

ENVIRONMENTAL QUALITY

CHAPTER 24

RECLAMATION

Subchapter 5

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Backfilling and Grading Requirements

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Subchapter 5

Strip and Underground Mine Reclamation Act:
Backfilling and Grading Requirements17.24.501 GENERAL BACKFILLING AND GRADING REQUIREMENTS

- (1) Backfilling and grading of the disturbed area must be completed prior to removal of necessary reclamation equipment from the area of operation.
- (2) Overburden and parting materials which are not conducive to revegetation techniques, establishment, and growth must not be left on the top nor within eight feet of the top of regraded spoils nor at the surface of any other affected areas, unless the applicant demonstrates to the department's satisfaction that a lesser depth will provide for reclamation consistent with the Act. The department may require that problem materials be placed at a greater depth.
- (3)(a) Backfilled material must be placed to minimize erosion and sedimentation of undisturbed and reclaimed areas both on and offsite, water pollution, adverse effects on ground water, other offsite effects, and to support the approved postmining land use.
- (b) Backfilled materials must be selectively placed and compacted wherever necessary to prevent leaching of acid, acid-forming toxic, or toxic-forming materials into surface or subsurface waters and wherever necessary to ensure the stability of the backfilled materials. The method and design specifications for placing and compacting such materials must be approved by the department.
- (4) All final grading on the area of land affected must be to the approximate original contour of the land in accordance with 82-4-232(1), MCA.
 - (a) The operator shall transport, backfill, and compact to ensure compliance with (3)(b) and ARM 17.24.505, and grade all spoil material as necessary to achieve the approximate original contour. Highwalls must be reduced or backfilled in compliance with ARM 17.24.515(1), or reclaimed using approved highwall reduction alternatives in compliance with ARM 17.24.515(2).
 - (b) Cut-and-fill terraces may be used only in those situations expressly identified in and in compliance with ARM 17.24.502.
 - (c) The postmining graded slopes must approximate the premining natural slopes in the area.
 - (d) Depressions must be eliminated, except as provided in ARM 17.24.503(1).
- (5) The disturbed area must be blended with surrounding and undisturbed ground to provide a smooth transition in topography.

(6) Backfilling and grading must be kept current with mining operations. To be considered current, backfilling and grading must meet the following requirements, unless otherwise approved by the department upon adequate written justification and documentation provided by the operator:

(a) On lands affected by area strip mining, there must not be more than four consecutive spoil ridges present in any location.

(b) Backfilling and grading must be completed within two years after coal removal from each pit has been concluded. For the purpose of this provision, "each pit" means any continuous dragline pass within a particular permit area.

(c) Backfilling and grading of other excavations must be kept current as departmental directives dictate for each set of field circumstances.

(d) All backfilling and grading must achieve the approved postmining topography.

(7) The operator shall notify the department, in writing, upon detection of grading problems that would result in topography not consistent with the approved postmine topography. (History: 82-4-204, 82-4-231, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1990 MAR p. 936, Eff. 5/18/90; TRANS, from DSL, 1996 MAR p. 2852; AMD, 1999 MAR p. 811, Eff. 4/23/99; AMD, 2004 MAR p. 2548, Eff. 10/22/04; AMD, 2012 MAR p. 737, Eff. 4/13/12.)

17.24.501A FINAL GRADING REQUIREMENTS (REPEALED) (History: 82-4-204, MCA; IMP, 82-4-231, 82-4-232, 82-4-234, MCA; NEW, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1994 MAR p. 2957, Eff. 11/11/94; TRANS, from DSL, 1996 MAR p. 3042; REP, 1999 MAR p. 811, Eff. 4/23/99.)

17.24.502 CUT-AND-FILL TERRACES On approval by the department, in order to conserve soil moisture, ensure stability, and control erosion on final graded slopes, cut-and-fill terraces may be allowed if the terraces are compatible with the approved postmining land use and are appropriate substitutes for construction of lower grades on the reclaimed lands. The terraces must meet the following requirements:

(1) The width of the individual terrace bench may not exceed 20 feet, unless specifically approved by the department as necessary for stability, erosion control, or roads included in the approved postmining land use plan.

