

**SUPPORTING STATEMENT FOR THE  
INFORMATION COLLECTION REQUIREMENTS OF THE  
ASBESTOS IN GENERAL INDUSTRY STANDARD (29 CFR 1910.1001)  
(Office of Management and Budget (OMB) Control No. 1218-0133(2010))<sup>1</sup>**

**JUSTIFICATION**

- 1. Explain the circumstances that make the collection of information necessary. Identify any legal or administrative requirements that necessitate the collection. Attach a copy of the appropriate section of each statute and regulation mandating or authorizing the collection of information.**

The main objective of the Occupational Safety and Health Act (OSH Act) is to “assure so far as possible every working man and woman in the Nation safe and healthful working conditions and to preserve our human resources” (29 U.S.C. 651). To achieve this objective, the OSH Act specifically authorizes “the development and promulgation of occupational safety and health regulations” (29 U.S.C. 651).

To protect employee health, the OSH Act authorizes the Occupational Safety and Health Administration (OSHA) to develop standards that provide for “monitoring or measuring employee exposure” to occupational hazards and “prescribe the type and frequency of medical examinations and other tests which shall be made available [by the employer] to employees exposed to such hazards in order to most effectively determine whether the health of such employees is adversely affected by such exposure” (29 U.S.C. 655). In addition, the OSH Act mandates that “[e]ach employer shall make, keep and preserve, and make available to the Secretary [of Labor] . . . such records regarding [his/her] activities relating to this Act as the Secretary . . . may prescribe by regulation as necessary or appropriate for the enforcement of this Act or for developing information regarding the causes and prevention of occupational accidents and illnesses” (29 U.S.C. 657). In addition, the OSH Act directs OSHA to “issue regulations requiring employers to maintain accurate records of employee exposure to potentially toxic materials or other harmful physical agents which are required to be monitored and measured,” and further specifies that such regulations provide “for each employee or former employee to have access to such records as will indicate [their] own exposure to toxic materials or harmful physical agents” (29 U.S.C. 657). The OSH Act states further that “[t]he Secretary . . . shall . . . prescribe such rules and regulations as [he/she] may deem necessary to carry out [his/her] responsibilities under this Act, including rules and regulations dealing with the inspection of an employer’s establishment” (29 U.S.C. 651).

Under the authority granted by the OSH Act, OSHA published a General Industry health

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<sup>1</sup>The purpose of this supporting statement is to analyze and describe the burden hours and costs associated with provisions of the Asbestos in General Industry Standard that contain paperwork requirements; this supporting statement does not provide information or guidance on how to comply with, or how to enforce, the Standard.

standard at 29 CFR 1910.1001 regulating employee exposure to asbestos (the “Standard”). The basis for this Standard is a determination by the Assistant Secretary for OSHA that occupational exposure to asbestos poses a hazard to employees. Years of exposure to asbestos can cause numerous disabling or fatal diseases. Among these diseases are asbestosis, an emphysema-like condition; lung cancer; mesothelioma, a cancerous tumor that spreads rapidly in the cells of membranes covering the lungs and body organs; and gastrointestinal cancer. Items 2 and 12 below describe the specific information collection requirements of the Standard.

2. **Indicate how, by whom, and for what purpose the information is to be used. Except for a new collection, indicate the actual use the agency has made of the information received from the current collection.**

The following are the collection of information requirements as stated in the Standard, followed by discussions indicating how, by whom, and for what purpose the information is used for each of these requirements.

#### **A. Exposure monitoring (§1910.1001(d))**

**General (§1910.1001(d)(1))** - Determinations of employee exposure shall be made from breathing zone air samples that are representative of the 8-hour TWA and 30-minute short-term exposures of each employee.

*§1910.1001(d)(1)(ii)* - Representative 8-hour TWA employee exposures shall be determined on the basis of one or more samples representing full-shift exposures for each shift for each employee in each job classification in each work area. Representative 30-minute short-term employee exposures shall be determined on the basis of one or more samples representing 30 minute exposures associated with operations that are most likely to produce exposures above the excursion limit for each shift for each job classification in each work area.

#### **Initial monitoring (§1910.1001(d)(2))**

*§1910.1001(d)(2)(i)* - Each employer who has a workplace or work operation covered by this standard, except as provided for in paragraphs (d)(2)(ii) and (d)(2)(iii) of this section, shall perform initial monitoring of employees who are, or may reasonably be expected to be exposed to airborne concentrations at or above the TWA permissible exposure limit and/or excursion limit.

*§1910.1001(d)(2)(iii)* - Where the employer has relied upon objective data that demonstrate that asbestos is not capable of being released in airborne concentrations at or above the TWA permissible exposure limit and/or excursion limit under the expected conditions of processing, use, or handling, then no initial monitoring is required.

**Purpose:** Employers must perform initial monitoring to determine the extent of asbestos exposure in their workplace. Initial monitoring allows employers to identify areas of operation that may require additional reduction in airborne asbestos to meet the permissible exposure level (PEL). The results of initial exposure-monitoring also assist employers in determining the need for engineering controls, implementing or modifying work practices, and selecting appropriate respiratory protection to prevent employees from overexposure to asbestos.

***Monitoring frequency (periodic monitoring) and patterns (§1910.1001(d)(3))*** - After the initial determinations required by paragraph (d)(2)(i) of this section, samples shall be of such frequency and pattern as to represent with reasonable accuracy the levels of exposure of the employees. In no case shall sampling be at intervals greater than six months for employees whose exposures may reasonably be foreseen to exceed the TWA permissible exposure limit and/or excursion limit.

**Purpose:** Periodic monitoring allows employers to determine the effects of implemented controls, modifications in process, materials, or environmental conditions on employee exposures to asbestos.

***Additional monitoring (§1910.1001(d)(5))*** - Notwithstanding the provisions of paragraphs (d)(2)(ii) and (d)(4) of this section, the employer shall institute the exposure monitoring required under paragraphs (d)(2)(i) and (d)(3) of this section whenever there has been a change in the production, process, control equipment, personnel or work practices that may result in new or additional exposures above the TWA permissible exposure limit and/or excursion limit or when the employer has any reason to suspect that a change may result in new or additional exposures above the PEL and/or excursion limit.

**Purpose:** Changes in production process, chemicals present, control equipment, and new personnel may lead to increases in employee exposure levels. Additional monitoring is necessary so that the employer takes action to protect employees, such as providing appropriate respiratory equipment or instituting engineering controls. Additional monitoring ensures that the work area is safe, or alerts the employer to the need to increase employee protection.

***Method of monitoring (§1910.1001(d)(6))***

*§1910.1001(d)(6)(iii)(c)* - The equivalent method is documented and the results of the comparison testing are maintained.

***Notification of monitoring results (§1910.1001(d)(7))***

*§1910.1001(d)(7)(i)* - The employer must, within 15 working days after the receipt of the results of any monitoring performed under this section, notify each affected employee of these results either individually in writing or by posting the results in an appropriate location that is accessible to affected employees.

*§1910.1001(d)(7)(ii)* - The written notification required by paragraph (d)(7)(i) of this section shall contain the corrective action being taken by the employer to reduce employee exposure to or below the TWA and/or excursion limit, wherever monitoring results indicated that the TWA and/or excursion limit had been exceeded.

**Purpose:** Consistent with section 8(c)(3) of the Act, every employee has the right to know what their exposure level is and whether it is above or below the AL. Moreover, since the PEL is one that also considers feasibility and, therefore, is not necessarily a “safe” level, it is necessary for the employees to know the level of asbestos to which they were exposed.

Additionally, when exposures are above the PEL, the employer must also state in the notification what corrective action the employer is going to take to reduce the exposure level. This requirement is necessary to assure employees that the employer is making every effort to furnish them with a safe and healthful work environment and implementing section 8(c)(3) of the OSH Act.

## **B. Compliance Program (§1910.1001(f))**

### ***Methods of compliance (§1910.1001(f)(2))***

*§1910.1001(f)(2)(i)* - Where the TWA and/or excursion limit is exceeded, the employer shall establish and implement a written program to reduce employee exposure to or below the TWA and to or below the excursion limit by means of engineering and work practice controls as required by paragraph (f)(1) of this section, and by the use of respiratory protection where required or permitted under this section.

