

Rule 3:16 **Fugitive, Indirect, or Non-Traditional Sources**

(Adopted: 07/22/86, amended 11/27/07)

The Air Pollution Control Officer (APCO) may place reasonable conditions upon any source, as mentioned below, that will mitigate the emissions from such sources to below a level of significance or to a point that such emissions no longer constitute a violation of the *California Health & Safety Code* Section 41700 and/or Section 41701.

- A. Fugitive sources;
- B. Indirect sources;
- C. Non-Traditional sources.

CH&SC Section 41700

No person shall discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health, or safety of any such persons or to the public, or which cause, or have the natural tendency to cause, injury or damage to business or property.

CH&SC Section 41701

No person shall discharge into the atmosphere from any source whatsoever any air contaminant, other than uncombined water vapor, for a period or periods aggregating more than three (3) minutes in any one (1) hour which is as dark as or darker than Ringelmann #2 or equivalent forty percent (40%) opacity.

Fugitive dust is further regulated as follows:

I. Purpose

The purpose of the section of this rule is to reduce the amount of respirable particulate matter (PM₁₀) that is emitted from anthropogenic fugitive dust sources. The reduction of these fugitive emissions shall be a sufficient amount to attain state PM₁₀ ambient air quality standards and maintain national PM₁₀ ambient air quality standards.

II. Applicability

The provisions of this rule shall apply to any anthropogenic activity capable of generating fugitive dust. These activities include earth-moving, construction, demolition, bulk storage, and conditions resulting in wind erosion.

III. Definitions

- A. Active Operation -- an operation or situation capable of generating fugitive dust which includes: earth-moving activity; construction activity; demolition activity; open active or inactive storage pile; disturbed or inactive disturbed surface area; non-emergency movement of motor vehicles on unpaved roadways, or any parking lot served by an unpaved road.
- B. Aggregate -- materials inclusive of sand, gravel, rocks, and soil.
- C. Anthropogenic -- influence of human beings.
- D. Bulk Material -- volume of aggregate or non-aggregate material.
- E. Construction / Demolition Activity -- any on-site mechanical activity preparatory to or related to building, alteration, rehabilitation, demolition or improvement of property, including the following activities: grading, excavation, loading, crushing, cutting, planing, shaping, or ground breaking.
- F. Contractor -- any person, company, or licensed construction contractor having a contractual arrangement to conduct an active operation for another person.
- G. Disturbed Surface Area -- a portion of the earth's surface having been physically moved, uncovered, destabilized, or otherwise modified from its undisturbed natural condition, thereby increasing the potential for emission of fugitive dust (Note: This area does not include areas restored to a natural state with vegetative ground cover and soil characteristics similar to adjacent or nearby natural conditions.)
- H. Dust Suppressant -- substance such as water, hygroscopic materials, or non-toxic chemical stabilizers used as treatment to reduce fugitive dust emissions.
- I. Earth-Moving Activity -- aggregate movement by grading, earth cutting, earth filling, loading or unloading, land filling, or soil mulching.
- J. Fugitive Dust -- any particulate matter becoming airborne, other than being emitted from an exhaust stack, directly or indirectly, as a result of anthropogenic activity.
- K. Inactive Disturbed Surface Area -- any disturbed surface area upon which an active operation has not occurred for a period of at least ten (10) consecutive days.
- L. Inactive Storage Piles -- storage piles left undisturbed for more than ten (10) consecutive days.
- M. Non-Aggregate -- material other than aggregate that is comprised of either organic or non-organic solid material.

- N. Non-Routine Operation -- active operation time occurring no more than three (3) times each year, lasting less than thirty (30) cumulative days each year, and scheduled less than thirty (30) days in advance.
- O. Open Storage Pile -- an outdoor stockpile of aggregate or non-aggregate bulk material of 40 cubic yards or more.
- P. Particulate Matter -- any solid material existing in finely divided form.
- Q. PM₁₀ -- particulate matter with an aerodynamic diameter smaller than or equal to ten (10) microns as measured by California Air Resources Board Test Method 501.
- R. Paved Road -- any road that is covered by concrete, asphaltic concrete, asphalt, or other materials which provides structural support for vehicles and has defined road shoulders.
- S. Reasonably Available Control Measure (RACM) -- any technique or procedure used to prevent or reduce the emission and airborne transport of fugitive dust; these techniques or procedures include, but are not limited to: application of dust suppressants; use of coverings or enclosures; paving; enshrouding; planting vegetation; and control of motor vehicle speeds.
- T. Unpaved Road -- any straight or curved length of well-defined travel way for motor vehicles not covered by either concrete, asphaltic concrete, or asphalt.