(2) The vertical distance between terraces must be as specified by the department to prevent excessive erosion and to provide long-term stability.

(3) The slope of the terrace outslopes may not exceed 1v:5h (20 percent). Outslopes that exceed 1v:5h may be approved, if they have a minimum safety factor of more than 1.3 for any condition of load likely to be encountered, provide adequate control over erosion, and closely resemble the surface configuration of the land prior to mining. In no case may highwalls be left as part of terraces.

(4) Culverts and underground rock drains must be used in the terrace only when approved by the department.

(5) Terraces must be installed in such a way so as not to prohibit vehicular access or revegetation procedures.

(6) Additional surface manipulation procedures must be installed as required by the department. (History: 82-4-204, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.503 SMALL DEPRESSIONS (1) The requirement to achieve approximate original contour does not prohibit construction of small depressions if they are approved by the department to minimize erosion, conserve soil moisture, or promote vegetation or wildlife use. These depressions must be compatible with the approved postmining land use and may not restrict normal access throughout the area or constitute a hazard. Large, permanent impoundments are governed by ARM 17.24.504 and 17.24.642. (History: 82-4-204, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042; AMD, 1999 MAR p. 811, Eff. 4/23/99.)

17.24.504 PERMANENT IMPOUNDMENTS (1) Permanent impoundments meeting the requirements of ARM 17.24.642 may be retained in mined and reclaimed areas, provided all highwalls are eliminated by grading to appropriate contours and the provisions for postmining land use and protection of the hydrologic balance are met. No impoundments may be constructed on top of areas in which excess materials are deposited pursuant to the provisions of ARM 17.24.520. (History: 82-4-204, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.505 BURIAL AND TREATMENT OF EXPOSED MINERAL SEAMS AND WASTE MATERIALS (1) All exposed mineral seams remaining after mining must be covered with a minimum of four feet of the best available non-toxic and non-combustible material, unless otherwise approved by the department upon demonstration by the operator that a lesser cover depth will afford the same protection against combustion and other undesirable properties or effects of the mineral seam.

(2) Acid, acid-forming, toxic, toxic-forming, combustible, or other undesirable waste materials or fly ash identified by the department that are exposed, used, or produced during mining or mineral preparation must be covered in accordance with ARM 17.24.501(2) with the best available nontoxic and noncombustible material. The method and site of final disposal must be approved by the department. If necessary, these materials must be tested to determine necessary mitigations to neutralize acidity, to nullify toxicity, to prevent water pollution and sustained combustion, or to minimize adverse effects on plant growth and land uses. If necessary to protect against upward migration of salts or exposure by erosion, to provide an adequate depth for plant growth or to otherwise meet local conditions, the department may specify thicker amounts of cover using non-combustible and non-toxic material or the use of special compaction and isolation techniques to prevent contact of these materials with ground water. Acid, acid-forming, toxic, toxic-forming or other deleterious materials must not be buried or stored in proximity to a drainage course so as to cause or pose a threat of water pollution.

(3) Wastes must not be used in the construction of embankments for impoundments.

(4) Wastes from a strip mine may not be disposed of in a waste disposal structure that is located on the surface of the ground.

(5) Whenever waste is temporarily impounded:

(a) the impoundment must be designed and certified, constructed, and maintained:

(i) in accordance with ARM 17.24.603, 17.24.639, and 17.24.642, using current prudent-design standards; and

(ii) for structures meeting the criteria of 30 CFR 77.216(a), to safely discharge the six-hour, probable maximum precipitation (PMP) or greater event;

(b) the impoundment must be designed, and when operational must be managed, so that at least 90 percent of the water stored during the design precipitation event can be and is removed within the ten-day period following the event;

(c) spillways and outlet works for coal impounding structures must be designed to provide adequate protection against erosion and corrosion;

(d) inlets must be protected against blockage; and

(e) the impoundment may not include acid, acid-forming, toxic, or toxic-forming waste.