*§1910.1001(f)(2)(ii)* - Such programs shall be reviewed and updated as necessary to reflect significant changes in the status of the employer's compliance program.

*§1910.1001(f)(2)(iii)* - Written programs shall be submitted upon request for examination and copying to the Assistant Secretary, the Director<sup>2</sup>, affected employees and designated employee representatives.

### ***Specific compliance methods for brake and clutch repair (§1910.1001(f)(3))***

*§1910.1001(f)(3)(i)* - Engineering controls and work practices for brake and clutch repair and service. During automotive brake and clutch inspection, disassembly, repair and assembly operations, the employer shall institute engineering controls and work practices to reduce employee exposure to materials containing asbestos using a negative pressure enclosure/HEPA vacuum system method or low pressure/wet cleaning method, which meets the detailed requirements set out in Appendix F to this section. The employer may

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<sup>2</sup> “Director” means the Director of the National Institute for Occupational Safety and Health, U.S. Department of Health and Human Services, or designee.

also comply using an equivalent method which follows written procedures which the employer demonstrates can achieve results equivalent to Method A in Appendix F to this section. For facilities in which no more than 5 pair of brakes or 5 clutches are inspected, disassembled, repaired, or assembled per week, the method set forth in paragraph [D] of Appendix F to this section may be used.

*§1910.1001(f)(3)(ii)* - The employer may also comply by using an equivalent method which follows written procedures, which the employer demonstrates can achieve equivalent exposure reductions as do the two "preferred methods." Such demonstration must include monitoring data conducted under workplace conditions closely resembling the process, type of asbestos containing materials, control method, work practices and environmental conditions which the equivalent method will be used, or objective data, which document that under all reasonably foreseeable conditions of brake and clutch repair applications, the method results in exposures which are equivalent to the methods set out in Appendix F to this section.

**Purpose:** Requiring employer's to develop written engineering and work practice control procedures, that are equivalent to Method A in Appendix F, ensures employers and employees take necessary steps to avoid asbestos exposure. The written procedure serves to remind employers to continue to maintain exposure-control methods that are equivalent to Appendix F.

### **C. Respiratory protection (§1910.1001(g))**

***General (§1910.1001(g)(1))*** - For employees who use respirators required by this section, the employer must provide respirators that comply with the requirements of this paragraph. Respirators must be used during:

*§1910.1001(g)(1)(i)* - Periods necessary to install or implement feasible engineering and work-practice controls.

*§1910.1001(g)(1)(ii)* - Work operations, such as maintenance and repair activities, for which engineering and work-practice controls are not feasible.

*§1910.1001(g)(1)(iii)* - Work operations for which feasible engineering and work-practice controls are not yet sufficient to reduce employee exposure to or below the TWA and/or excursion limit.

*§1910.1001(g)(1)(iv)* - Emergencies.

***Respiratory program (§1910.1001(g)(2))*** - The employer must implement a respiratory protection program in accordance with 29 CFR 1910.134 (b) through (d) (except (d)(1)(iii)), and (f) through (m).

**Purpose:** OSHA's Respiratory Protection Standard assists employers in protecting the health of

employees exposed to airborne contaminants and biological agents that they find infeasible to control at the required level using work practice and engineering methods.

**D. Protective work clothing and equipment (§1910.1001(h))**

**Removal and storage (§1910.1001(h)(2)(iv))** - Containers of contaminated protective devices or work clothing which are to be taken out of change rooms or the workplace for cleaning, maintenance or disposal, shall bear labels in accordance with paragraph (j)(4) of this section.

**Changing Replacement (§1910.1001(h)(3))**

§1910.1001(h)(3)(iv) - Any employer who gives contaminated clothing to another person for laundering shall inform such person of the requirement in paragraph (h)(3)(iii) of this section to effectively prevent the release of airborne fibers of asbestos in excess of the permissible exposure limits.

§1910.1001(h)(3)(v) - The employer shall inform any person who launders or cleans protective clothing or equipment contaminated with asbestos of the potentially harmful effects of exposure to asbestos.

§1910.1001(h)(3)(vi) - Contaminated clothing shall be transported in sealed impermeable bags, or other closed, impermeable containers, and labeled in accordance with paragraph (j) of this section.

**Purpose:** The information provided by employers under this provision will protect personnel who may come in contact with asbestos contaminated clothing from the hazards associated with asbestos exposure.

**E. Communication of hazards to employees (§1910.1001(j))**

**Duties of employers and building and facility owners (§1910.1001(j)(2))**

§1910.1001(j)(2)(i) - Building and facility owners shall determine the presence, location, and quantity of ACM and/or PACM at the work site. Employers and building and facility owners shall exercise due diligence in complying with these requirements to inform employers and employees about the presence and location of ACM and PACM.

§1910.1001(j)(2)(ii) - Building and facility owners shall maintain records of all information required to be provided pursuant to this section and/or otherwise known to the building owner concerning the presence, location and quantity of ACM and PACM in the building/facility. Such records shall be kept for the duration of ownership and shall be transferred to successive owners.

§1910.1001(j)(2)(iii) - Building and facility owners shall inform employers of employees,

and employers shall inform employees who will perform housekeeping activities in areas which contain ACM and/or PACM of the presence and location of ACM and/or PACM in such areas which may be contacted during such activities.

**Warning signs (§1910.1001(j)(3))**

§1910.1001(j)(3)(i) - Warning signs shall be provided and displayed at each regulated area. In addition, warning signs shall be posted at all approaches to regulated areas so that an employee may read the signs and take necessary protective steps before entering the area.

§1910.1001(j)(3)(ii)(A) - The warning signs required by paragraph (j)(3) of this section shall bear the following information:

**DANGER  
ASBESTOS  
CANCER AND LUNG DISEASE  
HAZARD  
AUTHORIZED PERSONNEL ONLY**

§1910.1001(j)(3)(ii)(B) - In addition, where the use of respirators and protective clothing is required in the regulated area under this section, the warning signs shall include the following:

**RESPIRATORS AND PROTECTIVE  
CLOTHING  
ARE REQUIRED IN THIS AREA**

§1910.1001(j)(3)(v) - At the entrance to mechanical rooms/areas in which employees reasonably can be expected to enter and which contain ACM and/or PACM, the building owner shall post signs which identify the material which is present, its location, and appropriate work practices which, if followed, will ensure that ACM and/or PACM will not be disturbed. The employer shall ensure, to the extent feasible, that employees who come in contact with these signs can comprehend them. Means to ensure employee comprehension may include the use of foreign languages, pictographs, graphics, and awareness training.

**Purpose:** These signs alert employees that they can enter a regulated area only if they have authority to do so and a specific need exists to enter the area. The signs, therefore, warn employees that they are in or near a hazardous area, and supplement the hazard-recognition training employees receive under the Standard.

**Warning labels (§1910.1001(j)(4))**

*§1910.1001(j)(4)(i)* - Warning labels shall be affixed to all raw materials, mixtures, scrap, waste, debris, and other products containing asbestos fibers, or to their containers. When a building owner or employer identifies previously installed ACM and/or PACM, labels or signs shall be affixed or posted so that employees will be notified of what materials contain ACM and/or PACM. The employer shall attach such labels in areas where they will clearly be noticed by employees who are likely to be exposed, such as at the entrance to mechanical room/areas. Signs required by paragraph (j)(3) of this section may be posted in lieu of labels so long as they contain information required for labelling.

*§1910.1001(j)(4)(ii)* - The labels shall comply with the requirements of 29 CFR 1910.1200(f) of OSHA's Hazard Communication standard, and shall include the following information:

**DANGER  
CONTAINS ASBESTOS FIBERS  
AVOID CREATING DUST  
CANCER AND LUNG DISEASE HAZARD**

**Purpose:** Warning labels inform downstream employers and employees of the hazards associated with asbestos, and that they may need to implement special practices to prevent exposure to the substance. It also reminds both the employer and employees of the continuing need to protect against the hazards that could result from employee overexposure. Furthermore, hazard labels alert other employers who, in the absence of such labels, may not know that asbestos is present in their workplace and, consequently, that they must comply with the Standard.

