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Part IV

Environmental Protection Agency

40 CFR Part 61
National Emission Standards for Hazardous Air Pollutants; Amendments to Asbestos Standard; Final Rule

DUP 0502900

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ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 61

[AD-FRL 2515-6]

National Emission Standards for Hazardous Air Pollutants; Amendments to Asbestos Standard

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: Amendments to the national emission standard for asbestos were proposed in the Federal Register on July 13, 1983 (48 FR 32126). This action promulgates the amendments under Section 112 of the Clean Air Act as amended in 1977. The intended effect of the amendments is to reinstate work practice and equipment provisions of the standard that were held not to be emission standards by the U.S. Supreme Court in 1978. They also reword and rearrange the standard for clarity.

EFFECTIVE DATE: April 5, 1984. Under Section 307(b)(1) of the Clean Air Act, judicial review of these amendments is available only by the filing of a petition for review in the U.S. Court of Appeals for the District of Columbia Circuit within 60 days of today's publication of this rule. Under Section 307(b)(2) of the Clean Air Act, the requirements that are the subject of today's notice may not be challenged later in civil or criminal proceedings brought by EPA to enforce these requirements.

ADDRESSES: *Docket.* A docket, number A-83-02, containing information considered by EPA in development of the promulgated amendments, is available for public inspection between 8:00 a.m. and 4:00 p.m., Monday through Friday, at EPA's Central Docket Section (LE-131), West Tower Lobby, Gallery 1, 401 M Street, SW., Washington, D.C. 20460. A reasonable fee may be charged for copying.

FOR FURTHER INFORMATION CONTACT: Mr. Robert L. Ajax, Standards Development Branch, Emission Standards and Engineering Division (MD-13), U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711, telephone (919) 541-5578.

SUPPLEMENTARY INFORMATION:

The Amendments

The amendments reinstate portions of the asbestos NESHAP that were equipment or work practice requirements. The Supreme Court held in *Adamo Wrecking Company* v. *United States*, 434 U.S. 275 (1978) that work practice requirements of the NESHAP were not authorized by the 1970 Amendments to the Clean Air Act under which they were originally promulgated. The 1977 Amendments to the Act specifically authorize such requirements. On June 19, 1978 (43 FR 26372), EPA repromulgated many of the requirements under authority of the 1977 Amendments, and today's action repromulgates the following remaining requirements in a new Subpart M of 40 CFR Part 61.

1. Section 61.143 reinstates a prohibition of surfacing roadways with asbestos tailings or asbestos containing waste.

2. Sections 61.145(c) and 61.147(g) reinstate a partial exemption for demolition operations for structurally unsound buildings.

3. Section 61.147(a) reinstates the requirement that asbestos removed during demolition or renovation be kept wet until it is collected for disposal. It also requires that the asbestos not be dropped or thrown to the ground or a lower floor and that asbestos removed more than 50 feet above ground level be transported to the ground in dust-tight chutes or containers (unless it is removed in units or sections).

4. Section 61.147(f) reinstates alternative work practices that may be used for removal of asbestos prior to demolition when there are freezing temperature conditions at the point where the asbestos is being wetted.

5. Section 61.150 reinstates the prohibition of installation of certain molded or wet-applied insulating materials that contain commercial asbestos.

6. Sections 61.151(a) and 61.152(a) simply refer to the requirements of Section 61.156.

7. Sections 61.151 (b) and (c); 61.152(b) (1), (2), and (3); 61.153(a) (2), (3), and (4); 61.154; and 61.156 (c) and (d) reinstate alternative work practices or equipment that may be used in lieu of complying with a no visible emission limit.

8. Sections 61.153(b) and 61.156(b) reinstate the requirement for warning signs and fencing around asbestos waste disposal sites if (1) the owner or operator chooses to comply with a no visible emission limit rather than follow specified work practices, and (2) there is no natural barrier to deter access by the general public.

In addition to these requirements, today's action clarifies the asbestos NESHAP by rewording and rearranging it into a new Subpart M of 40 CFR Part 61.

Public Participation

The amendments were proposed in the Federal Register on July 13, 1983 (48 FR 32126). To provide interested persons the opportunity for oral presentation of data, views, or arguments concerning the proposed amendments, a public hearing was held on August 9, 1983, at Research Triangle Park, North Carolina. The hearing was open to the public and each attendee was given an opportunity to comment on the proposed amendments. The public comment period was from July 13, 1983, to September 9, 1983.

Fifteen comment letters were received and two interested parties testified at the public hearing concerning issues relative to the proposed amendments. The comments have been carefully considered and, where determined to be appropriate by the Administrator, changes have been made to the proposed amendments.

Summary of Comments and Changes to the Proposed Amendments

Comments on the proposed amendments were received from industry, Federal agencies, State and local air pollution control agencies, and private citizens. The following summary of comments and responses serves as the basis for the revisions that have been made to the proposed amendments. Most of the letters contained multiple comments, some of which were outside the scope of this rulemaking. Those comments have been summarized in Item No. IV-B-1 of Docket No. A-83-02. They are being evaluated in conjunction with the comprehensive review of the asbestos NESHAP that is currently underway.

Most of the remaining comments pertain to the effect that rewording and rearranging the proposed amendments had on the original meaning and intent of the asbestos NESHAP. Some of them also pertain to the reasonableness of those requirements being repromulgated (see list in the section entitled "The Amendments"). The comments are discussed below and are organized according to the sections of the proposed amendments to which they pertain.