(6) Coal waste impoundments must not be retained as a part of the approved postmining land use.

(7) If any examination or inspection discloses that a potential hazard exists at a waste disposal site, including a temporary waste impoundment, the department must be informed promptly of the finding and of the emergency procedures formulated for public protection and remedial action. If adequate procedures cannot be formulated or implemented, the department must be notified immediately. The department shall then notify the appropriate agencies that other emergency procedures are required to protect the public.

(8) Wastes may be disposed of in underground mine workings, but only in accordance with a plan approved by the department and mine safety and health administration under ARM 17.24.901(1)(e) through (g), and (2). (History: 82-4-204, 82-4-205, MCA; IMP, 82-4-231, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1994 MAR p. 2957, Eff. 11/11/94; TRANS, from DSL, 1996 MAR p. 3042; AMD, 1999 MAR p. 811, Eff. 4/23/99.)

Rule 17.24.506 reserved

17.24.507 STORAGE AND FINAL DISPOSAL OF GARBAGE AND OTHER DEBRIS (1) Garbage and other debris including, but not limited to, grease, lubricants, paints, flammable liquids, trash, abandoned mining machinery, lumber and other combustibles generated during mining activities must be placed and stored or disposed of in a controlled manner in a designated portion of the permit area.

(a) Placement, storage, and disposal must ensure that leachate and surface runoff do not degrade surface or ground water, that fires are prevented and that the area remains stable and suitable for reclamation and revegetation compatible with the natural surroundings.

(b) All disposal sites must be routinely compacted, and suitable earth materials must be placed over garbage and other debris to a thickness in accordance with ARM 17.24.501(2).

(2) At no time may any garbage or other debris be deposited at impoundment sites, nor may any excavation for solid garbage or debris disposal be located within 8 feet of any coal outcrop or coal storage area.

(3) Municipal garbage may not be deposited within a permit area unless compliance with this rule and ARM 17.24.510 is demonstrated.

(4) Notwithstanding any provision of this subchapter, any garbage or other debris meeting the definition of "hazardous" as found in section 3001 of PL 94-580, as amended, must be handled in accordance with PL 94-580 and regulations adopted thereunder. (History: 82-4-204, MCA; IMP, 82-4-231, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 2852; AMD, 1999 MAR p. 811, Eff. 4/23/99.)

Rules 17.24.508 and 17.24.509 reserved

17.24.510 DISPOSAL OF OFFSITE-GENERATED WASTE AND FLY ASH

(1) Before waste materials or fly ash from a coal preparation or conversion facility or from other activities conducted outside the permit area such as municipal waste collection may be used for fill material or other purpose or disposed of on the mine site, the permittee shall demonstrate to the department by hydrogeological means, chemical and physical analyses, and the disposal procedures that use and disposal of these materials will be conducted in accordance with ARM 17.24.505, 17.24.631, 17.24.643, 17.24.702, 17.24.711, and any other applicable provision of the Act and pursuant rules, will not adversely affect water quality, public health or safety, or other environmental resources, and will not cause instability in the backfilled area. The operator may not use such waste or fly ash for fill or other purpose or dispose of such material on the permit area without prior approval by the department.

(2) Notwithstanding any provision of this subchapter, any waste materials meeting the definition of "hazardous" as found in section 3001 of PL 94-580, as amended, must be handled in accordance with PL 94-580 and regulations adopted thereunder. (History: 82-4-204, 82-4-205, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 2852; AMD, 1999 MAR p. 811, Eff. 4/23/99.)

Rules 17.24.511 through 17.24.513 reserved

17.24.514 CONTOURING (REPEALED) (History: 82-4-204, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042; REP, 1999 MAR p. 811, Eff. 4/23/99.)

17.24.515 HIGHWALL REDUCTION (1) Highwalls must be eliminated and the reduced highwall slope must be no greater than whatever slope is necessary to achieve a minimum long-term static safety factor of 1.3. The department may specify a lesser slope whenever necessary to achieve postmining slope stability. Highwall reduction must be commenced at or beyond the top of the highwall and sloped to the graded spoil bank.