***Material safety data sheets (§1910.1001(j)(5))*** - Employers who are manufacturers or importers of asbestos or asbestos products shall comply with the requirements regarding development of material safety data sheets (MSDSs) as specified in 29 CFR 1910.1200(g) of OSHA's Hazard Communication standard, except as provided by paragraph (j)(6) of this section.<sup>3</sup>

**Purpose:** The purpose of MSDSs is to provide detailed information on each hazardous chemical, including its potential hazardous effects, its physical and chemical characteristics, and recommendations for appropriate protective measures. The MSDS provides information about the hazards of asbestos, as well as the means to protect employees of the chemical producer, as well as employees of downstream employers from these hazards. The MSDS complements labels by providing detailed information about the ingredients and hazards, as well as the means to properly handle the chemicals and to prevent adverse health effects. In addition, the MSDS serves as the basic source of information on the hazards of asbestos essential to the training

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<sup>3</sup>Labels are not required when asbestos fibers have been modified by a bonding agent, coating, binder, or other material provided that the manufacturer can demonstrate that during any reasonably foreseeable use, handling, storage, disposal, processing, or transportation, no airborne concentrations of fibers of asbestos in excess of the TWA permissible exposure level and/or excursion limit will be released or asbestos is present in a product in concentrations less than 1.0%.

provisions required in the Standard.

***Employee information and training (§1910.1001(j)(7))***

§1910.1001(j)(7)(i) - The employer shall institute a training program for all employees who are exposed to airborne concentrations of asbestos at or above the PEL and/or excursion limit and ensure their participation in the program.

§1910.1001(j)(7)(ii) - Training shall be provided prior to or at the time of initial assignment and at least annually thereafter.

§1910.1001(j)(7)(iii) - The training program shall be conducted in a manner which the employee is able to understand. The employer shall ensure that each employee is informed of the following:

§1910.1001(j)(7)(iii)(A) - The health effects associated with asbestos exposure;

§1910.1001(j)(7)(iii)(B) - The relationship between smoking and exposure to asbestos producing lung cancer;

§1910.1001(j)(7)(iii)(C) - The quantity, location, manner of use, release, and storage of asbestos, and the specific nature of operations which could result in exposure to asbestos;

§1910.1001(j)(7)(iii)(D) - The engineering controls and work practices associated with the employee's job assignment;

§1910.1001(j)(7)(iii)(E) - The specific procedures implemented to protect employees from exposure to asbestos, such as appropriate work practices, emergency and clean-up procedures, and personal protective equipment to be used;

§1910.1001(j)(7)(iii)(F) - The purpose, proper use, and limitations of respirators and protective clothing, if appropriate;

§1910.1001(j)(7)(iii)(G) - The purpose and a description of the medical surveillance program required by paragraph (I) of this section;

§1910.1001(j)(7)(iii)(H) - The content of this Standard, including appendices.

§1910.1001(j)(7)(iii)(I) - The names, addresses and phone numbers of public health organizations which provide information, materials, and/or conduct programs concerning smoking cessation. The employer may distribute the list of such organizations contained in appendix I to this section, to comply with this requirement.

§1910.1001(j)(7)(iii)(J) - The requirements for posting signs and affixing labels and the

meaning of the required legends for such signs and labels.

*§1910.1001(j)(7)(iv)* - The employer shall also provide, at no cost to employees who perform housekeeping operations in an area which contains ACM or PACM, an asbestos awareness training course, which shall at a minimum contain the following elements: health effects of asbestos, locations of ACM and PACM in the building/facility, recognition of ACM and PACM damage and deterioration, requirements in this Standard relating to housekeeping, and proper response to fiber release episodes, to all employees who perform housekeeping work in areas where ACM and/or PACM is present. Each such employee shall be so trained at least once a year.

**Purpose:** Training is essential to inform employees of the health hazards of asbestos exposure, and to provide them with the understanding required to minimize these health hazards. In addition, training provides information to employees that enables them to recognize how and where asbestos exposure occurs, and what steps to take, including work practices, to avoid or limit such exposure. Another benefit of training is that it serves to explain and reinforce the information presented to employees on warning signs and labels. In this regard, employees must understand the information, and be aware of the actions they must take to avoid or minimize asbestos exposure.

#### **F. Medical surveillance (§1910.1001(l))**

***Employers Covered General (§1910.1001(l)(1))*** - The employer shall institute a medical surveillance program for all employees who are or will be exposed to airborne concentrations of fibers of asbestos at or above the TWA and/or excursion limit.

#### ***Pre-placement examinations (§1910.1001(l)(2))***

*§1910.1001(l)(2)(i)* - Before an employee is assigned to an occupation exposed to airborne concentrations of asbestos fibers at or above the TWA and/or excursion limit, a pre-placement medical examination shall be provided or made available by the employer.

*§1910.1001(l)(2)(ii)* - Such examination shall include, as a minimum, a medical and work history; a complete physical examination of all systems with emphasis on the respiratory system, the cardiovascular system and digestive tract; completion of the respiratory disease standardized questionnaire in Appendix D to this section, Part 1; a chest roentgenogram (posterior-anterior 14 x 17 inches); pulmonary function tests to include forced vital capacity (FVC) and forced expiratory volume at 1 second (FEV(1.0)); and any additional tests deemed appropriate by the examining physician. Interpretation and classification of chest roentgenogram shall be conducted in accordance with Appendix E to this section.

#### ***Periodic examinations (§1910.1001(l)(3))***

§1910.1001(l)(3)(i) - Periodic medical examinations shall be made available annually.

§1910.1001(l)(3)(ii) - The scope of the medical examination shall be in conformance with the protocol established in paragraph (l)(2)(ii) of this section, except that the frequency of chest roentgenogram shall be conducted in accordance with Table 2, and the abbreviated standardized questionnaire contained in, Part 2 of Appendix D to this section shall be administered to the employee.

Table 2. -- Frequency of Chest Roentgenogram

Years since first exposure	Age of employee		
	15 to 35	35+ to 45	45+
0 to 10.....	Every 5 years.....	Every 5 years...	Every 5 years.
10+.....	Every 5 years.....	Every 2 years...	Every 1 year.

**Termination of employment examinations (§1910.1001(l)(4))**

§1910.1001(l)(4)(i) - The employer shall provide, or make available, a termination of employment medical examination for any employee who has been exposed to airborne concentrations of fibers of asbestos at or above the TWA and/or excursion limit.

§1910.1001(l)(4)(ii) - The medical examination shall be in accordance with the requirements of the periodic examinations stipulated in paragraph (l)(3) of this section, and shall be given within 30 calendar days before or after the date of termination of employment.

**Purpose:** The principal purpose of medical surveillance is the prevention or detection of abnormalities that may occur in some asbestos-exposed workers early enough to prevent future or progressive adverse health effects. Documentation and maintenance of the medical-examination results provide a continuous record of employee health. Physicians use these records to determine the extent to which employees, since their last examination, experience health effects related to their asbestos exposure. Further, if symptoms of damage appear, the physician often needs information about an employee’s previous medical conditions to make an accurate diagnosis of the new condition, ascertain its apparent cause, and identify a course of treatment. Medical records also permit employees to determine whether or not they need treatment, or to evaluate the effectiveness of their employer’s exposure-reduction program.

**Information provided to the physician (§1910.1001(l)(6))** - The employer shall provide the following information to the examining physician:

§1910.1001(l)(6)(i) - A copy of this Standard and appendices D and E.

*§1910.1001(l)(6)(ii)* - A description of the affected employee's duties as they relate to the employee's exposure.

*§1910.1001(l)(6)(iii)* - The employee's representative exposure level or anticipated exposure level.

*§1910.1001(l)(6)(iv)* - A description of any personal protective and respiratory equipment used or to be used.

*§1910.1001(l)(6)(v)* - Information from previous medical examinations of the affected employee that is not otherwise available to the examining physician.

**Purpose:** Making this information available to physicians assists them in evaluating an employee's health and fitness for specific job assignments involving asbestos exposure. In the case of medical examinations administered in response to emergency exposures, the physician can use the exposure information to devise an appropriate treatment.

