

## Ohio Administrative Code

Rule 1501:13-10-01 Roads: performance standards.

Effective: January 17, 2016

- (A) Road classification system.
- (1) Each road shall be classified as either a primary road or a secondary road.
- (2) A "primary road" is any road which is:
- (a) Used for transporting coal or spoil;
- (b) Frequently used for access or other purposes for a period in excess of six months; or
- (c) To be retained for an approved postmining land use.
- (3) A "secondary road" is any road not classified as a primary road.
- (B) Performance standards. Primary and secondary roads shall be located, designed, constructed, reconstructed, used, maintained and reclaimed so as to:
- (1) Control or prevent erosion, siltation and the air pollution attendant to erosion, including road dust as well as dust occurring on other exposed surfaces, by measures such as vegetating or otherwise stabilizing all exposed surfaces in accordance with current, prudent engineering practices;
- (2) Control or prevent damage to fish, wildlife, or their habitat and related environmental values;
- (3) Control or prevent additional contributions of suspended solids to stream flow or runoff outside the permit area;
- (4) Neither cause nor contribute to, directly or indirectly, the violation of state or federal water quality standards applicable to receiving waters;

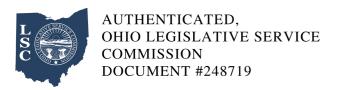


- (5) Minimize the diminution to or degradation of the quality or quantity of surface- and ground-water systems;
- (6) Refrain from significantly altering the normal flow of water in streambeds or drainage channels;
- (7) Prevent or control damage to public or private property; and
- (8) Use nonacid- or nontoxic-forming substances in road surfacing.
- (C) Design and construction limits and establishment of design criteria. To ensure environmental protection and safety appropriate for their planned duration and use, including consideration of the type and size of equipment used, the design and construction or reconstruction of roads shall incorporate appropriate limits for grade, width, surface materials, surface drainage control, culvert placement, culvert size, and any necessary design criteria established by the chief.
- (D) Location.
- (1) No part of any road shall be located in the channel of an intermittent or perennial stream unless specifically approved by the chief in accordance with paragraphs (A), (B), (E), (F), (J), (K) and (M) of rule 1501:13-9-04 of the Administrative Code.
- (2) Roads shall be located to minimize downstream sedimentation and flooding.
- (E) Maintenance.
- (1) A road shall be maintained throughout the life of the permit to meet the performance standards of this rule and any additional criteria specified by the chief.
- (2) A road damaged by a catastrophic event, such as a flood or earthquake, shall be repaired as soon as practical after the damage has occurred.
- (F) Reclamation. A road not to be retained for use under an approved postmining land use shall be



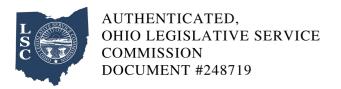
reclaimed immediately after it is no longer needed for mining and reclamation operations, including:

- (1) Closing the road to traffic;
- (2) Removing all bridges and culverts;
- (3) Restoring the natural drainage patterns;
- (4) Reshaping all cut and fill slopes to be compatible with the postmining land use and to complement the drainage pattern of the surrounding terrain;
- (5) Scarifying or ripping the road bed, replacing topsoil and revegetating disturbed surfaces in accordance with rules 1501:13-9-03 and 1501:13-9-15 of the Administrative Code; and
- (6) Removing or otherwise disposing of road-surfacing materials that interfere with the postmining land use.
- (G) Primary roads. In addition to paragraphs (A) to (F) of this rule, primary roads shall meet the requirements of paragraph (G) of this rule.
- (1) Certification.
- (a) The plans and drawings of primary roads shall be prepared by, or under the direction of, an engineer, and shall be certified by an engineer, or jointly by an engineer and a surveyor to the extent such joint certification is permitted by state law, as meeting: the requirements of Chapters 1501:13-1 to 1501:13-14 of the Administrative Code; current, prudent engineering practices; and any design criteria established by the chief.
- (b) The construction or reconstruction of primary roads shall be certified in a report to the chief by an engineer or a surveyor, or jointly by an engineer and a surveyor to the extent required by state law, as having been completed as designed and in accordance with the approved plan.
- (a) Location. To minimize erosion, a primary road is to be located, insofar as practical, on the most



stable available surfaces.

- (b) Stream fords by primary roads are prohibited unless they are specifically approved by the chief as temporary routes during periods of construction.
- (3) Stability. Each primary road embankment shall have a minimum static safety factor of 1.3 or be designed in accordance with paragraph (M)(2) of rule 1501:13-4-05 or paragraph (L)(2) of rule 1501:13-4-14 of the Administrative Code.
- (4) Drainage control.
- (a) Each primary road shall be designed, constructed or reconstructed, and maintained to have adequate drainage control, using structures such as, but not limited to, bridges, ditches, cross drains, and ditch relief drains. The drainage control system shall be designed to pass the peak runoff safely from a ten-year, six-hour precipitation event or greater event, as specified by the chief.
- (b) Drainage pipes and culverts shall be constructed to avoid plugging or collapse and erosion at inlets and outlets.
- (c) Drainage ditches shall be designed to prevent uncontrolled drainage over the road surface and embankment. Trash racks and debris basins shall be installed in the drainage ditches where debris from the drainage area may impair the functions of drainage and sediment control structures.
- (d) Culverts shall be designed, installed, and maintained to sustain the vertical soil pressure, the passive resistance of the foundation, and the weight of vehicles using the road.
- (e) Natural stream channels shall not be altered or relocated without the prior approval of the chief in accordance with rule 1501:13-9-04 of the Administrative Code.
- (f) Except as provided in paragraph (G)(2)(b) of this rule, drainage structures for stream channel crossings shall be made using bridges, culverts or other structures designed, constructed, and maintained using current, prudent engineering practices.



- (5) Surfacing. Primary roads shall be surfaced with rock, crushed gravel, asphalt, or other material approved by the chief as being sufficiently durable for the anticipated volume of traffic and the weight and speed of vehicles using the road.
- (6) Maintenance. Routine maintenance of primary roads shall include repairs to the road surface, blading, filling potholes and adding replacement gravel or asphalt. It shall also include revegtation, brush removal, and minor reconstruction of road segments as necessary.