Section 61.141

One commenter noted that the proposed definition of "demolition" deletes the previous reference to "any related removing or stripping of friable asbestos materials" and recommended restoring the definition to the old wording. The commenter believes that the new wording may be interpreted to not include removing and stripping.

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EPA intended that the proposed definition of "demolition" describe the activities that occur when a facility is demolished as distinguished from "renovation," as the terms are used in the regulation. The primary distinguishing activity is that load supporting structural members are wrecked or taken out in a demolition operation but not in a renovation. Asbestos stripping or removal may occur in either but should not be used to define the primary activity of demolition or renovation. Section 61.145 clearly states that when demolition or renovation operations meet certain specified criteria regarding asbestos materials in the facility, they are subject to the regulation. Also, § 61.147 clearly specifies that stripping or removal of asbestos materials during demolition or renovation must be carried out in accordance with the standard. It is not necessary to repeat these provisions in the definition of "demolition."

One commenter noted that the proposed definition of renovation would apply only to removal of asbestos and not to stripping and recommended that the new definition be as comprehensive as the old one.

EPA did not intend to omit the word "stripping" from the definition of "renovation" at the time of proposal. However, EPA has reevaluated the definition to determine the wording that would be the most useful and informative for the regulation. As discussed in the response to the previous comment about the definition of "demolition," the terms should be defined to describe the type of activity that is being carried out at a facility, regardless of the presence or absence of asbestos material, and the definition of "renovation" has been revised accordingly.

One commenter recommended restoring the phrase "based on operating experience" to the definition of "planned renovation" to clarify the basis for predicting future renovations involving asbestos removal. The phrase was in the old definition. The commenter's recommendation has been incorporated into the amendments.

One commenter requested clarification of the definition of "emergency renovation operation." He asked whether it would include malfunctions, such as leaking valves, that require the removal of asbestos-containing insulation. Although these malfunctions are expected to occur, they are not planned or scheduled.

EPA considers the type of occurrence described by the commenter to be part of a planned renovation operation and not an emergency renovation operation. The commenter indicated that although the situations are not planned or scheduled, they are expected to occur. They would, therefore, fit the definition of "planned renovation operation" in § 61.141 that says, "Individual nonscheduled operations are included if a number of such operations can be predicted to occur during a given period of time."

Section 61.145

One commenter noted that the word "or" between "operators" and "demolition" in § 61.145(a) should be changed to "of." He indicated that the proper wording would show what he believed to be the Agency's intent to limit applicability of the regulations to only "wreckers and renovators" and not to include facility owners and operators.

The commenter is correct that the word "or" should be changed to "of," and this correction has been made. However, the commenter's interpretation that the regulations apply to only "wreckers and renovators" and not to facility owners and operators is incorrect. The general provisions of 40 CFR Part 61 define "owner or operator" as any person who owns, leases, operates, controls, or supervises a stationary source (40 CFR 61.02(1)). The stationary source in this case is the demolition or renovation operation. The demolition or renovation contractor would clearly be considered an owner or operator by "operating" the stationary source. The facility owner or operator, by purchasing the services of the demolition or renovation contractor, acquires ownership and control of the operation and would, therefore, be the "owner" for purposes of this standard. Therefore, the standard applies to both the contractor and the facility owner or operator.

Sections 61.146 and 61.147

One commenter believes that the wording in §§ 61.146 and 61.147 is vague with respect to identifying who is subject to the requirements, unlike the wording in §§ 61.142, 61.143, 61.144, 61.148, and 61.149, which is restrictive in describing the regulated party.

EPA believes that the applicability of §§ 61.146 and 61.147 as described in § 61.145 adequately identifies those subject to the requirements of the demolition and renovation standard.

One commenter questioned the intent of § 61.147(e)(1). The regulation requires that asbestos materials be adequately wetted to ensure that they remain wet during all remaining stages of demolition or renovation and related handling operations. The commenter asked whether this requirement should be interpreted to mean that the asbestos has to stay wet even after it is properly bagged and sealed.

The intent of the requirement to keep friable asbestos materials wet during all remaining stages of demolition was to ensure that the asbestos materials that have been removed or stripped but not yet disposed of are not allowed to dry out so that asbestos fibers become airborne. If they are properly sealed in leak-tight containers or bags while wet, they should not dry out before they can be transferred to an acceptable disposal site. In any case, after they are bagged, the waste disposal requirements in § 61.152 (and not § 61.147) would apply to the handling of the asbestos materials. To clarify the meaning of this portion of the standard, the wording of § 61.147(e)(1) has been revised to indicate that the asbestos materials must be kept wet until they are collected for disposal in accordance with § 61.152. They would be considered "collected" when they are properly bagged.

Section 61.150

One commenter asked for clarification of the intent of § 61.150, which prohibits the installation of certain asbestos-containing insulating materials. It was not clear to him whether the prohibition affects manufacturing operations that use parts containing asbestos such as grommets, gaskets, string, etc. in their products.

The preamble of the Federal Register notice that contained the original standard for insulating materials (39 FR 38064; October 25, 1974) discusses the intended applicability of the prohibition. It is clear from that discussion that the prohibition was intended to apply to field installation of such insulating products as molded, asbestos-reinforced blocks, sheets, and semicircular sections for pipe insulation; and powdered asbestos cement products mixed into a slurry and used to insulate irregular shapes. These installations would have been associated with construction activities on buildings and other facilities. Therefore, the prohibition would not affect manufacturing operations that use asbestos-containing parts in their products. The regulation has been reworded to reflect EPA's intended effect of the prohibition.