***Physician's written opinion (§1910.1001(l)(7))***

*§1910.1001(l)(7)(i)* - The employer shall obtain a written signed opinion from the examining physician. This written opinion shall contain the results of the medical examination and shall include:

*§1910.1001(l)(7)(i)(A)* - The physician's opinion as to whether the employee has any detected medical conditions that would place the employee at an increased risk of material health impairment from exposure to asbestos;

*§1910.1001(l)(7)(i)(B)* - Any recommended limitations on the employee or upon the use of personal protective equipment such as clothing or respirators;

*§1910.1001(l)(7)(i)(C)* - A statement that the employee has been informed by the physician of the results of the medical examination and of any medical conditions resulting from asbestos exposure that require further explanation or treatment; and

*§1910.1001(l)(7)(i)(D)* - A statement that the employee has been informed by the physician of the increased risk of lung cancer attributable to the combined effect of smoking and asbestos exposure.

*§1910.1001(l)(7)(ii)* - The employer shall instruct the physician not to reveal in the written opinion given to the employer specific findings or diagnoses unrelated to occupational exposure to asbestos.

*§1910.1001(l)(7)(iii)* - The employer shall provide a copy of the physician's written

opinion to the affected employee within 30 days from its receipt.

**Purpose:** The purpose in requiring the employer to obtain a written opinion from the examining physician is to provide the employer with a medical basis to aid in the determination of initial placement of employees and to assess the employee's ability to use protective clothing and equipment. The physician's written opinion also provides information to the employer as to whether the employee maybe suffering from overexposure to asbestos. The requirement that a physician's opinion be in written form will ensure that employers have had the benefit of the information. Providing employees with a copy of the physician's written opinion informs them of the medical-examination results so that they can assist in determining the need for, and evaluate the effectiveness of, treatment or other interventions.

### **G. Recordkeeping (§1910.1001(m))**

#### ***Exposure measurements (§1910.1001(m)(1))<sup>4</sup>***

§1910.1001(m)(1)(i) - The employer shall keep an accurate record of all measurements taken to monitor employee exposure to asbestos as prescribed in paragraph (d) of this section.

§1910.1001(m)(1)(ii) - This record shall include at least the following information:

§1910.1001(m)(1)(ii)(A) - The date of measurement;

§1910.1001(m)(1)(ii)(B) - The operation involving exposure to asbestos which is being monitored;

§1910.1001(m)(1)(ii)(C) - Sampling and analytical methods used and evidence of their accuracy;

§1910.1001(m)(1)(ii)(D) - Number, duration, and results of samples taken;

§1910.1001(m)(1)(ii)(E) - Type of respiratory protective devices worn, if any; and

§1910.1001(m)(1)(ii)(F) - Name, social security number and exposure of the employees whose exposure are represented.

§1910.1001(m)(1)(iii) - The employer shall maintain this record for at least thirty (30) years, in accordance with 29 CFR 1910.1020.

#### ***Objective data for exempted operations (§1910.1001(m)(2))***

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<sup>4</sup>The employer may utilize the services of competent organizations such as industry trade associations and employee associations to maintain the records required by this section.

§1910.1001(m)(2)(i) - Where the processing, use, or handling of products made from or containing asbestos is exempted from other requirements of this section under paragraph (d)(2)(iii) of this section, the employer shall establish and maintain an accurate record of objective data reasonably relied upon in support of the exemption.

§1910.1001(m)(2)(ii) - The record shall include at least the following:

§1910.1001(m)(2)(ii)(A) - The product qualifying for exemption;

§1910.1001(m)(2)(ii)(B) - The source of the objective data;

§1910.1001(m)(2)(ii)(C) - The testing protocol, results of testing, and/or analysis of the material for the release of asbestos;

§1910.1001(m)(2)(ii)(D) - A description of the operation exempted and how the data support the exemption; and

§1910.1001(m)(2)(ii)(E) - Other data relevant to the operations, materials, processing, or employee exposures covered by the exemption.

§1910.1001(m)(2)(iii) - The employer shall maintain this record for the duration of the employer's reliance upon such objective data.

### ***Medical surveillance (§1910.1001(m)(3))***

§1910.1001(m)(3)(i) - The employer shall establish and maintain an accurate record for each employee subject to medical surveillance by paragraph (l)(1)(i) of this section, in accordance with 29 CFR 1910.1020.

§1910.1001(m)(3)(ii) - The record shall include at least the following information:

§1910.1001(m)(3)(ii)(A) - The name and social security number of the employee;

§1910.1001(m)(3)(ii)(B) - Physician's written opinions;

§1910.1001(m)(3)(ii)(C) - Any employee medical complaints related to exposure to asbestos; and

§1910.1001(m)(3)(ii)(D) - A copy of the information provided to the physician as required by paragraph (l)(6) of this section.

§1910.1001(m)(3)(iii) - The employer shall ensure that this record is maintained for the duration

of employment plus thirty (30) years, in accordance with 29 CFR 1910.1020.

**Training (§1910.1001(m)(4))** - The employer shall maintain all employee training records for one (1) year beyond the last date of employment of that employee.

**Availability (§1910.1001(m)(5))**

§1910.1001(m)(5)(i) - The employer, upon written request, shall make all records required to be maintained by this section available to the Assistant Secretary and the Director for examination and copying.

§1910.1001(m)(5)(ii) - The employer, upon request shall make any exposure records required by paragraph (m)(1) of this section available for examination and copying to affected employees, former employees, designated representatives and the Assistant Secretary, in accordance with 29 CFR 1910.1020(a) through (e) and (g) through (i).

§1910.1001(m)(5)(iii) - The employer, upon request, shall make employee medical records required by paragraph (m)(3) of this section available for examination and copying to the subject employee, to anyone having the specific written consent of the subject employee, and the Assistant Secretary, in accordance with 29 CFR 1910.1020.

**Transfer of records (§1910.1001(m)(6))**

§1910.1001(m)(6)(i) - The employer shall comply with the requirements concerning transfer of records set forth in 29 CFR 1910.1020(h).

§1910.1001(m)(6)(ii) - Whenever the employer ceases to do business and there is no successor employer to receive and retain the records for the prescribed period, the employer shall notify the Director at least 90 days prior to disposal of records and, upon request, transmit them to the Director.

**Purpose:** Exposure-monitoring and medical records are maintained principally to protect employee health, to assist in the prevention or early diagnosis of adverse health affects associated with asbestos exposure and to provide valuable information to both employees and employers. The records also assist OSHA in enforcing the Standard. The exposure-monitoring records required by this Standard will aid employees and their physicians in determining whether or not treatment or other interventions are needed for asbestos exposure.

3. **Describe whether, and to what extent, the collection of information involves the use of automated, electronic, mechanical, or other technological collection techniques or other forms of information technology, e.g., permitting electronic submission of responses, and the basis for the decision for adopting this means of collection. Also describe any consideration of using information technology to reduce burden.**

Employers may use improved information technology when establishing and maintaining

exposure-monitoring and medical-surveillance records. OSHA wrote the paperwork requirements of the Standard in performance-oriented language (i.e., in terms of what data to maintain, not how to maintain the data).

- 4. Describe efforts to identify duplication. Show specifically why any similar information already available cannot be used or modified for use for the purposes described in Item 2 above.**

The information required to be collected and maintained is specific to each employer and employee involved and is not available or duplicated by another source. The information required by this Standard is available only from employers. At this time, there is no indication that any alternate source is available.

- 5. If the collection of information impacts small businesses or other small entities (Item 5 of OMB Form 83-I), describe any methods used to minimize burden.**

The information-collection requirements of the Standard do not have a significant impact on a substantial number of small entities.

- 6. Describe the consequence to Federal program or policy activities if the collection is not conducted or is conducted less frequently, as well as any technical or legal obstacles to reducing burden.**

The information collection frequencies specified by this Standard are the minimum that OSHA believes are necessary to ensure that the employer and OSHA can effectively monitor the exposure and health status of employees working with asbestos in general industry.

- 7. Explain any special circumstances that would cause an information collection to be conducted in a manner:**

- requiring respondents to report information to the agency more often than quarterly;
- requiring respondents to prepare a written response to a collection of information in fewer than 30 days after receipt of it;
- requiring respondents to submit more than an original and two copies of any document;
- requiring respondents to retain records, other than health, medical, government contract, grant-in-aid, or tax records for more than three years;
- in connection with a statistical survey, that is not designed to produce valid and reliable results that can be generalized to the universe of study;
- requiring the use of a statistical data classification that has not been reviewed and approved by OMB;
- that includes a pledge of confidentiality that is not supported by authority established in statute or regulation, that is not supported by disclosure and data security policies that are consistent with the pledge, or which unnecessarily impedes sharing of data with

**other agencies for compatible confidential use; or**

- **requiring respondents to submit proprietary trade secret, or other confidential information unless the agency can demonstrate that it has instituted procedures to protect the information's confidentiality to the extent permitted by law.**

Under paragraph (d)(7) of the Standard, employers must, within 15 working days after the receipt of exposure monitoring results, notify the affected employees of their results in writing either individually or by posting the results in an appropriate location that is accessible to affected employees. This is to ensure that everyone working around asbestos has been informed of its presence.

