rule 420-3-6-.14 Sites for Land Application Facilities that are within 1,000 feet of the facility.
- (2) A High Intensity Soil Map, prepared by a professional soil classifier, that shall meet the following:
 - (a) The map scale shall be 1-inch equals 100 feet or larger.
- (b) A minimum of four borings per acre is required to define the soils. When a grid system is not used, boring location shall be dictated by the landscape or in a manner to best define the soils that occur. All borings shall be flagged and numbered.
- (c) Soil surveys or maps shall conform to the National Cooperative Soil Survey (NCSS) Standards.
- (d) Soils shall be classified according to U.S. Soil Taxonomy to the series level and map units shall generally consist of consociations. Complexes may only be used under very limited conditions when two or more dissimilar soils or soils and rock outcrops cannot be separated.
 - (e) Soil series boundaries shall be plotted on a map.
- (f) A High-Intensity Soil Map requires a carefully prepared base map on which the professional soil classifier shall accurately locate soil boundaries. A minimum of a 2-foot contour interval topographic base map is required
 - (g) The following information is required for all maps:
 - 1. A title block or caption that states the project or client name.
 - 2. The date of the survey.
 - 3. A north arrow for orientation.
 - 4. The scale of the map.

- 5. The soil mapping intensity.
- 6. The signature, stamp or seal, address, and telephone number of the professional soil classifier.
- 7. A special symbols legend, if needed, defining special features identified on the survey map (i.e., springs, rocky outcrops, wells, sinkholes, gullies, etc.).
- (h) The information listed below shall accompany or be provided on maps in table form with detailed maps for each boring:
 - 1. The name of the soil series (or closest series with similar interpretations).
 - 2. The percent slope or slope range class.
 - 3. The depth to ASHES.
 - 4. The depth to other restrictive layer(s) or horizon(s).
 - 5. The assigned or adjusted loading rate.
 - 6 Additional notes and information as appropriate.
 - 7. Soil group.
- (i) Soil maps shall be color-coded to differentiate between map units and/or soil groups.
 - (3) A vicinity map.
- (4) A hydrogeological report, performed by a hydrogeologist, relating to the area of the proposed facility, verifying that the application of septage or septage mixed with other permitted waste over the area of the proposed facility will not pose a threat to the groundwater and aquifer, to surface waters, or to any public or private drinking water wells.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, Thad Pittman, Richard Smith, and Boyd Rogers.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.11 Annual Crop Management Plan

An annual cropping plan shall be prepared by a Certified Crop Advisor (CCA) to clearly show how the applicant will use the site for land application of septage during the 365-day period. This information shall be submitted with initial application information and updated during the permit renewal period.

- (1) The following information is required for all annual crop management plans:
- (a) Site name and location.
- (b) Cropping year.
- (c) Field or zone identification. Zones should be comprised of soils in the same soil group or that have the same management practices and/or application rates.

- (d) Total acreage of each zone.
- (e) Type of crop(s) to be grown within each zone.
- (f) Soil fertility test with pH and nutrient recommendations for crop(s) to be grown.
- (g) Realistic yield rates considering productivity of soil type and management.
- (h) Agronomic application rates for crop(s) to be grown.
- 1. The annual application rate for septage applied to agricultural land, forest land, or other non-public contact sites shall not exceed the amount as determined by the following formula:

AAR = N/0.0026

Where:

AAR = Annual Application Rate in gallons per acre per 365-day period.

- N = Amount of nitrogen in pounds per acre per 365-day period required by the crop or vegetation grown on the land divided by number of crop growing season months.
- (i) In the case of portable toilet and marine sanitation waste, which shall be pretreated in accordance with Rule 420-3-6-.15(2)(a), the AAR shall be determined using the formula above, with 0.015 in place of the value 0.0026, to represent the higher concentration of nitrogen known to occur in those wastes.
- (ii) All septage, or mixtures of septage and portable toilet and marine sanitation waste, that meets the requirements of Rule 420-3-6-.15(2)(a), shall be spread uniformly over the approved area of the land application facility to ensure that no part receives waste in excess of the AAR.
- (i) Planting/reseeding dates and harvest dates. If forage crops are grown, the months of growing season for each crop should be indicated (cool season versus warm season grasses). See 420-3-6-.15 for harvest restrictions.
 - (j) Beginning and end period of septage application.
 - (k) Sources of nutrients other than septage that will be applied.
- (l) Proposed period of grazing of forage crops. See 420-3-6-.15 for grazing restrictions.
- (2) The pH of the soil shall be maintained at a pH level amenable for growing the cover crop(s).
- (3) The pH shall be measured by annual soil test and reported in the annual cropping plan.
- (4) Annual soil testing shall be conducted to determine levels of arsenic, cadmium, chromium, copper, lead, mercury, nickel, selenium, and zinc.
- (a) No person shall land apply septage to a site that exceeds the annual pollutant loading rate in Table 4 for arsenic, cadmium, chromium, copper, lead, mercury, nickel, selenium, and zinc.
- (b) No person shall land apply septage to a site that exceeds the cumulative pollutant loading rate in Table 4 for arsenic, cadmium, chromium, copper, lead, mercury, nickel, selenium, and zinc.