(2) Highwall reduction alternatives may be permitted only to replace bluff features that existed before mining and where the department determines that:

- (a) postmining bluffs are compatible with the proposed postmining land use;
- (b) postmining bluffs are stable, achieving a minimum long-term static safety factor of 1.3;
- (c) similar geometry and function exists between pre- and postmining bluffs;
- (d) the horizontal linear extent of postmining bluffs does not exceed that of the premining condition; and

(e) highwalls will be backfilled to the extent that the uppermost mineable coal seam is buried in accordance with ARM 17.24.505(1). (History: 82-4-204, 82-4-231, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042; AMD, 2004 MAR p. 2548, Eff. 10/22/04.)

17.24.516 ADJACENT STRIP AND UNDERGROUND MINING OPERATIONS (1) An operator who conducts a strip or underground mining operation adjacent to any active or abandoned underground mining operation, must comply with the following:

(a) A 500-foot barrier pillar of coal must be maintained between the strip and underground mining operations in any one seam. The department, the mine safety and health administration, and the Montana division of worker's compensation of the department of labor and industry, however, may approve a lesser distance after a finding by the department that mining at a lesser distance will result in:

- (i) improved coal resources recovery;
- (ii) abatement of water pollution; or
- (iii) elimination of hazards to the health and safety of the public.

(b) The vertical distance between strip and underground mining operations working separate seams must be sufficient to provide for the health and safety of the workers and to prevent surface water from entering the underground workings.

(2) The operator must also comply with ARM 17.24.632. (History: 82-4-204, MCA; IMP, 82-4-227, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.517 SLIDES AND OTHER DAMAGE (1) An undisturbed natural barrier, as approved by the department, must be provided beginning at the elevation of the lowest coal seam to be mined and extending from the outslope for such distance as may be determined by the department as is needed to assure stability. The barrier must be retained in place as needed to prevent slides and erosion.

(2) Whenever a slide that may have a potential adverse effect on public property, health, safety, or the environment occurs, the person who conducts the strip or underground mining activities shall notify the department by the fastest available means and comply with any remedial measures required by the department. (History: 82-4-204, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.518 BUFFER ZONES (1) All mining activities, including highwall reduction and related reclamation, must cease at least 100 feet from a property line, permanent structure, unmineable or unreclaimable steep or precipitous terrain, or any area determined by the department to be of unique scenic, historical, cultural, or other unique value. If special values or problems are encountered, the department may modify buffer zone requirements. (History: 82-4-204, MCA; IMP, 82-4-227, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042; AMD, 1999 MAR p. 2768, Eff. 12/3/99.)

17.24.519 MONITORING FOR SETTLEMENT (1) The department may require the operator to monitor settling of regraded areas. The results of these studies may be used to alter reclamation, spoiling and grading techniques to alleviate uneven settling problems on future areas to be mined. (History: 82-4-205, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.519A THICK OVERBURDEN AND EXCESS SPOIL (REPEALED)
(History: 82-4-204, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1989 MAR p. 399, Eff. 1/13/89; AMD, 1994 MAR p. 2957, Eff. 11/11/94; TRANS, from DSL, 1996 MAR p. 3042; REP, 1999 MAR p. 811, Eff. 4/23/99.)

17.24.520 THICK OVERBURDEN AND DISPOSAL OF EXCESS SPOIL

(1) Thick overburden occurs where the final spoil thickness exceeds 1.2 times the sum of the overburden thickness and mineral thickness for the entire area to be mined in the permit area. Final spoil thickness is the product of the overburden thickness times the swell factor, which is also to be determined for the entire area to be mined in the permit area.

(2) Where thick overburden is encountered, and if the operator wishes to dispose of excess spoil outside of the mined area, the operator shall demonstrate that the volume of spoil and available waste materials is more than sufficient to restore the disturbed area to the approximate original contour. In this case, highwall elimination must be achieved by backfilling with spoils and waste materials. Any excess spoil material must be disposed of in accordance with the requirements of this rule as well as all other rules.