Also in 1910.1001(d)(2), within 24 hours of its discovery, all employers who discover ACM and/or PACM on a worksite must convey information concerning the presence, location, and quantity of the newly discovered ACM and/or PACM to the owner and to other employers of employees working at the worksite. This is also to ensure that everyone is aware that asbestos is present.

8. **If applicable, provide a copy and identify the date and page number of publication in the Federal Register of the agency's notice, required by 5 CFR 1320.8(d), soliciting comments on the information collection prior to submission to OMB. Summarize public comments received in response to that notice and describe actions taken by the agency in response to these comments. Specifically address comments received on cost and hour burden.**

**Describe efforts to consult with persons outside the agency to obtain their views on the availability of data, frequency of collection, the clarity of instructions and recordkeeping, disclosure, or reporting format (if any), and on the data elements to be recorded, disclosed, or reported.**

**Consultation with representatives of those from whom information is to be obtained or those who must compile records should occur at least once every 3 years -- even if the collection of information activity is the same as in prior periods. There may be circumstances that may preclude consultation in a specific situation. These circumstances should be explained.**

As required by the Paperwork Reduction Act of 1995 (U.S.C. 3506(c)(2)(A)), OSHA published a notice in the *Federal Register* notice on April 5, 2010 (75 FR 17164, Docket No. OSHA-2010-0018) soliciting comments from the public and other interested parties on the information collection requirements contained in the Asbestos in General Industry Standard. The notice was part of a pre-clearance consultation program intended to provide interested parties the opportunity to comment on OSHA's request for an extension by OMB of a previous approval of the information collection requirements found in the Asbestos in General Industry Standard. The Agency received no comments in response to its notice.

9. **Explain any decision to provide any payment or gift to respondents, other than reenumeration of contractors or grantees.**

No payments or gifts will be provided to the respondents.

10. **Describe any assurance of confidentiality provided to respondents and the basis for the assurance in**

statute, regulation, or agency policy.

To ensure that the personal information contained in medical records remains confidential, OSHA developed 29 CFR 1913.10 to regulate access to these records.

11. Provide additional justification for any questions of a sensitive nature, such as sexual behavior and attitudes, religious beliefs, and other matters that are commonly considered private. This justification should include the reasons why the agency considers the questions necessary, the specific uses to be made of the information, the explanation to be given to persons from whom the information is requested, and any steps to be taken to obtain their consent.

None of the provisions in the Standard require the collection of sensitive information.

12. Provide estimates of the hour burden of the collection of information. The statement should:
- Indicate the number of respondents, frequency of response, annual hour burden, and an explanation of how the burden was estimated. Unless directed to do so, agencies should not conduct special surveys to obtain information on which to base hour burden estimates. Consultation with a sample (fewer than 10) of potential respondents is desirable. If the hour burden on respondents is expected to vary widely because of differences in activity, size, or complexity, show the range of estimated hour burden, and explain the reasons for the variance. Generally, estimates should not include burden hours for customary and usual business practices.
  - If this request for approval covers more than one form, provide separate hour burden estimates for each form and aggregate the hour burdens in Item 13 of OMB Form 83-I.
  - Provide estimates of annualized cost to respondents for the hour burdens for collections of information, identifying and using appropriate wage rate categories.

### Summary of Burden-Hour and Cost Estimates

The Agency determined average wage rates for asbestos using average hourly earnings, including benefits, to represent the cost of employee time. For the relevant occupational categories, OSHA adjusted the mean hourly earnings from the May 2008 *Occupational Employment Statistics by the Bureau of Labor Statistics* to allow for fringe benefits, which comprise about 30.3% of total compensation in the private sector. With wages comprising 69.7% of employee compensation, the Agency multiplied wages by 1.435 (1/0.697) to derive total -hourly employee compensation. The costs of labor used in this analysis are therefore estimates of total hourly compensation. These hourly wages are:

Supervisory Manufacturing Employee	\$36.90
Manufacturing Employee	\$22.30
Clerical Employee	\$20.69

**Table 1**  
**Summary of Burden Hours and Costs**

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<b>Information Collection Requirement</b>	<b>Current OMB Inventory</b>	<b>Requested Burden</b>	<b>Change</b>	<b>Estimated Cost</b>
<b>A. Exposure monitoring</b>				
Notification of monitoring results	187	96	-91	\$1,987
<b>B. Compliance program</b>				
Written compliance program	61	31	-30	\$1,144
Specific compliance methods	0	0	0	0
<b>C. Respirator protection</b>	0	0	0	0
<b>D. Protective work clothing and equipment</b>	0	0	0	0
<b>E. Communication of Hazards to employees</b>				
Duties of Employers and Building	33	15	-18	\$555
Warning signs and labels	0	0	0	\$0
Material safety data sheets	0	0	0	\$0
Employee information and training	475	238	-237	\$8,783
<b>F. Medical surveillance</b>				
Medical examination	17,413	8,707	-8706	\$194,166
Medical questionnaires	2,612	1,306	-1306	\$29,124
Information provided to the physician	929	464	-465	\$9,600
Physician's written opinion	929	464	-465	\$9,600
<b>G. Recordkeeping</b>				
Exposure monitoring records	187	96	-91	\$1,987
Medical surveillance	929	464	-465	\$9,600
Training records	10	6	-4	\$125
Employee access	77	39	-38	\$807
Federal government access	6	6	0	\$166
Transfer of records	1	1	0	\$21
<b>Total</b>	<b>23,849</b>	<b>11,933</b>	<b>-11,916</b>	<b>\$267,665</b>

### **Burden Hour and Cost Determinations**

The following sections summarize the methodology used for estimating the number of burden hours and costs resulting from the information collection requirements of the Standard.

To calculate burden hours and costs, facilities are divided into two categories, primary and secondary manufacturing. The number of primary and secondary manufactures is based on the 1994 Final regulatory impact and regulatory flexibility analysis. Since 1994 asbestos consumption in the US has declined considerably from 26,800 metric tons to only 715 tons in 2009.<sup>5</sup> Based on these data as well as on information obtained from conversations with the U.S. Geological Survey staff, OSHA assumes, conservatively, that the number of affected facilities has declined by one half since 1994.<sup>6</sup> Primary facilities, approximately 55 facilities, use raw asbestos to manufacture products. The primary asbestos manufacturing category covered by the Standard includes producers of asbestos-cement (A/C) pipe; A/C sheet; friction materials; resilient flooring; paper; coating and sealants; gaskets; and asbestos-reinforced plastics. Secondary manufacturing is defined as establishments that receive products from primary manufacturers and further process or fabricate these products to produce other intermediate or finished products. There are 66 secondary manufacturing facilities. Secondary processing involves sawing, pressing, slitting or drilling of asbestos-containing materials. Primary asbestos products that undergo significant secondary processing include gaskets and packing, plastics and textiles.

#### **A. Exposure monitoring (§1910.1001(d))**

OSHA assumes that initial exposure monitoring has been completed; therefore burden for initial monitoring is not included in this package. Following initial monitoring, exposure monitoring must be repeated at least every six months for employees whose exposures to asbestos may reasonably be foreseen to exceed limits. The Economic Analysis assumes that employers would hire Industrial Hygiene Services at a rate of \$50 per hour to conduct the monitoring. Therefore, those costs are calculated in Item 13 of this package, and no burden is taken here.

##### Employee notification of monitoring results (§1910.1001(d)(7))

Employers must notify affected employees of their exposure-monitoring results, within 15 days receipt. Employers may either individually notify employees or post the exposure-monitoring results in an appropriate location that is accessible to affected employees.

As posting is least burdensome, OSHA estimates that employers post the exposure-monitoring results in a central location. OSHA estimates a secretary takes 5 minutes (.08 hour) to post the monitoring results.