Section 61.154

One commenter pointed out that the units in § 61.154(a)(1)(iii) do not properly relate square meters to square yards, resulting in a lowering of the weight of the filter by about 20 percent from the old requirement; i.e., 14 oz./sq. yd. is not equal to 14 oz./sq. meter. In addition, he

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pointed out that the use of ½ inch is not in keeping with EPA's metric program. The errors noted by the commenter have been corrected in the final rule.

Section 61.155

One commenter requested clarification of the Agency's intent in § 61.155, which requires that existing sources covered by the asbestos NESHAP provide to the Agency within 90 days information regarding their asbestos emission control methods. The commenter asked if renotification and resubmission would be required if they had already complied with these same requirements in the old designation § 61.24.

EPA does not intend that existing sources of asbestos emissions resubmit notifications that were originally required by the standard promulgated in 1973. The wording of § 61.155 has been revised to accurately reflect EPA's intent.

Miscellaneous

One commenter expressed the opinion that the proposed amendments do not sufficiently correct the weakness of the NESHAP regulations and that they represent a "crude slap in the face to asbestos victims and will create health hazards of such proportions that new generations of asbestos victims will be guaranteed." He supported his opinion with the following arguments:

1. The no visible emission limit is not adequate for regulating airborne asbestos because it does not take into account the substantial asbestos disease risk when emissions that are not visible are present.

2. The proposed reinstatement of the exemption from certain wetting requirements during demolition operations in freezing temperatures should not be allowed. Weather conditions that do not allow wetting should also not allow asbestos to be removed. Wetting requirements are important because they can reduce dust levels by a power of 10.

3. Allowing exceptions when local entities pronounce buildings structurally unsound is tantamount to opening a way for widespread violation of health practices.

4. Under no circumstances should visible emissions be allowed.

5. All references to the economic impact should be dropped. EPA should concern itself with the economic impact on society, which ends up paying for disease victims produced by inadequate work regulations.

The first four of the commenter's statements concern issues that are currently being investigated in the review of the asbestos NESHAP: the no visible emission limit, the exemption from wetting requirements during freezing weather, and the exemption for structurally unsound buildings. EPA will evaluate the effect of these provisions and determine whether they need to be revised. That evaluation is beyond the scope of today's rulemaking, however. The amendments are intended to reinstate the provisions of the original NESHAP and not to include new provisions or delete any of the original ones. Therefore, no changes are being made to these portions of the proposed amendments.

In response to the commenter's suggestion to drop all references to the economic impact of the proposed amendments, the Agency believes that economic impact on the regulated entities is one of many factors that should be considered when setting standards under Section 112 of the Clean Air Act. Any adverse economic impact on society resulting from inadequate regulations for a hazardous air pollutant would be of concern to EPA as it would be a consequence of adverse public health effects. The current review of the NESHAP will include an evaluation of this aspect of regulating asbestos to determine if more stringent requirements are needed.

One commenter said that the requirement in § 61.146(c)(3) to explain the techniques of estimation of the amount of asbestos for certain demolition jobs seems to be a new requirement because he could not locate it in the old regulation. The requirement was in § 61.22(d)(1)(ii) of the old regulation.

One commenter said that States that are enforcing the asbestos NESHAP sometimes have a different interpretation of regulations than EPA and suggested that EPA provide clarification of intent for the States.

Under the Clean Air Act, States are free to require more stringent asbestos emission control measures than those in the asbestos NESHAP. EPA does, however, provide EPA enforcement determinations to States that have been delegated authority to enforce the NESHAP. These determinations include EPA's interpretations of portions of the regulation as questions arise concerning them, and they are very useful in ensuring consistency of enforcement among the States and EPA Regional Offices.

One commenter said that there is a statement in the proposal preamble that is not true. It says, "Demolition and renovation contractors typically transport the asbestos they remove from a facility to a waste disposal site on a daily basis." The commenter stated that the economics of doing this would be astronomical. For example, the cost of hauling a small number of bags to a disposal site 40 miles away would be very high, and the contractor would wait until a full load had accumulated.

The Agency has carefully considered this comment and concluded that no changes to the regulation are needed since it refers to a discussion in the preamble to the proposed amendments. There are no requirements in the NESHAP that asbestos waste be transported to a disposal site daily.

Three commenters said that the amendments improve the clarity and readability of the asbestos NESHAP and two indicated that the required work practices are currently being used by their companies. Two commenters noted typographical errors, which have been corrected in the final rule. Other minor changes were made in the final rule to ensure that the new wording accurately reflects the intent of the original regulation and to further clarify the requirements.

Docket

The docket is an organized and complete file of all the information submitted to or otherwise considered by EPA in the development of this rulemaking. The principal purposes of the docket are: (1) To allow interested parties to identify readily and locate documents so that they can effectively participate in the rulemaking process; and (2) to serve as the record in case of judicial review, except for interagency review materials (§ 307(d)(7)(A)).

Miscellaneous

A review of this regulation has begun. This review will include an assessment of such factors as the need for integration with other programs, the existence of alternative methods, enforceability, improvements in emission control technology and health data, and reporting requirements.

Under E.O. 12291, EPA must judge whether a regulation is "major" and therefore subject to the requirement of a Regulatory Impact Analysis. This regulation is not major because it does not meet any of the criteria specified in the Executive Order regarding the annual effect on the economy; increase in cost or prices; or adverse effects on competition, employment, investment, productivity, innovation, or the ability of U.S. enterprises to compete with foreign enterprises.

