

ENVIRONMENTAL QUALITY

CHAPTER 50

SOLID WASTE MANAGEMENT

Subchapter 14

Closure and Post-Closure Care

Rule	17.50.1401	General Provisions
	17.50.1402	Definitions
	17.50.1403	Closure Criteria
	17.50.1404	Post-closure Care Requirements
	17.50.1405	Closure and Post-closure Care Requirements for Class III Landfill Units

Subchapter 14

Closure and Post-Closure Care

17.50.1401 GENERAL PROVISIONS (1) All applicants, licensees, owners, and operators of solid waste management systems and facilities shall comply with this subchapter, except as otherwise specifically provided in this subchapter. Wherever there is a requirement imposed on an owner or operator in this subchapter, the licensee also shall comply with that requirement.

(2) Whenever a person, including an applicant or owner or operator, is required by this subchapter to submit a document for department approval of an action, the person may not take that action unless the person first submits a document containing all information necessary for the department to determine whether the action complies with the requirements of this subchapter and obtains department approval.

(3) When authorized by a court order or an agreement between the department and a landowner on whose property a violation of Title 75, chapter 10, part 2, MCA, or this subchapter has occurred, the department may act, either directly or through a third party, to physically remediate a violation of Title 75, chapter 10, part 2, MCA, or this subchapter.

(4) Whenever the department determines under this subchapter that any information, submittal, plan, factor, procedure, condition, criterion, requirement, or change is necessary to protect human health or the environment, it shall mail notification of the determination to the appropriate applicant, owner, operator, or licensee. (History: 75-10-204, MCA; IMP, 75-10-204, MCA; NEW, 2010 MAR p. 317, Eff. 2/12/10.)

17.50.1402 DEFINITIONS In this subchapter, the following definitions apply:

- (1) "Active life" has the meaning given in ARM 17.50.502.
- (2) "Class II landfill facility" has the meaning given in ARM 17.50.504.
- (3) "Class III landfill facility" has the meaning given in ARM 17.50.504.
- (4) "Class IV landfill facility" has the meaning given in ARM 17.50.504.
- (5) "Closure" has the meaning given in ARM 17.50.502.
- (6) "Department" has the meaning given in ARM 17.50.502.
- (7) "Existing," when used in conjunction with "unit" or a type of unit, has the meaning given in ARM 17.50.502.
- (8) "Facility" has the meaning given in ARM 17.50.502.
- (9) "Ground water" has the meaning given in ARM 17.50.502.
- (10) "Landfill" has the meaning given in ARM 17.50.502.
- (11) "Lateral expansion" has the meaning given in ARM 17.50.502.
- (12) "Leachate" has the meaning given in ARM 17.50.502.
- (13) "Operator" has the meaning given in ARM 17.50.502.
- (14) "Owner" has the meaning given in ARM 17.50.502.
- (15) "Post-closure care" has the meaning given in ARM 17.50.502.
- (16) "Unit" has the meaning given in ARM 17.50.502. (History: 75-10-204, MCA; IMP, 75-10-204, MCA; NEW, 2010 MAR p. 317, Eff. 2/12/10.)

17.50.1403 CLOSURE CRITERIA (1) The owner or operator of a Class II or Class IV landfill unit shall install a final cover system that is designed to minimize infiltration and erosion. The final cover system must be designed and constructed to:

(a) have a permeability no greater than to the permeability of any bottom liner system or natural subsoils present, or a permeability no greater than 1×10^{-5} cm/sec, whichever is less;

(b) minimize infiltration through the closed Class II or Class IV landfill unit by the use of an infiltration layer that contains at least 18 inches of earthen material; and

(c) minimize erosion of the final cover by the use of an erosion layer that contains at least six inches of earthen material that is capable of sustaining native plant growth.

(2) The department may approve an alternative final cover design for a Class II or Class IV landfill unit that includes:

(a) an infiltration layer that achieves a reduction in infiltration equivalent to the infiltration layer specified in (1)(a) and (b); and

(b) an erosion layer that provides protection from wind and water erosion equivalent to the erosion layer specified in (1)(c).