To estimate the frequency and number of exposure monitoring samples for time-weighted average (TWA), OSHA assumes employers sample one employee at each workstation to

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<sup>5</sup>U.S Geological Survey, Mineral Commodity Summaries, Asbestos, January 2010. Prepared by Robert Virta.

<sup>6</sup>The previous asbestos ICR assumed 110 primary and 133 secondary manufacturers affected by the standard.

represent the asbestos exposure of all employees working at that station. OSHA estimates that a workstation in primary manufacturing is comprised of 9.6 employees and workstations in secondary manufacturing are comprised of 15.7 employees per work station. To calculate sample numbers, the estimated number of employees exposed above the TWA was divided by the average number of employees at the work stations. OSHA estimates there are 1,391 employees in primary manufacturing and 3,446 employees in secondary manufacturing that are exposed above the time-weighted average. OSHA assumed that employers monitor twice per year.

### Periodic monitoring for the TWA

#### Primary manufacturing

Number of workstations:  $1,391 \text{ employees} / 9.6 \text{ employees per station} = 145 \text{ workstations}$

**Burden hours:**  $145 \text{ workstations} \times 1 \text{ sample} \times 2 \text{ times/year} \times .08 \text{ hour} = 23 \text{ hours}$

**Costs:**  $23 \text{ hours} \times \$20.69 = \$476$

#### Secondary manufacturing

Number of workstations:  $3,446 \text{ employees} / 15.7 \text{ employees per station} = 219 \text{ workstations}$

**Burden hours:**  $219 \text{ workstations} \times 1 \text{ sample} \times 2 \text{ times/year} \times .08 \text{ hour} = 35 \text{ hours}$

**Costs:**  $35 \text{ hours} \times \$20.69 = \$724$

For excursion limit (EL) monitoring, OSHA assumes that 50% of the facilities exceed the limit and subsequently perform semi-annual periodic monitoring. OSHA estimates 55 primary manufacturers and 66 secondary manufacturers are involved, and that primary manufacturers conduct 4 exposure-monitoring samples per year, and secondary manufacturers conduct 3 exposure-monitoring samples.

### Periodic monitoring for the EL

#### Primary manufacturing

**Burden hours:**  $(55 \text{ manufacturing facilities} \times 50\%) \times 4 \text{ samples/facility} \times 2 \text{ times/year} \times .08 \text{ hour/posting} = 18 \text{ hours}$

**Costs:**  $18 \text{ hours} \times \$20.69 = \$372$

#### Secondary manufacturing

**Burden hours:**  $(66 \text{ manufacturing facilities} \times 50\%) \times 3 \text{ samples/facility} \times 2 \text{ times/yr} \times .08 \text{ hour/posting} = 16 \text{ hours}$

**Costs:**  $16 \text{ hours} \times \$20.69 = \$331$

Additional monitoring

Employers must conduct additional monitoring whenever there is a change in production, process, control equipment, personnel or work practices that may result in new or additional exposures to asbestos.

Additional monitoring TWA

OSHA estimates there is change in process in 1% of all workstations where exposures exceed the PEL/TWA which would require additional monitoring.

Primary manufacturing

**Burden hours:** 145 workstations x 1% x 1 sample x 2 times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

Secondary manufacturing

**Burden hours:** 219 workstations x 1% x 1 sample x 2 times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

Additional monitoring EL

OSHA estimates there is a process change at one percent of all facilities where exposures exceed the PEL/EL.

Primary manufacturing

**Burden hours:** (55 manufacturing facilities x 50%) x 1 % x 4 samples/facility x 2 times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

Secondary manufacturing

**Burden hours:** (66 manufacturing facilities x 50%) x 1 % x 3 samples/facility x 2 times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

**Table 2**  
**Summary of**  
**Burden Hours and Cost for Exposure monitoring**

	Hours	Cost
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<b>TWA Periodic Monitoring</b>		
Primary Manufacturing	23	\$476
Secondary Manufacturing	35	\$724
<b>EL Periodic Monitoring</b>		
Primary Manufacturing	18	\$372
Secondary Manufacturing	16	\$331
<b>TWA Additional Monitoring</b>		
Primary Manufacturing	1	\$21
Secondary Manufacturing	1	\$21
<b>EL Additional Monitoring</b>		
Primary Manufacturing	1	\$21
Secondary Manufacturing	1	\$21
<b>Total Burden Hour/Cost</b>	<b>96</b>	<b>\$1,987</b>

**B. Compliance program (§1910.1001(f)(2)(i), (ii) and (iii))**

Employers have completed developing the initial compliance program, therefore no burden is taken for this activity. However, employers must review and update their compliance plans as necessary to reflect significant changes in the compliance program. OSHA estimates that 30 minutes (.5 hour) of supervisory time is required to update the compliance program and that 50% of primary and 50% of secondary manufacturers annually update their plans. The burden and costs are as follows:

Primary manufacturers

**Burden hours:** (55 facilities x 50%) x 1 update/year x .5 hour = 14 hours  
**Costs:** 14 hours x \$36.90 = \$517

Secondary manufacturers

**Burden hours:** (66 facilities x 50%) x 1 update/year x .5 hour = 17 hours  
**Costs:** 17 hours x \$36.90 = \$627

Specific compliance methods (§1910.1001(f)(3)(i) and (ii))

Specific compliance instructions are provided in the Standard for work associated with brake and clutch repair; however, if employers choose to use another method of compliance, they must follow other, written procedures. Some burden would occur if employers used procedures other than those prescribed; however, OSHA assumes that employers choose the less burdensome method of compliance and follow the procedures outlined in the Standard. Therefore, no burden has been allocated for this provision.

**C. Respirator program (§1910.1001(g)(2)(i), previously (g)(3)(i))**

The Standard requires the employer to institute a respiratory protection program in accordance with 29 CFR 1910.134. No burden is taken for this requirement. The burden is taken in the Respiratory Protection paperwork package for §1910.134 (OMB Control Number 1218-0099).

#### **D. Protective work clothing and equipment (§1910.1001(h)(3)(iv) and (v))**

The Regulatory Impact Analysis assumes all affected employers provide employees with disposable clothing, which requires no laundering. Therefore, no burden has been taken for this provision.

#### **E. Communication of hazards to employees**

##### Duties of employers and building and facility owners (§1910.1001(j)(2)(i), (ii), (iii))

Building and facility owners must determine the presence, location and quantity of asbestos containing material (ACM) and/or presumed asbestos containing material (PACM) at the work site. Building and facility owners must maintain asbestos information for the duration of ownership and must be transferred to successive owners. OSHA assumes that building evaluations have been completed.

Building and facility owners and employers of potentially exposed employees must convey specific information to employees regarding the location of ACM and PACM in their work environment.

OSHA estimates 25% of primary and secondary facilities owners notify contractors four times a year of ACM/PACM presence. Each notification takes three minutes (.05 hour) of supervisory time.

##### Primary manufacturing

**Burden hours:** (55 manufacturing facilities x 25%) x 4 times/year x .05 hour = 3 hours

**Costs:** 3 hours x \$36.90 = \$111

##### Secondary manufacturing

**Burden hours:** (66 manufacturing facilities x 25%) x 4 times/year x .05 hour = 3 hours

**Costs:** 3 hours x \$36.90 = \$111

Each facility has one contractor and each contractor has 2 housekeeping employees. OSHA estimates 25% of the contractors are required to notify employees working in the presence of ACM/PACM four times a year. Each notification takes five minutes (.08 hour).

##### Primary manufacturing

**Burden hours:** (55 manufacturing facilities x 25%) x 4 times/year x .08 hour = 4 hours  
**Costs:** 4 hours x \$36.90 = \$148

Secondary manufacturing

**Burden hours:** (66 manufacturing facilities x 25%) x 4 times/year x .08 hour = 5 hours  
**Costs:** 5 hours x \$36.90 = \$185

Warning signs and labels (§1910.1001(j)(3)(i) and (j)(4)(i) and (ii))

The Standard provides specific language for the required signs and the labels. Therefore, OSHA took no burden hours or costs for these requirements. (See final rule entitled “Controlling Paperwork Burden on the Public,” 5 CFR 1320.3(c)(2).)