Information collection requirements associated with this rule (40 CFR 61.07,

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61.89, 61.105, 61.145, 61.148, and 61.156 have been approved by the Office of Management and Budget (OMB) under the provisions of the Paperwork Reduction Act of 1980, 44 U.S.C. 3501 *et seq.* and have been assigned OMB control number 2060-0284.

This regulation was submitted to the Office of Management and Budget (OMB) for review as required by E.O. 12291.

Pursuant to the provisions of 5 U.S.C. 605(b), I hereby certify that this rule, if promulgated, will not have a significant economic impact on any small entities.

List of Subjects in 40 CFR Part 61

Air pollution control, Asbestos, Beryllium, Hazardous materials, Mercury, Vinyl chloride.

Dated: March 30, 1984.

William D. Ruckelshaus,

Administrator.

PART 61—[AMENDED]

40 CFR Part 61 is amended by redesignating Subpart B (§§ 61.20–61.25) as Subpart M and revising the new Subpart M to read as follows:

Subpart M—National Emission Standard for Asbestos

Sec.

61.140 Applicability.
61.141 Definitions.
61.142 Standard for asbestos mills.
61.143 Standard for roadways.
61.144 Standard for manufacturing.
61.145 Standard for demolition and renovation: Applicability.
61.146 Standard for demolition and renovation: Notification requirements.
61.147 Standard for demolition and renovation: Procedures for asbestos emission control.
61.148 Standard for spraying.
61.149 Standard for fabricating.
61.150 Standard for insulating materials.
61.151 Standard for waste disposal for asbestos mills.
61.152 Standard for waste disposal for manufacturing, demolition, renovation, spraying, and fabricating operations.
61.153 Standard for inactive waste disposal sites for asbestos mills and manufacturing and fabricating operations.
61.154 Air-cleaning.
61.155 Reporting.
61.156 Active waste disposal sites.

Authority: Secs. 112 and 301(a) of the Clean Air Act, as amended (42 U.S.C. 7412, 7601(a)), and additional authority as noted below.

Subpart M—National Emission Standard for Asbestos

§ 61.140 Applicability.

The provisions of this subpart are applicable to those sources specified in §§ 61.142 through 61.153.

§ 61.141 Definitions.

All terms that are used in this subpart and are not defined below are given the same meaning as in the Act and in Subpart A of this part.

Active waste disposal site means any disposal site other than an inactive site.

Adequately wetted means sufficiently mixed or coated with water or an aqueous solution to prevent dust emissions.

Asbestos means the asbestiform varieties of serpentinite (chrysotile), riebeckite (crocidolite), cummingtonite-grunerite, anthophyllite, and actinolite-tremolite.

Asbestos-containing waste materials means any waste that contains commercial asbestos and is generated by a source subject to the provisions of this subpart. This term includes asbestos mill tailings, asbestos waste from control devices, friable asbestos waste material, and bags or containers that previously contained commercial asbestos. However, as applied to demolition and renovation operations, this term includes only friable asbestos waste and asbestos waste from control devices.

Asbestos material means asbestos or any material containing asbestos.

Asbestos mill means any facility engaged in converting, or in any intermediate step in converting, asbestos ore into commercial asbestos. Outside storage of asbestos material is not considered a part of the asbestos mill.

Asbestos tailings means any solid waste that contains asbestos and is a product of asbestos mining or milling operations.

Asbestos waste from control devices means any waste material that contains asbestos and is collected in a pollution control device.

Commercial asbestos means any asbestos that is extracted from asbestos ore.

Demolition means the wrecking or taking out of any load-supporting structural member of a facility together with any related handling operations.

Emergency renovation operations means a renovation operation that was not planned but results from a sudden, unexpected event. This term includes operations necessitated by nonroutine failures of equipment.

Fabricating means any processing of a manufactured product that contains commercial asbestos, with the exception of processing at temporary sites for the construction or restoration of facilities.

Facility means any institutional, commercial, or industrial structure, installation, or building (excluding apartment buildings having no more than four dwelling units).

Facility component means any pipe, duct, boiler, tank, reactor, turbine, or furnace at or in a facility; or any structural member of a facility.

Friable asbestos material means any material containing more than 1 percent asbestos by weight that hand pressure can crumble, pulverize, or reduce to powder when dry.

Inactive waste disposal site means any disposal site or portion of it where additional asbestos-containing waste material will not be deposited and where the surface is not disturbed by vehicular traffic.

Manufacturing means the combining of commercial asbestos—or, in the case of woven friction products, the combining of textiles containing commercial asbestos—with any other material(s), including commercial asbestos, and the processing of this combination into a product.

Outside air means the air outside buildings and structures.

Particulate asbestos material means finely divided particles of asbestos material.

Planned renovation operations means a renovation operation, or a number of such operations, in which the amount of friable asbestos material that will be removed or stripped within a given period of time can be predicted. Individual nonscheduled operations are included if a number of such operations can be predicted to occur during a given period of time based on operating experience.

Remove means to take out friable asbestos materials from any facility.

Renovation means altering in any way one or more facility components. Operations in which load-supporting structural members are wrecked or taken out are excluded.

Roadways means surfaces on which motor vehicles travel. This term includes highways, roads, streets, parking areas, and driveways.

Strip means to take off friable asbestos materials from any part of facility.