(3) Spoil not required to achieve the approximate original contour may be transported to and placed in a controlled (engineered) manner in a disposal area other than the mine workings or excavations. All of the following conditions, in addition to the other requirements of the Act and this subchapter, must be met:

(a) The disposal area must be within the permit area, and it must be approved by the department as suitable for construction of fills and for reclamation and revegetation compatible with the natural surroundings.

(b) The disposal area must be located on the most moderately sloping and naturally stable areas available as approved by the department. Fill materials suitable for disposal must be placed upon or above a natural terrace, bench, or berm if such placement provides additional stability and prevents mass movement.

(c) The fill must be designed using recognized professional standards, certified by a licensed professional engineer, experienced in the design of earth and rock fills, to ensure stability and meet other applicable requirements of this subchapter, and approved by the department.

(d) Leachate and surface runoff from the fill must not degrade surface or ground waters or exceed the effluent limitations of ARM 17.24.633.

(e) The disposal area must not contain springs, natural water courses, or wet weather seeps unless lateral drains are constructed from the wet areas to excess spoil underdrains in such a manner that infiltration of the water into the spoil pile will be prevented.

(f) Underdrains must consist of durable rock or pipe, be designed and constructed using current, prudent engineering practices, and approved by the department. The underdrain system must be designed to carry the anticipated seepage of water due to rainfall away from the excess spoil fill and from seeps and springs in the foundation of the disposal area and must be protected from piping and contamination by an adequate filter. Rock underdrains must be constructed of durable, nonacid-, nontoxic-forming rock (e.g., natural sand and gravel, sandstone, limestone, or other durable rock) that does not slake in water or degrade to soil-like material, and which is free of coal, clay or other nondurable material. Perforated pipe underdrains must be corrosion resistant and must have characteristics consistent with the long-term life of the fill.

(g) All organic material must be removed from the disposal area, and the soil must be removed, segregated, and redistributed or stockpiled according to the provisions of ARM 17.24.701 through 17.24.703, before the excess spoil material is placed in the disposal area. However, if approved by the department, organic material may be used as mulch or may be included in the soil.

(h) Slope protection must be provided to minimize surface erosion at the site. Diversion design must conform with the requirements of ARM 17.24.635 through 17.24.637. All disturbed areas, including diversion ditches that are not riprapped, must be vegetated upon completion of construction.

(i) The spoil must be transported and placed in a controlled manner, in horizontal lifts not exceeding four feet in thickness, concurrently compacted as necessary to ensure mass stability and prevent mass movement, covered, and graded to allow surface and subsurface drainage to be compatible with the natural surroundings and to ensure a long-term static safety factor of 1.5. Horizontal lifts exceeding four feet in thickness may be allowed if the design ensures stability, is certified by a licensed professional engineer, and is approved by the department. The final configuration of the fill must be suitable for postmining land uses except that no depressions or impoundments may be allowed on the completed fill. Terraces must not be constructed unless approved by the department to prevent erosion and ensure stability.

(j) The fill must be inspected for stability at least quarterly by the licensed engineer or other qualified professional specialist under the direction of a licensed engineer. The engineer or specialist must be experienced in the construction of similar earth and water structures. The above-described inspections must be made during critical construction periods to assure removal of all organic material and soil, placement of underdrainage and surface drainage systems, and proper placement and compaction of fill materials, and revegetation. The permittee shall provide a report by the licensed engineer or other qualified professional specialist within two weeks after each inspection. The report must certify that the fill has been constructed as specified in the design approved by the department. A copy of the report must be retained at the mine site.

(i) "Critical construction periods" include, at a minimum:

(A) foundation preparation, including the removal of all organic material and soil;

(B) placement of underdrains and protective filter systems;

(C) installation of final surface drainage systems; and

(D) the final graded and revegetated fill. Regular inspections by the engineer or specialist must also be conducted during placement and compaction of fill materials.

(ii) The qualified licensed professional engineer shall promptly provide to the department a certified report discussing whether the fill has been constructed and maintained as designed and in accordance with the approved plan and this subchapter. The report must address indications of instability, structural weakness, and other hazardous conditions.