Material safety data sheets (§1910.1001(j)(5))

Employers who are manufacturers or importers of asbestos or asbestos products must comply with the requirements regarding development of material safety data sheets as specified in 29 CFR 1910.1200(g) of the OSHA Hazard Communication Standard. Because these hours are already included in the hazard communication paperwork package no hours are assumed in this package.

Employee information and training (§1910.1001(j)(7)(i)(ii)(iii)(iv))

OSHA estimates 1,391 employees in primary manufacturing and 3,446 employees in secondary manufacturing are trained annually and the annual employee turnover rate in the affected industries is 20% (which is the same as a turnover factor of 1.2). Training sessions are comprised of 20 employees and takes 45 minutes (.75 hour). Thus the burden is as follows:

Primary manufacturing

**Burden hours:** (1,391 employees x 1.2 turnover rate)/20 employees per session x 1 time/year x .75 hour = 63 hours  
**Costs:** 63 hours x \$36.90 = \$2,325

Secondary manufacturing

**Burden hours:** (3,446 employees x 1.2 turnover rate)/20 employees per session x 1 time/year x .75 hour = 155 hours  
**Costs:** 155 hours x \$36.90 = \$5,720

Each facility has two housekeeping employees (55 primary facilities x 2 housekeepers = 110 housekeepers) and (66 secondary manufacturing facilities x 2 housekeepers = 133

housekeepers). OSHA estimates there is a 10% turnover rate for these employees (factored in equation as 1.1 turnover rate). Twenty employees attend each training sessions and it takes a trainer 1.5 hours to provide training. The burden is as follows:

Primary manufacturing

**Burden hours:**  $(110 \text{ employees} \times 1.1 \text{ turnover rate}) / 20 \text{ employees per session} \times 1.5 \text{ hours} = 9 \text{ hours}$

**Costs:**  $9 \text{ hours} \times \$36.90 = \$332$

Secondary manufacturing

**Burden hours:**  $(133 \text{ employees} \times 1.1 \text{ turnover rate}) / 20 \text{ employees per session} \times 1.5 \text{ hours} = 11 \text{ hours}$

**Costs:**  $11 \text{ hours} \times \$36.90 = \$406$

**F. Medical surveillance (§1910.1001(I))**

Pre-Placement examinations (§1910.1001(I)(2))

Before an employee is assigned to an occupation involving exposure to airborne concentrations of asbestos fibers at or above the TWA and/or EL, employers must provide a physical examination to the employee. For purposes of calculating burden hours and costs for new hires, OSHA estimates there is a 20% employee turnover in the industry. There are 4,837 employees eligible for medical surveillance program (1,391 primary manufacturing employee + 3,446 secondary manufacturing employees = 4,837). Each examination takes 1.5 hours of the employee's time (this includes 30 minutes of travel time). The burden is as follows:

**Burden hours:**  $4,837 \text{ examinations} \times 20\% \times 1.5 \text{ hour} = 1,451 \text{ hours}$

**Costs:**  $1,451 \text{ hours} \times \$22.30 = \$32,357$

Periodic examinations (§1910.1001(I)(3))

Employees receive only one examination annually, either pre-placement or periodic. Therefore, in most instances, the termination of employment examination is accounted for by these types of examinations. OSHA assumes one examination each year for the number of employees exposed (4,837). Each medical examination takes 1.5 hours of employee time (this includes 30 minutes of travel time). The burden for periodic and termination of employment exams is:

**Burden hours:**  $4,837 \text{ examinations} \times 1 \text{ examination per year} \times 1.5 \text{ hour} = 7,256 \text{ hours}$

**Costs:**  $7,256 \text{ hours} \times \$22.30 = \$161,809$

Medical questionnaire (§1910.1001(I)(2)(ii) and Appendix D))

In addition to the initial examination, paragraph (l)(2)(ii) of the Regulation requires that the medical questionnaire in Appendix D, Part 1 be administered to each employee. Completion of the questionnaire by an employee takes 30 minutes (.5 hour).

**Burden hours:** 4,837 employees x 20% turnover rate x 1 time x .5 hour = 484 hours  
**Costs:** 484 hours x \$22.30 = \$10,793

In addition to the periodic medical examination the follow-up medical questionnaire, Appendix D, Part 2, must be administered for each employee receiving a periodic examination. This questionnaire is a shorter questionnaire than the first pre-placement questionnaire. Employees take 10 minutes (.17 hour) to complete the briefer questionnaire.

**Burden hours:** 4,837 questionnaires x 1 per year x .17 hour = 822 hours  
**Costs:** 822 hours x \$22.30 = \$18,331

#### Information provided to the physician (§1910.1001(l)(6))

Employers take 5 minutes (.08 hour), per employee, to furnish the required information to the physician. The estimated number of examinations is based on the number of employees (4,837) and a 20% turnover rate or (4,837 x 1.2). A secretary, earning \$20.69 per hour provides the required information to the physician.

**Burden hours:** 4,837 employees x 1.2 turnover rate x 1 per year x .08 hour = 464 hours  
**Costs:** 464 hours x \$20.69 = \$9,600

#### Physician's written opinion (§1910.1001(l)(7))

To make and distribute a copy of the physician's written opinion to the employee takes an employer 5 minutes (.08 hour). As stated above the number of examinations is based on the number of employees (9,674) and a 20% turnover rate or (9,674 x 1.2). A secretary provides the opinion to the employee.

**Burden hours:** 4,837 employees x 1.2 turnover rate x 1/year x .08 hour = 464 hours  
**Costs:** 464 hours x \$20.69 = \$9,600

### **G. Recordkeeping (§1910.1001(m))**

Maintaining the records required by the regulation, takes a clerical employee 5 minutes (.08 hour) per record. Thus the burden for the recordkeeping provision is as follows:

#### Exposure monitoring records (§1910.1001(m)(1)(I))

##### Periodic monitoring for the EL

Primary manufacturing

**Burden hours:** (55 manufacturing facilities x 50%) x 4 samples/facility x 2 times/year  
x .08 hour = 18 hours  
**Costs:** 18 hours x \$20.69 = \$372

Secondary manufacturing

**Burden hours:** (66 manufacturing facilities x 50%) x 3 samples/facility x 2 times/year  
x .08 hour = 16 hours  
**Costs:** 16 hours x \$20.69 = \$331

Periodic monitoring for TWA

**Burden hours:** 145 workstations x 1 sample x 2 times/year x .08 hour = 23 hours  
**Costs:** 23 hours x \$20.69 = \$476

**Burden hours:** 219 workstations x 1 sample x 2 times/year x .08 hour = 35 hours  
**Costs:** 35 hours x \$20.69 = \$724

Additional monitoring PEL/EL

**Burden hours:** (55 manufacturing facilities x 50%) x 1 % x 4 samples/facility x 2  
times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

**Burden hours:** (66 manufacturing facilities x 50%) x 1 % x 3 samples/facility x 2  
times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

Additional monitoring (PEL/TWA)

**Burden hours:** 145 workstations x 1% x 1 sample x 2 times/year x .08 hour = 1 hour  
**Costs:** 1 hour x \$20.69 = \$21

**Burden hours:** 219 workstations x 1% x 1 sample x 2 times/year x .08 hour = 1  
hour  
**Costs:** 1 hour x \$20.69 = \$21

Medical records (§1910.1001(m)(3))

**Burden hours:** 4,837 employees x 1.2 turnover rate x 1/year x .08 hour = 464 hour  
**Costs:** 464 hours x \$20.69 = \$9,600

Training records (§1910.1001(m)(4))

Primary manufacturing

**Burden hours:** 1,391 employees x 20% turnover rate/20 employees per session x 1 time/year x .08 hour = 1 hour

**Costs:** 1 hour x \$20.69 = \$21

Secondary manufacturing

**Burden hours:** 3,446 employees x 20% turnover rate/20 employees per session x 1 time/year x .08 hour = 3 hours

**Costs:** 3 hours x \$20.69 = \$62

Primary manufacturing

**Burden hours:** 110 employees x 10% turnover rate/20 employees per session x .08 hour = 1 hour

**Costs:** 1 hour x \$20.69 = \$21

Secondary manufacturing

**Burden hours:** 133 employees x 10% turnover rate/20 employees per session x .08 hour = 1 hour

**Costs:** 1 hour x \$20.69 = \$21

Employee access

The Agency estimates that approximately 10% of the employees request to see his or her records annually, therefore the burden is as follows:

**Burden hours:** 4,837 employees x 10% x .08 hour = 39 hours

**Costs:** 39 hours x \$20.69 = \$807

Federal government access

In the past year, the Agency has conducted 80 inspections. A supervisor 5 minutes (.08 hour) to disclose records to compliance officers, thus the burden and cost is as follows:

**Burden hours:** 80 inspections x .08 hour = 6 hours

**Costs:** 6 hours x \$27.70 = \$166

**Transfer of records**

If at any time an employer ceases to do business and there is no successor employer to receive

and retain the records for the prescribed period, the employer shall notify the Director, at least three (3) months prior to disposal, and transmit them to the Director if required by the Director within that period.