Author: Thad Pittman, Richard Smith, and Boyd Rogers.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-

26-1; 22-26-2; 22-26-3.

History: New Rule: Filed December 17, 2020; effective February 14, 2021.

420-3-6-.12 Storage Tank Requirements

The use of storage tanks is required for land application facilities. The storage tanks may be located on or off actual land application property.

- (1) Storage tanks shall be:
- (a) Manufactured of material or treated to resist corrosion and rust.
- 1. Above ground tanks shall be constructed of steel, plastic, fiberglass, concrete, or some other material suitable for above ground use.
- 2. Underground tanks shall be constructed of plastic, fiberglass, concrete, or some other material suitable for underground use excluding steel.
- (b) Certified in writing by an engineer that they are suitable for intended use of storing septage or other permitted waste.
 - (c) Equipped with a screening device to remove plastics, metals, and other debris.
 - (d) Of sufficient capacity to handle anticipated volumes.
 - (e) Devoid of holes, cracks, or defects to prevent the escape of septage.
- (2) Storage tanks shall be easily accessible and adequate space shall be provided to safely maneuver vehicles.
- (a) Access to storage tanks at a land application facility shall be restricted to authorized persons and a sign shall be posted in the vicinity of the tanks to be clearly visible. The letters on the sign shall be a minimum height of 1 inch and the sign shall include, at a minimum, the words: "septage" and "no trespassing area."
 - (b) See Table 3 for setback restrictions for storage tanks.
- (3) A Spill Prevention and Control Countermeasure plan encompassing the storage tanks shall be prepared and submitted by a licensed professional engineer.
- (4) The location of storage tanks shall not pose a threat or endangerment to surface waters; to groundwater or the aquifer; to public or private drinking water wells; to a residence or public contact site; or to wetlands, or otherwise cause a nuisance menacing public health.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.13 Public Notice Requirements

Public notice is required when a permit application for a new land application facility has been received and deemed complete, and a tentative determination has been made to issue the permit; or when a public hearing has been scheduled. Land application sites permitted prior to the effective date of these rules are not subject to this section.

- (1) The ADPH shall receive public comments for 30 days after a public notice is issued unless the time has been extended due to significant public interest.
 - (2) Public notice shall be provided using the following methods:
 - (a) A copy of the public notice shall be sent to the persons listed below:
 - 1. The person applying for a permit.
- 2. Federal and state agencies with jurisdiction over fish, shellfish, and wildlife resources and over coastal zone management plans and other appropriate government authorities including any affected states.
- 3. To any unit of local government having jurisdiction over the area where the facility is proposed to be located.
 - 4. To any person who has requested notification from the ADPH.
- (b) Public notice shall be published in a daily or weekly newspaper of general circulation within the county where the proposed facility is located once a week for four consecutive weeks.
 - (c) Public notice shall be posted on the ADPH website.
 - (3) All public notices shall contain the following information:
 - (a) Name and address of the LHD processing the permit application.
- (b) Name and address of the person applying for a permit and, if different, of the facility.
- (c) Name, address, and telephone number of a person from whom interested persons may obtain further information, including copies of the permit application.
- (d) A general description of the public comment procedures, how to request a public hearing required by this rule, and the time and place of any public hearing that has been scheduled.
- (4) Public comments and requests for a public hearing may be submitted as follows:
- (a) During the public comment period, any interested person may submit written comments to the permit application and may request a public hearing if no hearing has been scheduled.
- (b) A request for a public hearing shall be in writing and shall state the issues proposed to be raised in the hearing.
 - (5) The ADPH shall schedule a public hearing:
 - (a) When there is a significant degree of public interest in a permit application or,