Structural member means any load-supporting member of a facility, such as beams and load supporting walls; or any nonload-supporting member, such as ceilings and nonload-supporting walls.

Visible emissions means any emissions containing particulate asbestos material that are visually detectable without the aid of instruments. This does not include condensed uncombined water vapor.

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§ 61.142 Standard for asbestos mills.

Each owner or operator of an asbestos mill shall either discharge no visible emissions to the outside air from that asbestos mill or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air.

§ 61.143 Standard for roadways.

No owner or operator of a roadway may deposit asbestos tailings or asbestos-containing waste material on that roadway, unless it is a temporary roadway on an area of asbestos ore deposits.

§ 61.144 Standard for manufacturing.

(a) *Applicability:* This section applies to the following manufacturing operations using commercial asbestos.

(1) The manufacture of cloth, cord, wicks, tubing, tape, twine, rope, thread, yarn, roving, lap, or other textile materials.

(2) The manufacture of cement products.

(3) The manufacture of fireproofing and insulating materials.

(4) The manufacture of friction products.

(5) The manufacture of paper, millboard, and felt.

(6) The manufacture of floor tile.

(7) The manufacture of paints, coatings, caulks, adhesives, and sealants.

(8) The manufacture of plastics and rubber materials.

(9) The manufacture of chlorine.

(10) The manufacture of shotgun shell wads.

(11) The manufacture of asphalt concrete.

(b) *Standard:* Each owner or operator of any of the manufacturing operations to which this section applies shall either:

(1) Discharge no visible emissions to the outside air from these operations or from any building or structure in which they are conducted; or

(2) Use the methods specified by § 61.154 to clean emissions from these operations containing particulate asbestos material before they escape to, or are vented to, the outside air.

§ 61.145 Standard for demolition and renovation: Applicability.

The requirements of §§ 61.146 and 61.147 apply to each owner or operator of a demolition or renovation operation as follows:

(a) If the amount of friable asbestos materials in a facility being demolished is at least 80 linear meters (260 linear feet) on pipes or at least 15 square meters (160 square feet) on other facility components, all the requirements of §§ 61.146 and 61.147 apply, except as provided in paragraph (c) of this section.

(b) If the amount of friable asbestos materials in a facility being demolished is less than 80 linear meters (260 linear feet) on pipes and less than 15 square meters (160 square feet) on other facility components, only the notification requirements of paragraphs (a), (b), and (c) (1), (2), (3), (4), and (5) of § 61.146 apply.

(c) If the facility is being demolished under an order of a State or local governmental agency, issued because the facility is structurally unsound and in danger of imminent collapse, only the requirements in § 61.146 and in paragraphs (d), (e), (f), and (g) of § 61.147 apply.

(d) If at least 80 linear meters (260 linear feet) of friable asbestos materials on pipes or at least 15 square meters (160 square feet) of friable asbestos materials on other facility components are stripped or removed at a facility being renovated, all the requirements of §§ 61.146 and 61.147 apply.

(1) To determine whether paragraph (d) of this section applies to planned renovation operations involving individual nonscheduled operations, predict the additive amount of friable asbestos materials to be removed or stripped over the maximum period of time a prediction can be made, not to exceed 1 year.

(2) To determine whether paragraph (d) of this section applies to emergency renovation operations, estimate the amount of friable asbestos materials to be removed or stripped as a result of the sudden, unexpected event that necessitated the renovation.

(e) Owners or operators of demolition and renovation operations are exempt from the requirements of §§ 61.05(a), 61.07, and 61.09.

§ 61.146 Standard for demolition and renovation: Notification requirements.

Each owner or operator to which this section applies shall:

(a) Provide the Administrator with written notice of intention to demolish or renovate.

(b) Postmark or deliver the notice as follows:

(1) At least 10 days before demolition begins if the operation is described in § 61.145(a);

(2) At least 20 days before demolition begins if the operation is described in § 61.145(b);

(3) As early as possible before demolition begins if the operation is described in § 61.145(c);

(4) As early as possible before renovation begins.

(c) Include the following information in the notice:

(1) Name and address of owner or operator.

(2) Description of the facility being demolished or renovated, including the size, age, and prior use of the facility.

(3) Estimate of the approximate amount of friable asbestos material present in the facility. For facilities described in § 61.145(b), explain techniques of estimation.

(4) Location of the facility being demolished or renovated.

(5) Scheduled starting and completion dates of demolition or renovation.

(6) Nature of planned demolition or renovation and method(s) to be used.

(7) Procedures to be used to comply with the requirements of this Subpart.

(8) Name and location of the waste disposal site where the friable asbestos waste material will be deposited.

(9) For facilities described in § 61.145(c), the name, title, and authority of the State or local governmental representative who has ordered the demolition.

(Approved by the Office of Management and Budget under control number 2060-0084)

§ 61.147 Standard for demolition and renovation: Procedures for asbestos emission control.

Each owner or operator to whom this section applies shall comply with the following procedures to prevent emissions of particulate asbestos material to the outside air:

(a) Remove friable asbestos materials from a facility being demolished or renovated before any wrecking or dismantling that would break up the materials or preclude access to the materials for subsequent removal. However, friable asbestos materials need not be removed before demolition if:

(1) They are on a facility component that is encased in concrete or other similar material; and

(2) These materials are adequately wetted whenever exposed during demolition.