(3) An owner or operator of a Class II or Class IV landfill unit that disposes of 20 tons or less of solid waste per day, based on an annual average, shall comply with alternative requirements for the infiltration barrier that may be established by the department after public review and comment. An alternative requirement established under this subsection must:

(a) consider the unique characteristics of small communities;

(b) take into account climatic and hydrogeologic conditions; and

(c) protect human health and the environment.

(4) The owner or operator of a Class II or Class IV landfill unit, or a lateral expansion of an existing Class II or Class IV landfill unit, shall submit a closure plan to the department for approval that describes the steps necessary to close all Class II and Class IV landfill units and lateral expansions at the facility at any point during their active life in accordance with the cover design requirements in (1) or (2), as applicable. The closure plan must include, at a minimum, the following information:

(a) a description of the final cover, designed in accordance with (1), and the methods and procedures to be used to install the cover;

(b) an estimate of the largest area of the Class II or Class IV landfill unit ever requiring a final cover, as required under (1), at any time during the active life of the unit;

(c) an estimate of the maximum inventory of wastes ever on-site over the active life of the landfill facility; and

(d) a schedule for completing all activities necessary to satisfy the closure criteria in this rule.

(5) For all closure construction, the owner or operator shall submit for department approval plans, specifications, reports, and certifications, to the same extent as required in ARM 17.50.1205.

(6) The owner or operator shall notify the department that a closure plan has been prepared and placed in the operating record no later than February 12, 2010, or by the initial receipt of waste, whichever is later.

(7) Prior to beginning closure of each Class II or Class IV landfill unit as specified in (8), an owner or operator of a facility shall submit to the department a notice of the intent to close the unit and place the notice in the operating record.

(8) The owner or operator of a Class II or Class IV landfill unit shall begin closure activities of that unit no later than 30 days after the date on which the unit receives the known final receipt of wastes or, if the unit has remaining capacity and there is a reasonable likelihood that the unit will receive additional wastes, no later than one year after the most recent receipt of wastes. Extensions beyond the one-year deadline for beginning closure may be granted by the department if the owner or operator demonstrates that the unit has the capacity to receive additional wastes and the owner or operator has taken, and will continue to take, all steps necessary to prevent threats to human health and the environment from the unclosed unit.

(9) The owner or operator of a Class II or Class IV landfill unit shall complete closure activities of the unit in accordance with the closure plan within 180 days following the beginning of closure, as specified in (8). Extensions of the closure period may be granted by the department if the owner or operator demonstrates that closure will, of necessity, take longer than 180 days and that the owner or operator has taken, and will continue to take, all steps to prevent threats to human health and the environment from the unclosed unit.

(10) Following closure of a Class II or Class IV landfill unit, the owner or operator shall notify the department that a certification, signed by an independent licensed professional engineer, verifying that closure has been completed in accordance with the closure plan, has been placed in the operating record. A unit is not considered closed until the department has conducted an inspection and approved the certification.

(11) The owner or operator may request permission from the department to remove the notation from the deed if all wastes have been removed from the facility. (History: 75-10-204, MCA; IMP, 75-10-204, MCA; NEW, 2010 MAR p. 317, Eff. 2/12/10.)

17.50.1404 POST-CLOSURE CARE REQUIREMENTS (1) Following closure of a Class II or Class IV landfill unit, the owner or operator shall conduct post-closure care. Post-closure care must be conducted for 30 years, except as provided under (2), and consist of at least the following:

(a) maintaining the integrity and effectiveness of any final cover, including making repairs to the cover as necessary to correct the effects of settlement, subsidence, erosion, or other events, and preventing run-on and run-off from eroding or otherwise damaging the final cover;

(b) maintaining and operating the leachate collection and removal system in accordance with the requirements in ARM 17.50.1204, if applicable. The department may allow the owner or operator to stop managing leachate if the owner or operator submits to the department for approval a demonstration that leachate no longer poses a threat to human health and the environment;

(c) monitoring the ground water in accordance with the requirements of ARM Title 17, chapter 50, subchapter 13, and maintaining the ground water monitoring system, if applicable; and

(d) maintaining and operating the gas monitoring system in accordance with the requirements of ARM 17.50.1106.