- (b) Whenever a hearing might clarify one or more issues involved in the permit decision.
 - (6) The ADPH shall hold a public hearing in the following manner:
- (a) Any person may present oral or written statements and data concerning the permit application to the ADPH. Reasonable limits may be set upon the time allowed for oral statement. As a result, the submission of written statements may be necessary.
- (b) The ADPH shall make a record of the public hearing available to the public in the form of an audio recording or written transcript.
- (7) The ADPH shall prepare and make available to the public upon request, a response to substantive comments received during the public comment period or public hearing. A substantive comment is a comment that offers information or suggestions of a technical, environmental, legal, or regulatory nature that are applicable to the permit.
- (8) After consideration of any comments received, the ADPH may issue the permit as drafted, revise the permit, or deny the permit.

Author: Karen Bishop.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-

26-1; 22-26-2; 22-26-3.

History: New Rule: Filed December 17, 2020; effective February 14, 2021.

420-3-6-.14 Sites for Land Application Facilities

The location of a land application facility shall not pose a threat or endangerment to surface waters; to groundwater or the aquifer; to public or private drinking water wells; to a residence or public contact site; or to wetlands, or otherwise cause a nuisance menacing public health.

- (1) It shall be the responsibility of the applicant for a Land Application Permit to determine the suitability of the proposed facility area for the application of septage or septage mixed with other permitted waste by virtue of its hydrogeology and soil characteristics, and to present supporting evidence of same to the LHD.
- (2) In order to minimize the potential threat to the public health and the risk of contamination by septage or septage mixed with other permitted waste, the location of all land application facilities shall meet the setback restrictions found in Table 1
 - (a) Storage tanks shall meet the setback restrictions found in Table 3.
- (3) The maximum slope at any part of a land application facility where septage or septage mixed with other permitted waste is applied shall not exceed 12 percent.
- (4) The land application area and the area extending 300 feet from the outer boundaries of the facility shall contain no evidence of subsurface fractures, solution cavities, sinkholes, excavation bore holes, abandoned wells, or any other natural or man-made conduits that could allow direct contamination of groundwater, as determined by a qualified hydrogeologist.
- (5) The land application facility shall be served by an access route or road kept in good repair by the applicant.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.15 Operation of Land Application Facilities

The operation and management of a land application facility shall not cause a nuisance or hazard menacing public health or the environment; provide harborage or food for vermin or vectors; or cause contamination or pollution of groundwater, surface waters, or public or private drinking water wells. All land application facilities shall be operated in accordance with the requirements of this rule.

- (1) Septage or septage mixed with other permitted waste may be land applied to agricultural land, forest land, and other non-public contact sites in accordance with these rules. A crop or vegetative cover shall be present during each application to prevent soil erosion and surface run-off of the waste, and to absorb the nitrogen present in the waste. Septage or septage mixed with other permitted waste shall not be applied to bare soil except immediately preceding the sowing or planting of a new crop or vegetative cover, when it shall be plowed or disced into the soil. Under no circumstances shall septage be applied to a public contact site, as defined in this chapter. Dust, noise, and odor shall be minimized.
- (2) Before each load of septage or septage mixed with other permitted waste is land applied it shall be pre-treated according to the following procedures:
- (a) Septage and other permitted waste, if present, shall be mixed and lime-stabilized by the addition and thorough agitation of a sufficient quantity of quicklime or hydrated lime to uniformly raise the pH to 12 or higher for 30 minutes or more. If, on recording the pH after the elapse of 30 minutes, it is below 12, additional lime shall be added to raise the pH to 12 throughout the entire load for 30 minutes before it is land applied. No septage or septage mixed with other permitted waste shall be land applied where its pH is less than 12. Operators shall be equipped during the preparation of each load of septage to accurately measure the pH.
- (b) Septage and other permitted waste, if present, shall be screened of plastic and metal objects and other debris, which shall be disposed of in accordance with Chapter 420-3-5, Solid Waste Collection and Transportation.
- (3) When quicklime or hydrated lime are used, they shall be administered in accordance with the product label directions, including all safety precautions. Quicklime releases great heat when mixed with water and can cause severe burning of the skin and eyes.
- (4) It shall be a violation of these rules for any person to accept, treat, store, or spread grease at a land application facility unless specifically approved to do so under a Land Application Permit issued by the LHD.
- (a) Grease shall not be spread on or applied to the land at any land application facility permitted pursuant to these rules, except after the grease is mixed with septage at a ratio of 1 part grease, or less, to 3 parts of septage. The mixture shall be lime-stabilized according to subparagraph (2)(a) of this rule and thoroughly agitated before

being spread or applied on the land. The mixture of septage and grease shall be screened in accordance with (2)(b) of this rule before being land applied.