In case any records are transferred to NIOSH in this year, it is assumed that 1 employer will send records to NIOSH, and that a secretary, earning \$20.69 per hour, would expend 1 hour to prepare and send records. Burden estimate is one hour, at a cost of \$21.

13. **Provide an estimate of the total annual cost burden to respondents or recordkeepers resulting from the collection of information. (Do not include the cost of any hour burden shown in Items 12 and 14).**
- **The cost estimate should be split into two components: (a) a total capital and start-up cost component (annualized over its expected useful life); and (b) a total operation and maintenance and purchase of services component. The estimates should take into account costs associated with generating, maintaining, and disclosing or providing the information. Include descriptions of methods used to estimate major cost factors including system and technology acquisition, expected useful life of capital equipment, the discount rate(s), and the time period over which costs will be incurred. Capital and start-up costs include, among other items, preparations for collecting information such as purchasing computers and software; monitoring, sampling, drilling and testing equipment; and record storage facilities.**
  - **If cost estimates are expected to vary widely, agencies should present ranges of cost burdens and explain the reasons for the variance. The cost of purchasing or contracting out information collection services should be a part of this cost burden estimate. In developing cost burden estimates, agencies may consult with a sample of respondents (fewer than 10), utilize the 60-day pre-OMB submission public comment process and use existing economic or regulatory impact analysis associated with the rulemaking containing the information collection, as appropriate.**
  - **Generally, estimates should not include purchases of equipment or services, or portions thereof, made: (1) prior to October 1, 1995, (2) to achieve regulatory compliance with requirements not associated with the information collection, (3) for reasons other than to provide information or keep records for the government, or (4) as part of customary and usual business or private practices.**

The Office of Regulatory Analysis has assumed that employers would contract out Industrial Hygiene Services at the costs of \$53 per hour. Thus the costs are as follows:

For the PEL/ EL periodic monitoring, it is assumed that 50% of the facilities will continue to exceed the limit and subsequently will perform semi-annual monitoring. It is estimated that approximately 55 primary and 66 secondary manufacturers will be affected. Also, 3 to 4 samples will be collected during each sampling period. Thus the costs are as follows:

Periodic monitoring for EL

Primary manufacturing

(55 Manufacturing facilities x 50%) x 4 samples/facility x 2 times/year x \$53 = \$11,660

### Secondary manufacturing

$(66 \text{ Manufacturing facilities} \times 50\%) \times 3 \text{ samples/facility} \times 2 \text{ times/year} \times \$53 = \$10,494$

For TWA monitoring, employers sample one employee at each workstation to represent the asbestos exposure of all employees working at that workstation. Workstations in primary manufacturing have approximately 9.6 employees per workstation. In secondary manufacturing there are 15.7 employees per station. To calculate sample numbers and derive burden, the estimated number of employees exposed above the level was divided by the average size workstation (9.6 and 15.7 workstations). Monitoring occurs twice annually; the costs are as follows:

### Periodic monitoring for TWA

#### Primary manufacturing

$1,391 \text{ employees} / 9.6 \text{ employees per workstation} = 145 \text{ workstations}$   
 $145 \text{ workstations} \times 1 \text{ sample} \times 2 \text{ times/year} \times \$53 = \$15,370$

#### Secondary manufacturing

$3,446 \text{ employees} / 15.7 \text{ employees per workstation} = 219 \text{ workstations}$   
 $219 \text{ workstations} \times 1 \text{ sample} \times 2 \text{ times/year} \times \$53 = \$23,214$

### Additional monitoring EL

A process change occurs at one percent of all facilities where exposures exceed the PEL/EL. Therefore, it was estimated that the burden associated will be as follows:

#### Primary manufacturing

$(55 \text{ Manufacturing} \times 50\%) \times 1\% \times 4 \text{ samples/facility} \times 2 \text{ times/year} \times \$53 = \$117$

#### Secondary manufacturing

$(66 \text{ Manufacturing} \times 50\%) \times 1\% \times 3 \text{ samples/facility} \times 2 \text{ times/year} \times \$50 = \$99$

### Additional monitoring TWA

A process change occurs at one percent of all facilities where exposures exceed the PEL/TWA. Therefore, it was estimated that the burden associated will be as follows:

#### Primary manufacturing

145 workstations x 1% x 1 sample x 2 times/year x \$53 = \$154

Secondary manufacturing

219 workstations x 1% x 1 sample x 2 times/year x \$53 = \$232

Monitoring Activity	Cost to Primary Manufacturing	Cost to Secondary Manufacturing	Total
Periodic Monitoring EL	\$11,660	\$10,494	\$22,154
Periodic Monitoring TWA	\$15,370	\$23,214	\$38,584
Additional Monitoring EL	\$117	\$99	\$216
Additional Monitoring TWA	\$154	\$232	\$386
Total			\$61,340

**Medical examinations**

4,837 examinations x 20% (turnaround) x 1 time x \$138 = \$133,501  
 4,837 examinations x 1 examination/year x \$138 = \$667,506  
 Total \$801,007

The total cost for respondent to conduct exposure monitoring and provide medical examinations is \$862,347.

- 14. Provide estimates of annualized cost to the Federal government. Also, provide a description of the method used to estimate cost, which should include quantification of hours, operational expenses (such as equipment, overhead, printing, and support staff), and any other expense that would not have been incurred without this collection of information. Agencies also may aggregate cost estimates from Items 12, 13, and in a single table.**

Transfer of records to NIOSH

The Standard requires that if an employer ceases to do business and there is no successor to preserve and maintain employee records for the required periods of time, the records must be transmitted to NIOSH. Also, at the expiration of the retention period for the records required to be maintained, employers must notify NIOSH at least three months prior to the disposal of such records and transmit those records to NIOSH if requested within the period.

The cost to the Federal government consists of the costs associated with processing records from employers who cease to do business and have no successor to preserve and maintain employee records, or when the retention period for those records has expired and NIOSH has requested the

records be transmitted to them. Determining which employer records are asbestos in construction versus ones that are in asbestos general industry is not readily identifiable. All records transferred to NIOSH were accounted for in the Asbestos in Construction ICR (1218-0134).

### **Federal Inspections**

The Agency assumes that it will take a compliance officer who earns \$39.70 per hour 10 minutes to review the records. Therefore, the cost to the Federal Government related to inspections is as follows:

**Costs:** 80 inspections x \$39.70 x .17 hour = \$540

- 15. Explain the reasons for any program changes or adjustments reporting in Items 13 or 14 of the OMB Form 83-I.**

The Agency is requesting an adjustment decrease of 11,916 hours. The decrease is primarily the result of the Agency decreasing the number of affected facilities by one-half. The primary facilities have reduced from 110 facilities to 55 facilities and the secondary facilities have reduced from 132 facilities to 66 facilities. Based on data from U. S. Geological Survey, the Agency assumes that the number of affected facilities has declined by one-half since the 1994 Final regulatory impact and regulatory flexibility analysis.

- 16. For collections of information whose results will be published, outline plans for tabulation, and publication. Address any complex analytical techniques that will be used. Provide the time schedule for the entire project, including beginning and ending dates of the collection information, completion of report, publication dates, and other actions.**

This collection of information will not have results that will be published for statistical use.

- 17. If seeking approval to not display the expiration date for OMB approval of the information collection, explain the reasons that display would be inappropriate.**

There are no forms on which to display the expiration date.

- 18. Explain each exception to the certification statement identified in Item 19. "Certification for Paperwork Reduction Act Submission," of OMB 83-I.**

The Collection of Information does not request any exemptions from the certification statement identified in Item 19 "Certification for Paperwork Reduction Act Submissions, "OMB Form 83-I."