

DEPARTMENT OF LABOR

Occupational Safety and Health Administration

29 CFR Parts 1910 and 1926

[Docket No. H-033C]

Occupational Exposure to Asbestos, Tremolite, Anthophyllite, and Actinolite

AGENCY: Occupational Safety and Health Administration, U.S. Department of Labor.

ACTION: Final rules.

SUMMARY: In these final standards, the Occupational Safety and Health Administration (OSHA) amends its present standard (29 CFR 1910.1001) regulating occupational exposure to asbestos. The standards published today establish a permissible exposure limit of 0.2 fiber per cubic centimeter of air (f/cc), determined as an 8-hour time-weighted average airborne concentration. The standards apply to all industries covered by the Occupational Safety and Health Act, including the construction and maritime industries and general industry. Separate standards and separate statements of reasons (Summary and Explanation sections) have been developed to apply to general industry (including maritime) and to construction, because the differences in exposure and workplace conditions in general industry and construction worksites warrant separate treatment. The standards will be codified in 29 CFR Parts 1910 and 1926, OSHA's General Industry and Construction standards, respectively. The basis for promulgation of these regulations is a determination by the Assistant Secretary that employees exposed to asbestos, tremolite, anthophyllite, and actinolite face a significant risk to their health and that these final standards will substantially reduce that risk. The record in this rulemaking demonstrates that employees occupationally exposed to asbestos are at risk of developing such chronic diseases as asbestosis, lung cancer, pleural and peritoneal mesothelioma, and gastrointestinal cancer.

The standards also provide for requirements for methods of compliance, personal protective equipment, employee monitoring, medical surveillance, communication of hazards to employees, regulated areas, housekeeping procedures, and recordkeeping. An "action" level of 0.1 f/cc as an 8-hour time-weighted average is established as the level above which

employers must initiate certain compliance activities, such as employee training and medical surveillance.

Where the employer can demonstrate, by means of exposure monitoring results or historical data, that the exposures of his or her employees do not exceed the action level, the employer is not obligated to comply with many of the standard's requirements. The 0.2 f/cc 8-hour limit reduces significant risk from exposure and is considered by OSHA, based upon substantial evidence in the record as a whole, to be the lowest level feasible.

EFFECTIVE DATE: The amended standards published today take effect July 21, 1986, except the following paragraphs which contain information collection requirements which are under review at the Office of Management and Budget: 29 CFR 1910.1001 (d)(2), (d)(3), (d)(5), (d)(7), (f)(2), (g)(3)(i), (j)(5), (l), and (m); 29 CFR 1926.58 (f)(2), (f)(3), (f)(6), (h)(3)(i), (k)(3), (k)(4), (m), and (n).

ADDRESS: For additional copies of these final standards, contact: OSHA Office of Publications, U.S. Department of Labor, Room S-4203, 200 Constitution Avenue, NW., Washington, DC 20210. Telephone (202) 523-9867.

FOR FURTHER INFORMATION CONTACT: Mr. James F. Foster, Director, Office of Information and Consumer Affairs, OSHA, U.S. Department of Labor, Room N-3637, 200 Constitution Avenue, NW., Washington, DC 20210. Telephone (202) 523-8151.

SUPPLEMENTARY INFORMATION:**I. Introduction****A. The Format of This Document (the Preamble)**

The preamble accompanying these revised standards is divided into 13 parts, numbered I through XIII. The following is a table of contents:

- I. Introduction
- II. Regulatory History
- III. Pertinent Legal Authority
- IV. Health Effects
- V. Quantitative Risk Assessment
- VI. Significance of Risk
- VII. Final Economic Impact, and Regulatory Flexibility Analysis
- VIII. Environmental Impact Assessment
- IX. Standards Recommended to OSHA by Interested Parties
- X. Summary and Explanation of the Revised Standard for General Industry
- XI. Summary and Explanation for a Revised Standard for the Construction Industry
- XII. Authority and Signature
- XIII. Amended Standards

References to the rulemaking record are in the text of the preamble, and the following abbreviations have been used:

1. Ex.: Exhibit number in Docket H-033C. Docket H-033C is located in Room N3670 at the Department of Labor.

2. TR.: Transcript date and page number.

B. Summary

Pursuant to sections 4(b)(2), 6(b), 6(c), and 8(c) of the Occupational Safety and Health Act of 1970 (the Act) (84 Stat. 1592, 1593, 1596, 1599; 29 U.S.C. 653, 655, 657), the Construction Safety Act (40 U.S.C. 333), the Longshoremen's and Harbor Workers' Compensation Act (33 U.S.C. 941), the Secretary of Labor's Order No. 9-83 (48 FR 35736), and 29 CFR Part 1911, these final standards hereby amend and revise the current asbestos standard, 29 CFR 1910.1001.

This action follows publication of proposed notices on November 4, 1983 (48 FR 51085) and on April 10, 1984 (49 FR 14116) and the holding of a public hearing to provide the public with an opportunity to comment on these proposed revisions. The hearings were held from June 19 to July 10, 1984, in Washington, DC. More than 55,000 pages of testimony and comments were received into the record of this rulemaking and have been analyzed by the Agency in developing these final standards. Based on this record, OSHA has determined that employees exposed to asbestos, tremolite, anthophyllite, and actinolite at the existing permissible exposure limit (PEL) of 2 fibers per cubic centimeter of air (2 f/cc) at worksites in the construction and maritime industries and in general industry workplaces face a significant risk to their health and that these final standards will substantially reduce that risk. Evidence in the record of this proceeding has shown that employees exposed at the revised standards' PEL of 0.2 fiber/cc remain at significant risk of incurring a chronic exposure-related disease, but considerations of feasibility have constrained OSHA to set the revised PEL at the 0.2 fiber/cc level.

The standard issued in 1971 defined asbestos as chrysotile, crocidolite, amosite, tremolite, anthophyllite, and actinolite. All of these minerals represent a hazard to workers, and the revised standard continues to regulate all of them. However, some forms of these minerals are no longer included in the definition of the word "asbestos". The regulatory text clearly specifies that the standards apply to occupational exposure to asbestos, tremolite, anthophyllite, and actinolite. In the preamble, however, where the word "asbestos" is used this should be interpreted as applying to tremolite, anthophyllite, and actinolite as well.