- (b) It shall be the responsibility of the permit holder to ensure that the ratio of grease to septage in a mixture does not exceed 1:3 when applied on the land. During the pumping of a grease trap, the approximate portion of its contents which is grease shall be determined and recorded.
- (c) The LHD or the Board may prohibit the spreading or application of additional grease at a facility if it is determined that the practice is adversely impacting the land, or for other reasons deemed appropriate to prevent the creation of a public health nuisance.
- (5) To prevent the ponding or accumulation of septage or septage mixed with other permitted waste and to ensure even and uniform application, vehicles shall be equipped with a splash plate or similar device at the discharge pipe to achieve a uniform spread at least equal to the width of the vehicle. The vehicle shall be equipped with a discharge valve control accessible to the driver, or other method to open the valve while the vehicle is in forward motion. If necessary, septage or septage mixed with other permitted waste shall be maintained under pressure in the vehicle tank during dispersal, in order to achieve the desired spread. The vehicle shall be in forward motion when the valve is opened to release the contents and shall continue in forward motion until the tank is empty or until the discharge pipe is closed. At no time shall a vehicle stop or remain stationary while dispersing its contents.
- (6) The land application of portable toilet waste and marine sanitation waste is discouraged. All portable toilet waste and marine sanitation waste shall be pre-treated in a manner acceptable to the Board before they are land applied.
- (7) Septage or sludge shall not be applied during rain events of sufficient magnitude to cause runoff, or during periods in which surface soils of the land application area are saturated. Sufficient septage storage capacity shall be provided for periods of inclement weather and equipment failure. Facilities shall be designed, located, and operated to prevent nuisance conditions and avoid site run-off.
- (8) The boundaries of the land application facility shall be clearly marked by flagging or other material at regular intervals. The setback distance from property boundaries (75 feet), if applicable, shall also be marked to be clearly visible.
- (a) An undisturbed vegetative buffer of at least 50 feet wide shall be established and maintained along all drainage ditches within the facility area and at or near property boundaries to reduce runoff and noise pollution. The land application area shall have sufficient buffer areas or stormwater management structures to retain the runoff from a 10-year 1-hour storm on the site.
- (9) Each application of septage or septage mixed with other permitted waste shall be made in sequence with previous applications to ensure uniform distribution and compliance with the annual application rate, and to derive the maximum benefit from the nutrients contained therein.
- (a) The permit holder shall establish and maintain a system for rotating all land applications according to a sequence for the entire area of the facility. Where septage or septage mixed with other permitted waste is applied by persons other than the permit holder, the permittee shall indicate the precise pattern of the rotation using flagging, markers, pointers, or other devices which are clearly visible.

- (b) The permit holder shall maintain a facility log and site plan in a legible form and shall ensure that data pertaining to each application are recorded. The log shall be updated after each application to record: the date, time, volume, and area or sector of last application; name and permit number of operator; and other data required under Rule 420-3-6-.16 Record Keeping. The site plan shall show the entire facility area and the rotation pattern. It shall be clear from the log and site plan where the last application was made.
- (10) Active areas which currently receive septage or septage mixed with other permitted waste, or for which 30 days have not elapsed, shall be restricted from grazing animals by the use of appropriate fencing and gates. The permit holder may divide the area of the facility for grazing purposes and rotate the grazing animals while observing the 30-day limit.
 - (11) For all land application facilities, the following crop restrictions shall apply:
- (a) Food crops with harvested parts that touch the septage/soil mixture and are totally above ground shall not be harvested for 14 months after application of domestic septage.
- (b) Food crops with harvested parts below the surface of the land shall not be harvested for 20 months after application of domestic septage when the domestic septage remains on the land surface for 4 months or longer prior to incorporation into the soil.
- (c) Food crops with harvested parts below the surface of the land shall not be harvested for 38 months after application of domestic septage when the domestic septage remains on the land surface for less than 4 months prior to incorporation into the soil.
- (d) Animal feed, fiber, and those food crops whose harvested parts do not touch the soil surface shall not be harvested for 30 days after application of the domestic septage.
- (e) Turf grown on land where domestic septage is applied shall not be harvested for 1 year after application of the domestic septage when the harvested turf is placed on either a lawn or land with a high potential for public contact, unless otherwise specified by the permitting authority.
- (12) The permit holder shall employ appropriate measures to properly store or dispose of septage or other permitted waste in the event of equipment failure; when access to the facility is restricted due to flooded, frozen, snow-covered, or other conditions; or during an emergency. Such measures may include the cessation of additional deliveries of septage or other permitted waste to the facility; the use of storage tanks; or the disposal of septage at a sewage treatment plant or approved landfill, until conditions at the facility become suitable for land application.
- (13) Prominent entry points to the land application facility shall be posted with signs stating the business name of the permit holder, the permit number, and the permit holder's telephone number. The sign shall be clearly visible with letters at least 1 inch in height on material that is weather-resistant and shall include the words: "septage application site" and "no trespassing area." The permit holder shall take appropriate measures to minimize public access to the land application facility by the use of appropriate fencing materials and gates. Fencing and gates shall be appropriately