IV. Exemptions

- A. Provisions of this rule shall not apply to:
 1. Agricultural operations, including activities directly related to raising fowl or animals, or growing crops, for a profit;
 2. Actions required by federal or state endangered species legislation or the Surface Mining and Reclamation Act;
 3. Any disturbed surface area less than one-half (½) acre on occupied residential property;
 4. Active operations conducted during emergency life-threatening situations, or in conjunction with any officially-declared disaster or state of emergency including those activities associated with fighting wildfires;
 5. Active operations conducted by essential service utilities to provide electricity, natural gas, telephone, water and sewer during periods of service outages and emergency disruptions;

6. Unpaved roads that are not part of a construction or demolition activity;
 7. Restorative grading of unpaved shoulders of paved roads;
 8. Non-routine or emergency maintenance of flood control channels and water spreading basins;
 9. Weed and dried vegetation removal required by a fire prevention/control agency;
 10. Active operations conducted during freezing weather if the only applicable Reasonably Available Control Measure (RACM) involves application of water;
 11. Routine operation of county or properly permitted private sanitary landfill disposal sites provided such sites conform to California Code of Regulations Title 14: Sections 17659, 17660 and 17706;
 12. Blasting operations permitted by the California Division of Industrial Safety;
 13. Motion picture, television, and video production activities when dust emissions are required for visual effects;
 14. Officially designated public parks and recreational areas, including national parks, national monuments, national forests, state parks, state recreational areas, and county regional parks;
 15. Federal facilities required by the National Environmental Protection Act to implement fugitive dust RACMs for activities otherwise subject to this rule provided that the Shasta County Air Quality Management District (District) receives an up-to-date description of such activities;
 16. Raw material and fuel piles located at permitted stationary sources.
- B. Provisions of rule regarding the visible emissions limit shall not apply when wind gusts exceed twenty-five (25) miles per hour instantaneous velocity provided RACMs are implemented for each applicable fugitive dust source type.

V. Requirements

- A. No person shall cause or allow emissions of fugitive dust from any active or inactive operation such that:
 1. The dust emission exceeds twenty percent (20%) opacity; or

2. The dust remains visible five percent (5% opacity or above) in the atmosphere beyond the property line of the emission source.
- B. A person shall utilize one or more reasonably available control measures (RACMs) to minimize fugitive dust emissions from each fugitive dust source type which is part of any active or inactive operation subject to this rule. Reference RACMs are listed in Table 1 (page 6).
 - C. All dust suppressants shall be used in sufficient concentration and adequate application frequency to maintain a stabilized surface. All dust suppressants shall meet all specifications, criteria, or tests required by any federal, state, or local water agency. A dust suppressant shall not be used if prohibited by the Regional Water Quality Control Board, the California Air Resources Board, the Environmental Protection Agency, or any other applicable law, rule or regulation.

VI. Opacity Test Method and Measurement Procedure

- A. Make opacity observations, to the extent possible, using a contrasting background that is perpendicular to the line of vision.
- B. Make opacity observations approximately one (1) meter above the surface from which the plume is generated.
- C. The opacity observation is to be made at only one visual point upon generation of a plume as opposed to visually tracking the entire length of a dust plume as it is created along a surface.
- D. For opacity measurements on motor vehicles on unpaved roads, make two observations for each vehicle with the first reading at zero (0) seconds and the second reading at five (5) seconds. Repeat the process until you have recorded a total of twelve (12) consecutive opacity readings. (Note: This will occur once six vehicles have driven on the source in your line of observation). Average the twelve (12) opacity readings together for compliance to the twenty percent (20%) opacity limit.
- E. For all other opacity measurements used to evaluate compliance with the emission limits of Section V.A, EPA Method 9 shall be used whereby on-site visible emissions shall not exceed twenty percent (20%) or greater than or equal to five percent (5%) at the project boundary for more than three (3) minutes out of any sixty (60) minute period.

VII. Compliance Schedule

- A. As determined by the District, subject anthropogenic activity, which includes earth-moving, construction, demolition, bulk storage, and producing conditions resulting in wind erosion, capable of generating fugitive dust shall comply with the requirements of the rule by June 1, 2009.

- B. Any RACMs not listed in Table 1 and employed by an active operation shall first be approved by the District. Failure to obtain prior approval of an unlisted RACM by the District shall subject the responsible party to enforcement action.

TABLE 1 : REASONABLY AVAILABLE CONTROL MEASURES (RACMs)

SOURCE CATEGORY	CONTROL MEASURE(S)
Construction Activity	<ul style="list-style-type: none"> • Use wind breaks/screens • Apply dust suppressants
Demolition Activity	<ul style="list-style-type: none"> • Use wind breaks/screens • Apply dust suppressants
Disturbed Surface Area (general)	<ul style="list-style-type: none"> • Use fences, barriers, wind breaks/screens • Plant vegetation • Apply dust suppressants • Cover with gravel • Compact the surface
Earth-Moving	<ul style="list-style-type: none"> • Use wind breaks/screens • Apply dust suppressants
Paved Road	<ul style="list-style-type: none"> • Haul truck materials covered or watered • Haul truck wheel washers • Street sweeping
Storage Pile (open)	<ul style="list-style-type: none"> • Use wind breaks/screens • Use enclosures around storage piles • Apply dust suppressants
Unpaved Road	<ul style="list-style-type: none"> • Improve road surface • Control vehicular travel speed • Apply dust suppressants