(iii)(A) The certified report on the drainage system and protective filters must include color photographs taken during and after construction, but before underdrains are covered with excess spoil. If the underdrain system is constructed in phases, each phase must be certified separately.

(B) Whenever excess durable rock spoil is placed in single or multiple lifts such that the underdrain system is constructed simultaneously with excess spoil placement by the natural segregation of dumped materials, in accordance with (3)(j)(iv), color photographs of the underdrain must be taken as the underdrain system is being formed.

(C) The photographs accompanying each certified report must be taken in adequate size and number with enough terrain or other physical features of the site shown to provide a relative scale to the photographs and to specifically and clearly identify the site.

(iv) The department may approve the alternative method of disposal of excess durable rock spoil by gravity placement in single or multiple lifts, whenever the following additional conditions are met:

(A) the excess spoil must consist of at least 80% nontoxic-forming rock that does not slake in water and will not degrade to unconsolidated soil-like material. Whenever used, noncemented clay shale, clay spoil, unconsolidated or other nondurable excess spoil materials must be mixed with excess durable rock spoil in a controlled manner so that no more than 20% of the fill volume, as determined by tests performed by a licensed engineer and approved by the department, is not durable rock;

(B) an earthquake safety factor of at least 1.1 must be used; and

(C) surface water runoff from areas adjacent to and above the fill must not be allowed to flow onto the fill and must be diverted into stabilized diversion channels designed to meet the requirements of ARM 17.24.635 and 17.24.637 and to safely pass the runoff from a 100-year, 24-hour precipitation event.

(k) Coal mine wastes and coal processing wastes may not be disposed of in excess spoil fills and may be disposed of in the mine excavations only upon the prior approval of the department. See ARM 17.24.505 and 17.24.510.

(l) The foundation and abutments of the fill must be stable under all conditions of construction and operation. Sufficient foundation investigation and laboratory testing of foundation materials must include the effect of underground mine workings, if any, upon the stability of the structure.

(m) Excess spoil, coal mine wastes and coal processing wastes may be returned to underground mine workings, but only in accordance with a disposal program approved by the department and the mine safety and health administration upon the basis of a plan submitted under ARM 17.24.901(1)(b), 17.24.920, 17.24.924(1), 17.24.930, and 17.24.932(1).

(n) Excess spoil must not be disposed of in valley fills or head-of-hollow fills.

(o) To achieve approximate original contour, the department may require that a spoil pile, or part thereof, be retained in an unreclaimed condition to be returned to the mine workings at a later date. (History: 82-4-204, MCA; IMP, 82-4-231, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1990 MAR p. 936, Eff. 5/18/90; TRANS, from DSL, 1996 MAR p. 3042; AMD, 1999 MAR p. 811, Eff. 4/23/99; AMD, 1999 MAR p. 2768, Eff. 12/3/99; AMD, 2004 MAR p. 2548, Eff. 10/22/04.)

17.24.521 TEMPORARY CESSATION OF OPERATIONS (1) Each operator shall effectively secure surface facilities in areas in which there are no current operations, but in which operations are to be resumed under an approved permit. Temporary cessation does not relieve an operator of his obligation to comply with the provisions of the approved permit.

(2) Before temporary cessation of mining and reclamation operations extends for a period of 30 days or more, or as soon as it is known that a temporary cessation will extend beyond 30 days, an operator shall submit to the department a notice of intention to temporarily cease mining and reclamation operations. This notice must include a statement of the exact number of acres that will have been affected in the permit area, prior to such temporary cessation; the extent and kind of reclamation of those areas that will have been accomplished; and identification of the backfilling, regrading, revegetation, environmental monitoring, and water treatment activities that will continue during the temporary cessation. (History: 82-4-204, 82-4-205, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042.)

17.24.522 PERMANENT CESSATION OF OPERATIONS (1) An operator who permanently ceases strip or underground mining operations in all or part of the permit area, shall close or backfill and otherwise permanently reclaim all affected areas, in accordance with the Act, rules adopted thereunder, and the permit as approved by the department. This must occur regardless of whether the permit has expired, or has been revoked or suspended.