(2) The length of the post-closure care period may be:

(a) decreased by the department if the owner or operator demonstrates that the reduced period is sufficient to protect human health and the environment and this demonstration is approved by the department; or

(b) increased by the department if the department determines that the lengthened period is necessary to protect human health and the environment.

(3) The owner or operator of a Class II or Class IV landfill unit shall submit a post-closure plan to the department for approval that includes, at a minimum, the following information:

(a) a description of the monitoring and maintenance activities required in (1) for each Class II or Class IV landfill unit, and the frequency at which these activities will be performed;

(b) the name, address, and telephone number of the person or office to contact about the facility during the post-closure period; and

(c) a description of the planned uses of the property during the post-closure period. Post-closure use of the property may not disturb the integrity of a final cover, liner, or a component of the containment system, or the function of the monitoring systems, unless necessary to comply with the requirements in ARM Title 17, chapter 50, subchapters 5 through 14. The department may approve any other disturbance if the owner or operator submits to the department for approval a demonstration that disturbance of a final cover, liner, or other component of the containment system, including any removal of waste, will not increase the potential threat to human health or the environment.

(4) No later than the initial receipt of waste, the owner or operator shall notify the department that a post-closure plan has been prepared and placed in the operating record.

(5) Following completion of the post-closure care period for each Class II or Class IV landfill unit, the owner or operator shall notify the department that a certification, signed by an independent licensed professional engineer, verifying that post-closure care has been completed in accordance with the post-closure plan, has been placed in the operating record. The post-closure care period is not considered complete until the department has approved a certification submitted under this subsection.

(6) The owner or operator of a facility containing a Class II or Class IV landfill unit shall amend the closure or post-closure plan whenever changes in the operation and maintenance plan or facility design plan or events occur during the active life of the landfill that significantly affect the closure or post-closure plan. The owner or operator also shall amend the closure or post-closure plan whenever there is a change in the expected year of closure. The owner or operator shall submit the necessary closure or post-closure plan amendments to the department for approval within 60 days after such changes occur or within a shorter period if determined by the department to be necessary to protect human health or the environment.

(7) For all post-closure construction at a Class II or Class IV landfill unit, the owner or operator of a facility shall submit for department approval plans, specifications, reports, and certifications to the same extent as required in ARM 17.50.1205.

(8) During the post-closure care period the owner or operator of a facility containing a Class II or Class IV landfill unit shall:

- (a) maintain adequate vegetative cover, as specified in the closure plan;
- (b) maintain and operate all corrective action systems pursuant to ARM Title 17, chapter 50, subchapter 13;
- (c) annually inspect and submit to the department a report on the condition of all landfill systems; and
- (d) comply with any other post-closure care requirements determined by the department to be necessary to protect human health or the environment. (History: 75-10-204, MCA; IMP, 75-10-204, MCA; NEW, 2010 MAR p. 317, Eff. 2/12/10.)

17.50.1405 CLOSURE AND POST-CLOSURE CARE REQUIREMENTS

FOR CLASS III LANDFILL UNITS (1) A Class III landfill unit closure plan required under ARM 17.50.508 must include, at a minimum:

- (a) procedures for construction of two feet of final cover and placement of six inches of top soil;
- (b) procedures for grading and seeding to prevent erosion; and
- (c) the deed notation specified in ARM 17.50.1113, unless all wastes are removed from the landfill unit and the owner or operator of a facility receives approval from the department to remove the notation from the deed.

(2) A Class III landfill unit post-closure plan required under ARM 17.50.508 must include, at a minimum, descriptions of procedures for:

- (a) maintaining the integrity of the final cover;
- (b) maintaining adequate vegetative cover; and
- (c) erosion control.

(3) The owner or operator of an existing Class III landfill unit shall submit for department approval closure and post-closure plans that meet the requirements of this rule by April 13, 2010.

(4) The owner or operator of a Class III landfill unit shall give notice of intent to close the landfill to the same extent as required of a Class II landfill unit in ARM 17.50.1115, and shall close the landfill and conduct post-closure care in compliance with the closure and post-closure plans required in this rule. (History: 75-10-204, MCA; IMP, 75-10-204, MCA; NEW, 2010 MAR p. 317, Eff. 2/12/10.)