maintained. Public access to the facility or any part thereof shall be restricted for at least 30 days after the last septage application.

- (14) An effective method to control erosion, run-off, and infiltration shall be employed at the facility. The land shall be protected by the growing and harvesting of a nitrogen-consuming crop to protect surface and groundwater from nitrogen pollution. Heavy vehicles shall not enter the land application area when the ground is saturated or flooded. When applying septage or septage mixed with other permitted waste, vehicle drivers shall avoid sloping land when vegetation or ground cover is sparse or thin to minimize the risk of run-off from the site. Septage or septage mixed with other permitted waste shall not be applied to land having a slope greater than 12 percent.
- (15) The permit holder shall employ adequate measures to minimize vermin and vector attraction at the land application facility. In addition to the lime stabilization requirement of this rule, the permit holder shall harvest or mow the crop or vegetative cover when necessary to reduce the potential for vector attraction. To prevent ponding or accumulation on the land application area and to minimize the attraction of flies, rodents, and other vectors, septage or septage mixed with other permitted waste shall be spread uniformly over the land application area in accordance with paragraph (5) of this rule.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, Thad Pittman, Richard Smith, and Boyd Rogers.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.16 Record Keeping

All records pertaining to the operation and management of the land application facility, as specified in this rule, shall be maintained for a minimum period of 5 years from the date each record is created.

- (1) The following records shall be maintained in a legible form by the permit holder to record the daily activities and practices performed at the land application facility:
- (a) The source of all septage or other permitted waste delivered to the facility to include:
 - 1. The name and location of said source.
 - 2. The name and permit number of the person making delivery.
 - 3. The type and volume, in gallons, of waste delivered.
 - 4. The date of delivery.
- (b) The date and time when the waste was lime-stabilized; the amount of lime added to the waste; the time of initial pH measurement of 12 or greater and the pH after 30 minutes; and the method used to perform lime stabilization, such as in a vehicle tank or in a storage tank.

- (c) The location, identified by permit number, of each site on which septage or septage mixed with other permitted waste is applied.
- (d) The number of acres in each site on which septage or septage mixed with other permitted waste is applied, and the method of application.
- (e) The date and time septage or septage mixed with other permitted waste is applied to each site.
- (f) The nitrogen requirement for the crop or vegetation grown on each site during a 365-day period, and the type of crop or vegetation.
- (g) The rate, in gallons per acre per 365-day period, at which septage is applied to each site.
 - (h) A certification statement to read as follows:

"I certify under penalty of law, that the pathogen requirements in EPA's Pathogen Reduction Alternative 2, and the vector attraction reduction requirements in EPA's Vector Attraction Reduction Alternative 3, as detailed in the lime stabilization requirement of Rule 420-3-6-.15(2)(a), have/have not (circle one) been met. This determination has been made under my direction and supervision in accordance with the system designed to assure that qualified personnel properly gather and evaluate the information used to determine that the pathogen requirements and the vector attraction reduction requirements have been met. I am aware that there are significant penalties for false certification including the possibility of fine and imprisonment."