(b) When a facility component covered or coated with friable asbestos materials is being taken out of the facility as units or in sections:

(1) Adequately wet any friable asbestos materials exposed during cutting or disjointing operations; and

(2) Carefully lower the units or sections to ground level, not dropping them or throwing them.

(c) Adequately wet friable asbestos materials when they are being stripped from facility components before the members are removed from the facility.

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In renovation operations, wetting that would unavoidably damage equipment is not required if the owner or operator:

(1) Asks the Administrator to determine whether wetting to comply with this paragraph would unavoidably damage equipment, and, before beginning to strip, supplies the Administrator with adequate information to make this determination; and

(2) When the Administrator does determine that equipment damage would be unavoidable, uses a local exhaust ventilation and collection system designed and operated to capture the particulate asbestos material produced by the stripping and removal of the friable asbestos materials. The system must exhibit no visible emissions to the outside air or be designed and operated in accordance with the requirements in § 61.154.

(d) After a facility component has been taken out of the facility as units or in sections, either:

(1) Adequately wet friable asbestos materials during stripping; or

(2) Use a local exhaust ventilation and collection system designed and operated to capture the particulate asbestos material produced by the stripping. The system must exhibit no visible emissions to the outside air or be designed and operated in accordance with the requirements in § 61.154.

(e) For friable asbestos materials that have been removed or stripped:

(1) Adequately wet the materials to ensure that they remain wet until they are collected for disposal in accordance with § 61.152; and

(2) Carefully lower the materials to the ground or a lower floor, not dropping or throwing them; and

(3) Transport the materials to the ground via dust-tight chutes or containers if they have been removed or stripped more than 50 feet above ground level and were not removed as units or in sections.

(f) When the temperature at the point of wetting is below 0°C (32°F):

(1) Comply with the requirements of paragraphs (d) and (e) of this section. The owner or operator need not comply with the other wetting requirements in this section; and

(2) Remove facility components coated or covered with friable asbestos materials as units or in sections to the maximum extent possible.

(g) For facilities described in § 61.145(c), adequately wet the portion of the facility that contains friable asbestos materials during the wrecking operation.

§ 61.148 Standard for spraying.

The owner or operator of an operation in which asbestos-containing materials are spray applied shall comply with the following requirements:

(a) Use materials that contain 1 percent asbestos or less on a dry weight basis for spray-on application on buildings, structures, pipes, and conduits, except as provided in paragraph (c) of this section.

(b) For spray-on application of materials that contain more than 1 percent asbestos on a dry weight basis on equipment and machinery, except as provided in paragraph (c) of this section:

(1) Notify the Administrator at least 20 days before beginning the spraying operation. Include the following information in the notice:

(i) Name and address of owner or operator.

(ii) Location of spraying operation.

(iii) Procedures to be followed to meet the requirements of this paragraph.

(2) Discharge no visible emissions to the outside air from the spray-on application of the asbestos-containing material or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air.

(c) The requirements of paragraphs (a) and (b) of this section do not apply to the spray-on application of materials where the asbestos fibers in the materials are encapsulated with a bituminous or resinous binder during spraying and the materials are not friable after drying.

(d) Owners and operators of sources subject to this section are exempt from the requirements of §§ 61.05(a), 61.07, and 61.08.

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§ 61.149 Standard for fabricating.

(a) *Applicability.* This section applies to the following fabricating operations using commercial asbestos:

(1) The fabrication of cement building products.

(2) The fabrication of friction products, except those operations that primarily install asbestos friction materials on motor vehicles.

(3) The fabrication of cement or silicate board for ventilation hoods; ovens; electrical panels; laboratory furniture, bulkheads, partitions, and ceilings for marine construction; and flow control devices for the molten metal industry.

(b) *Standard.* Each owner or operator of any of the fabricating operations to which this section applies shall either:

(1) Discharge no visible emissions to the outside air from any of the operations or from any building or structure in which they are conducted; or

(2) Use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air.

§ 61.150 Standard for insulating materials.

After the effective date of this regulation, no owner or operator of a facility may install or reinstall on a facility component any insulating materials that contain commercial asbestos if the materials are either molded and friable or wet-applied and friable after drying. The provisions of this paragraph do not apply to spray-applied insulating materials regulated under § 61.148.

§ 61.151 Standard for waste disposal for asbestos mills.

Each owner or operator of any source covered under the provisions of § 61.142 shall:

(a) Deposit all asbestos-containing waste material at waste disposal sites operated in accordance with the provisions of § 61.154; and

(b) Discharge no visible emissions to the outside air from the transfer of asbestos waste from control devices to the tailings conveyor, or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air. Dispose of the asbestos waste from control devices in accordance with § 61.152(b) or paragraph (c) of this section; and

(c) Discharge no visible emissions to the outside air during the collection, processing, packaging, transporting, or deposition of any asbestos-containing waste material, or use one of the disposal methods specified in paragraphs (c) (1) or (2) of this section, as follows:

(1) Use a wetting agent as follows:

(i) Adequately mix all asbestos-containing waste material with a wetting agent recommended by the manufacturer of the agent to effectively wet dust and tailings, before depositing the material at a waste disposal site. Use the agent as recommended for the particular dust by the manufacturer of the agent.

(ii) Discharge no visible emissions to the outside air from the wetting operation or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material

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before they escape to, or are vented to, the outside air.

(iii) Wetting may be suspended when the ambient temperature at the waste disposal site is less than −9.5°C (15°F). Determine the ambient air temperature by an appropriate measurement method with an accuracy of ±1°C(±2°F), and record it at least hourly while the wetting operation is suspended. Keep the records for at least 2 years in a form suitable for inspection.