(2) All surface and underground openings, equipment, structures, or other facilities not required for monitoring, unless approved by the department as suitable for the postmining land use or environmental monitoring, must be removed and the affected land reclaimed.

(3) Equipment needed for reclamation may not be removed from the mine until reclamation is complete. (History: 82-4-204, MCA; IMP, 82-4-231, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1990 MAR p. 936, Eff. 5/18/90; TRANS, from DSL, 1996 MAR p. 3042; AMD, 1999 MAR p. 811, Eff. 4/23/99; AMD, 2004 MAR p. 2548, Eff. 10/22/04.)

17.24.523 COAL FIRES AND COAL CONSERVATION (1) Coal fires in coal processing wastes, storage piles and bins, or unmined or waste coal in mine pits must be extinguished by the operator in accordance with a plan approved by the department and the mine safety and health administration. The plan must contain, at a minimum, provisions to ensure that only those persons authorized by the operator and who have an understanding of the procedures to be used are involved in the extinguishing operations.

(2) Strip or underground mining operation must be conducted to prevent failure to conserve coal, utilizing the best technology currently available to maintain appropriate environmental protection. The operator shall adhere to the approved coal conservation plan required in ARM 17.24.322. (History: 82-4-204, MCA; IMP, 82-4-232, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; TRANS, from DSL, 1996 MAR p. 3042; AMD, 2004 MAR p. 2548, Eff. 10/22/04.)

17.24.524 SIGNS AND MARKERS (1) All signs required to be posted by the operator must be of a standard design throughout the operation that can be seen and read easily and must be made of durable material. Signs must not be placed where their visibility is reduced by parked vehicles, splashed mud, or other causes. The signs and other markers must be maintained during all operations to which they pertain and must conform to local ordinances and codes, where applicable.

(2) Signs identifying the mine area must be displayed at all points of access to the permit area from public roads and highways. Signs must show the name, business address and telephone number of the permittee, identification numbers of current mining and reclamation permits and the mine safety and health administration identification number for the site, and, where the operation is conducted for the permittee by a contractor, the name, business address and telephone number of the person who conducts the mining activities. Such signs must not be removed until after release of all bonds.

(3) The perimeter of the permit area must be clearly marked by durable and easily recognized markers or by other means approved by the department. Each marker must be visible from each adjacent marker, or markers must be joined by fencing or other durable means approved by the department. Such markers must be designed so that their visibility will not be reduced in general by operation of equipment, weather effects, and other normally occurring effects. The markers must be in place before the start of any mining activities.

(4) Buffer zones as defined in ARM 17.24.518 may or may not be included within the permit area. If included within the permit area, the boundaries of buffer zones must be marked separately and distinctly from perimeter markers wherever the boundaries of both do not coincide. Wherever the boundaries do coincide, only perimeter markers are necessary as described in (3).

(5) If blasting is necessary to conduct surface coal mining operations, signs reading "Blasting Area" must be displayed conspicuously along the edge of any blasting area that comes within 50 feet of any road within the permit area, or within 100 feet of any public road right-of-way. The operator shall also:

(a) conspicuously flag, or post within the blasting area, the immediate vicinity of charged holes; and

(b) place at all entrances to the permit area from public roads or highways conspicuous signs that state "Warning! Explosives in Use", and that clearly explain the blast warning and all clear signals in use and explain the marking of blast areas.

(6) Where soil or other vegetation-supporting material is segregated and stockpiled, the stockpiled materials must be clearly marked. Markers must remain in place until the material is removed. (History: 82-4-204, 82-4-205, MCA; IMP, 82-4-231, MCA; NEW, 1980 MAR p. 725, Eff. 4/1/80; AMD, 1989 MAR p. 30, Eff. 1/13/89; AMD, 1994 MAR p. 2957, Eff. 11/11/94; TRANS, from DSL, 1996 MAR p. 3042.)