- (i) Other information that may be requested by the LHD or the Board.
- (2) The permit holder shall ensure that all the information required under this rule relating to each application is recorded and maintained in a legible form.
- (3) A facility log shall be made available to all authorized persons when the facility is in use. The vehicle driver shall inspect the log before each application, or otherwise determine the area where waste was last applied. A site plan shall accompany the log and shall display the facility and the pattern, or sequence, by which septage or septage mixed with other permitted waste is applied.
- (4) The permit holder shall maintain all records specified by this rule on forms acceptable to the Board.
- (5) The permit holder shall submit records or information pertaining to the land application facility to the LHD or the Board upon request. The failure or refusal to submit such records or information to the LHD or the Board, or to deny access to same, shall be a violation of these rules, and shall give cause to revoke a permit.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.17 Facility Closure

The closure of a land application facility shall be performed subject to approval by the LHD or the Board and pursuant to the following requirements:

- (1) The permit holder shall notify the LHD in writing of an intention to close the facility at least 90 days prior to the planned closure date.
- (2) The permit holder shall notify persons who are authorized to use the facility for land application of the intention to close the facility, at least 60 days prior to the planned closure date.
- (3) The permit holder shall submit to the LHD, at least 60 days prior to the closure date, a site closure plan, which shall include, but not be limited to, the following items of information:
- (a) A statement explaining why the facility will be closed. The statement shall indicate if the permittee possesses a Sewage Tank Pumper Permit and whether he or she will continue to pump out septic tanks or grease traps; and if so, the alternative method(s) to be used for the disposition of septage or other permitted waste following the facility closure.
 - (b) The date on which the last application will be made.
 - (c) Other information that may be requested by the LHD or the Board.
- (4) A statement shall be provided to the property owner, if other than the permit holder, indicating the date on which the last application was made and the restrictions which apply to public access, the grazing of animals, and the growing of crops, as specified in these rules.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.18 Inspections

Agents and employees of ADPH or the LHD shall be permitted access to all property on which a land application facility is proposed or on which a land application facility has been permitted for the purpose of consultation, evaluation, and/or inspection and determining compliance with these rules.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.19 Permit Revocation

The LHD or the Board may modify or revoke a permit issued under these rules for cause, to include, but not be limited to, one or more of the following:

- (1) It is determined by the LHD or the Board that the continued use of the site may cause a nuisance menacing public health.
- (2) The land application facility is being operated in violation of the requirements of these rules or to the Septage Management Plan approved under the permit.
- (3) The information submitted for approval was erroneous, or falsified by the owner, the applicant, or their respective agents.
- (4) A deficiency or violation cited by the LHD or the Board was not corrected within a specified time period.
- (5) A more viable option for the disposition of septage or other permitted waste has become available.
- (6) A sewage tank pumping permit may be suspended or revoked when the LHD determines the pumping operation is not being conducted in accordance with these rules, conditions of the permit, or is a threat to public health or the environment.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.20 Transfer of Permit

Land application permits, and sewage tank pumping permits are not transferable from one person to another or from one site or facility to another.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.21 Appeals

- (1) Permit denials, suspensions, and revocations. The denial, suspension, and/or revocation of a permit shall be governed by the Alabama Administrative Procedure Act, § 41-22-1, et seq., *Ala. Code 1975*.
 - (2) Hearings.
- (a) Contested case hearings shall be provided in accordance with the Alabama Administrative Procedure Act, §41-22-1, et seq., *Ala. Code 1975*, and the Board's Contested Case Hearing Rules, Chapter 420-1-3 *Ala. Admin. Code*.

- (b) Informal settlement conferences may be conducted as provided in the Board's Contested Case Hearing Rules.
- (3) Revocation of Permits. The State Health Officer may, after providing opportunity for hearing, revoke a permit for violations of any of the requirements of these rules.

Author: Thad Pittman.

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-

26-1; 22-26-2; 22-26-3.

History: New Rule: Filed December 17, 2020; effective February 14, 2021.

420-3-6-.22 Repealer

All rules promulgated and adopted by the Board which are in conflict with this chapter or any provisions thereof are hereby expressly repealed, including the Sewage Tank Pumping Permit provisions in Chapter 420-3-1, Onsite Sewage Treatment and Disposal.

Author: John-Paul O'Driscoll, Christie L. White, George B. Allison, and Thad Pittman

Statutory Authority: Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: Filed: September 20, 1989. Repealed. Filed: November 19, 1991. New Rule: Filed: October 20, 1994; effective November 24, 1994. Repealed and Replaced: Filed December 17, 2020, effective February 14, 2021.