(2) Use an alternative disposal method that has received prior approval by the Administrator.

§ 61.152 Standard for waste disposal for manufacturing demolition, renovation, spraying, and fabricating operations.

Each owner or operator of any source covered under the provisions of §§ 61.144–61.149 shall:

(a) Deposit all asbestos-containing waste material at waste disposal sites operated in accordance with the provisions of § 61.156; and

(b) Discharge no visible emissions to the outside air during the collection, processing (including incineration), packaging, transporting, or deposition of any asbestos-containing waste material generated by the source, or use one of the disposal methods specified in paragraphs (b)(1), (2), or (3) of this section, as follows:

(1) Treat asbestos-containing waste material with water:

(i) Mix asbestos waste from control devices with water to form a slurry; adequately wet other asbestos-containing waste material; and

(ii) Discharge no visible emissions to the outside air from collection, mixing, and wetting operations, or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air; and

(iii) After wetting, seal all asbestos-containing waste material in leak-tight containers while wet; and

(iv) Label the containers specified in paragraph (b)(1)(iii) as follows:

CAUTION
Contains Asbestos
Avoid Opening or
Breaking Container
Breathing Asbestos is hazardous
to Your Health

Alternatively, use warning labels specified by Occupational Safety and Health Standards of the Department of Labor, Occupational Safety and Health Administration (OSHA) under 29 CFR 1910.1001(g)(2)(ii).

(2) Process asbestos-containing waste material into nonfriable forms:

(i) Form all asbestos-containing waste material into nonfriable pellets or other shapes; and

(ii) Discharge no visible emissions to the outside air from collection and processing operations, or use the methods specified by § 61.154 to clean emissions containing particulate asbestos material before they escape to, or are vented to, the outside air.

(3) Use an alternative disposal method that has received prior approval by the Administrator.

§ 61.153 Standard for inactive waste disposal sites for asbestos mills and manufacturing and fabricating operations.

Each owner or operator of any inactive waste disposal site that was operated by sources covered under §§ 61.142, 61.144, or 61.149 and received deposits of asbestos-containing waste material generated by the sources, shall

(a) Comply with one of the following:

(1) Either discharge no visible emissions to the outside air from an inactive waste disposal site subject to this paragraph; or

(2) Cover the asbestos-containing waste material with at least 15 centimeters (6 inches) of compacted nonasbestos-containing material, and grow and maintain a cover of vegetation on the area adequate to prevent exposure of the asbestos-containing waste material; or

(3) Cover the asbestos-containing waste material with at least 60 centimeters (2 feet) of compacted nonasbestos-containing material, and maintain it to prevent exposure of the asbestos-containing waste; or

(4) For inactive waste disposal sites for asbestos tailings, apply a resinous or petroleum-based dust suppression agent that effectively binds dust and controls wind erosion. Use the agent as recommended for the particular asbestos tailings by the manufacturer of the dust suppression agent. Obtain prior approval of the Administrator to use other equally effective dust suppression agents. For purposes of this paragraph, waste crankcase oil is not considered a dust suppression agent.

(b) Unless a natural barrier adequately deters access by the general public, install and maintain warning signs and fencing as follows, or comply with paragraph (a)(2) or (a)(3) of this section.

(1) Display warning signs at all entrances and at intervals of 100 m (330 feet) or less along the property line of the site or along the perimeter of the sections of the site where asbestos-containing waste material was deposited. The warning signs must:

(i) Be posted in such a manner and location that a person can easily read the legend; and

(ii) Conform to the requirements for 51 cm×36 cm (20"×14") upright format signs specified in 29 CFR 1910.145(d)(4) and this paragraph; and

(iii) Display the following legend in the lower panel with letter sizes and styles of a visibility at least equal to those specified in this paragraph.

Legend	Minimum
Asbestos Waste Disposal Site	2.5 cm (1 inch) Sans Serif, Gothic or Block
Do Not Create Dust	1.9 cm (¾ inch) Sans Serif, Gothic or Block
Breathing Asbestos is Hazardous to Your Health.	14 Point Gothic.

Spacing between any two lines must be at least equal to the height of the upper of the two lines.

(2) Fence the perimeter of the site in a manner adequate to deter access by the general public.

(3) Upon request and supply of appropriate information, the Administrator will determine whether a fence or a natural barrier adequately deters access by the general public.

(c) The owner or operator may use an alternative control method that has received prior approval of the Administrator rather than comply with the requirements of paragraph (a) or (b) of this section.

§ 61.154 Air-cleaning.

(a) The owner or operator who elects to use air-cleaning, as permitted by §§ 61.142, 61.144, 61.147(c)(2), 61.147(d)(2), 61.148(b)(2), 61.149(b), 61.152(b)(1)(ii), and 61.152(b)(2) shall:

(1) Use fabric filter collection devices, except as noted in paragraph (b) of this section, doing all of the following:

(i) Operating the fabric filter collection devices at a pressure drop of no more than 4 inches water gage, as measured across the filter fabric; and

(ii) Ensuring that the airflow permeability, as determined by ASTM Method D737–75, does not exceed 9 m^3/min/m^2 (30 ft^3/min/ft^2) for woven fabrics or 11 m^3/min/m^2(35 ft^3/min/ft^2) for felted fabrics, except that 12 m^3/min/m^2 (40 ft^3min/ft^2) for woven and 14 m^3/min/m^2 (45 ft^3min/ft^2) for felted fabrics is allowed for filtering air from asbestos ore dryers; and

(iii) Ensuring that felted fabric weighs at least 475 grams per square meter (14 ounces per square yard) and is at least 1.6 millimeters (one-sixteenth inch) thick throughout; and

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(iv) Avoiding the use of synthetic fabrics that contain fill yarn other than that which is spun.