420-3-6-.23 Sewage Tank Pumping Permit

- (1) A person proposing to be a sewage tank pumper shall obtain a permit issued by the LHD in the county where said sewage tank pumper operates a sewage tank pumper facility and in accordance with the requirements listed below. An LHD shall honor a permit issued by another LHD. The person shall only pay fees, as applicable, in the county in which the sewage tank pumper facility is located.
- (a) The applicant shall submit an application to the LHD on forms provided by the Department. Copies of written approvals from the disposal point authority shall be attached to the application.
 - 1. The application shall contain the following statement:
- "I agree to allow inspection of all sewage tank cleaning equipment, vehicles, implements, containers, or other devices and sites used in the collection, transportation, or disposal of sewage tank contents. I also agree to mark my vehicle(s) and sewage holding tanks in accordance with the rules governing sewage tank pumpers. I agree to keep adequate records and submit them to the LHD personnel in accordance with Rules of the State Board of Health. I understand that permit renewal is required each year between November 1 and December 31."
- (b) The LHD shall, prior to the issuance of a permit to pump sewage tanks, and as often as necessary thereafter, inspect or cause to be inspected the sewage tank cleaning equipment, implements, containers, or other devices used in the collection, removal, transportation, or disposal of septage, as well as septage disposal

sites and methods, to ensure that the above mentioned items are used, maintained, and operated in compliance with applicable provisions of these rules.

- (c) The LHD shall not issue a Sewage Tank Pumping Permit under this chapter of the rules unless an approved disposal point and method of sewage disposal are provided.
- (d) Any sewage tank pumper operating in the state, whose sewage tank pumper facility is located outside the state, shall, in coordination with the Board and the designated LHD, establish a specific fee-based county within the state of Alabama as the county of record for permitting purposes.
- (e) If the application is approved, the LHD having jurisdiction where the pumper operates a sewage tank pumper facility shall issue a permit with an identifying number on a form provided by the Department.
- (2) A vehicle used in the collection, removal, transportation, or disposal of septage shall display, in letters at least 2 inches high, and in a conspicuous place on both sides of the truck cab or carrier tank, the name and address of the firm under which the business is conducted. A valid and current Health Department decal issued by the fee-based county shall be displayed in a place to be determined by the Board. Such decals shall be issued only for those vehicles that pass Health Department inspections based on standards set forth in subparagraphs (2)-(4) of this rule.
- (a) A carrier tank aboard a vehicle used for collecting, removing, and transporting sewage shall be conspicuously and permanently labeled "FOR SEWAGE ONLY" at or near the inlet and outlet valves of the tank. The use of the carrier tank for another purpose is prohibited. The required lettering shall be a minimum of 3 inches high.
- (b) A carrier tank aboard a vehicle used for collecting, removing, and transporting grease trap waste only may use the label "Fats, Oils, and Grease" or "FOG" in lieu of "For Sewage Only."
- (c) A carrier tank used for the collection, removal, transportation, or disposal of sewage shall be fully enclosed, leak proof, fly proof, and so operated as to prevent spillage or leakage during collection, removal, transportation, and disposal. The carrier tank, when used for holding septage, shall have a minimum effective holding capacity of 1,250 gallons.
- (d) Only pumping equipment, tanks, and vehicles permitted by the LHD shall be used.
- (e) The equipment, implements, containers, or other devices used for the collection, removal, transporting, or disposal of sewage tank contents shall be maintained and operated so as to prevent unsanitary or nuisance conditions.
- (3) A person engaged in sewage tank pumping shall have facilities available for the flushing, cleaning, and deodorizing of sewage tanks, carrier tanks, and the required cleaning implements and equipment. The following practices shall be observed:
- (a) Wastewater resulting from the flushing and cleaning process shall be disposed of either by a public or private sewer system.

- (b) Odor-controlling substances may be left in the sewage tank, carrier tank, or other sewage tank cleaning implement or equipment, but in no case shall such substances be used in lieu of proper cleaning.
- (4) A sewage tank pumping contractor shall keep a complete record of facilities pumped or cleaned for a period of 3 years and shall submit such records to the LHD upon request. The LHD may suspend a sewage tank pumping contractor's permit for refusing to submit records when requested. Records shall specify the following:
 - (a) Name and 911 address of the person for whom the waste was removed.
 - (b) Date of completion of the operation.
 - (c) Size of the tank and the amount, in gallons, of the waste removed.
 - (d) Location of the disposal site.
 - (e) Method of final disposal.
- (5) Septage shall be disposed of in a manner that will protect the public health and avoid nuisance conditions. Raw sewage, such as that removed from holding tanks and portable toilets, may be disposed of by the following approved methods:
- (a) Discharged into a public sewer manhole or at an acceptable point in an ADEM-permitted sewage treatment plant, provided that the written approval of the responsible person of the governmental entity or other entity owning or operating the public sewer system or sewage treatment plant is received by the pumper prior to the use of such disposal facilities. A copy of such approval shall be provided to the LHD with the sewage tank pumping permit application;
- (b) Land applied on a site permitted by the LHD when proper application for permit is made by the owner. Such applications shall be submitted through the LHD to the Department under the provisions of this chapter; or
 - (c) Placed in a Department approved sewage tank for temporary storage.
- (6) A permitted sewage tank pumping contractor, when pumping a sewage tank, shall effectively and completely remove the liquid and solids in the tank by removing the inspection ports at both ends of the tank or the lids covering both ends of the tank, where inspection ports are not provided, and pump all compartments. The pumper shall make the access ports used in pumping watertight at the end of the pumping and shall note problems or deficiencies in the tank. If these problems are not repairs per Chapter 420-3-1, Onsite Sewage Treatment and Disposal and are maintenance, no repair permit is required. Deficiencies that are causing system failure shall be reported to the LHD and shall require a repair permit as per Chapter 420-3-1, Onsite Sewage Treatment and Disposal.

(7) A pumper of portable toilets shall meet all conditions of this rule, except that a carrier tank used exclusively for the pumping of portable toilets or marine sanitation waste may have a minimum holding capacity of less than 1,250 gallons. The sewage tank pumping contractor shall state in writing that the carrier tank is used only for the pumping of portable toilet or marine sanitation waste.

Author: Thad Pittman, Phyllis Mardis, and Lem Burell, Matthew Conner. **Statutory Authority:** Code of Ala. 1975, §§22-2-2(6); 22-10-1, et seq.; 22-20-5; 22-26-1; 22-26-2; 22-26-3.

History: New Rule: Filed December 17, 2020; effective February 14, 2021. Amended: Published July 31, 2024; effective September 14, 2024.

Table 1

Minimum Horizontal Setback Distances for Land Application Sites

Feature	Minimum Horizontal Distance (Feet)
Public/Private drinking water well	500
Surface water	500
Wetland	500
Frequent flooding area	500
Buildings used for human occupancy*	500
Public contact site	500
Water supply line	100
Property boundary**	75
Public road right-of-way	100

^{*}Exception – those buildings located on the site and/or used for the land application of septage.

^{**}Includes 50-foot vegetative buffer required in 420-3-.15(8)(a).

Table 2
Minimum Vertical Setback Distances for Land Application Sites (from Surface)

Soil Group I	36 inches
Soil Group II	24 inches
Soil Group III	18 inches
Refusal Layer	24 inches
Bedrock	24 inches

Texture – The relative proportions of the sand, silt, and clay-sized mineral particles in the fine earth fraction of the soil are referred to as soil texture. The texture of the different horizons of soils shall be classified into three general groups and 12 soil textural classes based upon the relative proportions of sand, silt, and clay-sized mineral particles.

- (A) Soil Group I Sandy Texture Soils: The sandy group includes the sand and loamy sand textural classes.
- (B) Soil Group II Coarse Loamy and Fine Loamy Texture Soils: The coarse loamy and fine loamy group includes sandy loam, loam, silt, silt loam, sandy clay loam, clay loam, and silty clay loam textural classes.
- (C) Soil Group III Clayey Texture Soils: The clayey group includes sandy clay, silty clay, and clay textural classes.

Table 3

Minimum Horizontal Setback Distances for Storage Tanks (on or off Property)

Feature	Minimum Horizontal Distance (Feet)
Public/Private drinking water well	500
Surface water	500
Wetland	500
Frequent flooding area	500
Buildings used for human occupancy*	500
Public contact site	500
Water supply line	100
Property boundary	75
Public road right-of-way	100

^{*}Exception – those buildings located on the site and/or used for the land application of septage.

Table 4

Pollutant	Annual Pollutant Loading Rate Limits (kilograms per hectare per 365-day period)	Cumulative Pollutant Loading Rate Limits (kilograms per hectare)
Arsenic	2.0	41
Cadmium	1.9	39
Chromium	150	3,000
Copper	75	1,500
Lead	15	300
Mercury	0.85	17
Nickel	21	420
Selenium	5.0	100
Zinc	140	2,800