(2) Properly install, use, operate, and maintain all air-cleaning equipment authorized by this section. Bypass devices may be used only during upset or emergency conditions and then only for so long as it takes to shut down the operation generating the particulate asbestos material.

(b) There are the following exceptions to paragraph (a)(1):

(1) If the use of fabric creates a fire or explosion hazard, the Administrator may authorize as a substitute the use of wet collectors designed to operate with a unit contacting energy of at least 9.95 kilopascals (40 inches water gage pressure).

(2) The Administrator may authorize the use of filtering equipment other than that described in paragraphs (a)(1) and (b)(1) of this section if the owner or operator demonstrates to the Administrator's satisfaction that it is equivalent to the described equipment in filtering particulate asbestos material.

§ 61.155 Reporting.

(a) Within 90 days after the effective date of this subpart, each owner or operator of any existing source to which this subpart applies shall provide the following information to the Administrator, except that any owner or operator who provided this information prior to April 5, 1984 in order to comply with § 61.24 (which this section replaces) is not required to resubmit it.

(1) A description of the emission control equipment used for each process; and

(2) If a fabric filter device is used to control emissions, the pressure drop across the fabric filter in inches water gage; and

(i) If the fabric device uses a woven fabric, the airflow permeability in $m^3/min/m^2$ and; if the fabric is synthetic, whether the fill yarn is spun or not spun; and

(ii) If the fabric filter device uses a felted fabric, the density in g/m^2, the minimum thickness in inches, and the airflow permeability in $m^3/min/m^2$.

(3) For sources subject to §§ 61.151 and 61.152:

(i) A brief description of each process that generates asbestos-containing waste material; and

(ii) The average weight of asbestos-containing waste material disposed of, measured in kg/day; and

(iii) The emission control methods used in all stages of water disposal; and

(iv) The type of disposal site or incineration site used for ultimate disposal, the name of the site operator, and the name and location of the disposal site.

(4) For sources subject to § 61.153:

(i) A brief description of the site; and

(ii) The method or methods used to comply with the standard, or alternative procedures to be used.

(b) The information required by paragraph (a) of this section must accompany the information required by § 61.10. The information described in this section must be reported using the format of Appendix A of this part.

(Sec. 114, Clean Air Act as amended (42 U.S.C. 7414)).

(Approved by this Office of Management and Budget under control number 2000-0324)

§ 61.156 Active waste disposal sites.

To be an acceptable site for disposal of asbestos-containing waste material under §§ 61.151 and 61.152, an active waste disposal site must meet the requirements of this section.

(a) Either there must be no visible emissions to the outside air from any active waste disposal site where asbestos-containing waste material has been deposited, or the requirements of paragraph (c) or (d) of this section must be met.

(b) Unless a natural barrier adequately deters access by the general public, either warning signs and fencing must be installed and maintained as follows, or the requirements of paragraph (c)(1) of this section must be met.

(1) Warning signs must be displayed at all entrances and at intervals of 100 m (330 ft) or less along the property line of the site or along the perimeter of the sections of the site where asbestos-containing waste material is deposited. The warning signs must:

(i) Be posted in such a manner and location that a person can easily read the legend; and

(ii) Conform to the requirements of 51 cm × 36 cm (20" × 14") upright format signs specified in 29 CFR 1910.145(d)(4) and this paragraph; and

(iii) Display the following legend in the lower panel with letter sizes and styles of a visibility at least equal to those specified in this paragraph.

Legend	Notation
Asbestos Waste Disposal Site.	2.5 cm (1 inch) Sans Serif, Gothic or Block.
Do Not Create Dust	1.9 cm (¾ inch) Sans Serif, Gothic or Block.
Breathing Asbestos is Hazardous to Your Health.	14 Point Gothic.

Spacing between any two lines must be at least equal to the height of the upper of the two lines.

(2) The perimeter of the disposal site must be fenced in a manner adequate to deter access by the general public.

(3) Upon request and supply of appropriate information, the Administrator will determine whether a fence or a natural barrier adequately deters access by the general public.

(c) Rather than meet the no visible emission requirement of paragraph (a) of this section, an active waste disposal site would be an acceptable site if at the end of each operating day, or at least once every 24-hour period while the site is in continuous operation, the asbestos-containing waste material which was deposited at the site during the operating day or previous 24-hour period is covered with either:

(1) At least 15 centimeters (6 inches) of compacted nonasbestos-containing material, or

(2) A resinous or petroleum-based dust suppression agent that effectively binds dust and controls wind erosion. This agent must be used as recommended for the particular dust by the manufacturer of the dust suppression agent. Other equally effective dust suppression agents may be used upon prior approval by the Administrator. For purposes of this paragraph, waste crankcase oil is not considered a dust suppression agent.

(d) Rather than meet the no visible emission requirement of paragraph (a) of this section, an active waste disposal site would be an acceptable site if an alternative control method for emissions that has received prior approval by the Administrator is used.

(Secs. 112 and 301(a) of the Clean Air Act as amended (42 U.S.C. 7412, 7601(a))

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