reasonably be issued without this evidence, and; (C) the record is reopened for receipt of comments and/or a hearing on this evidence. This paragraph does not require the Secretary to consider any evidence which is submitted after the dates established for the submission of evidence.

(b) The failure of the Secretary to comply with the required timeframes shall not be a basis to set aside any standard or to require the issuance of a new proposal on any individual substance.

(c) The final standard shall state whether the substance or group of substances subject to the rulemaking is classified as a Category I Potential Carcinogen or as a Category II Potential Carcinogen. If the classification differs from that in the notice of proposed rulemaking, the Secretary shall explain the reasons for the change in classification in the preamble to the final standard.

(d) If the substance is classified as a Category I Potential Carcinogen, the final standard shall conform to the provisions of §1990.142(a)(2)(iii). If the final standard contains other provisions that substantially differ from the proposed provisions, the Secretary shall explain the reasons for the changes in the preamble to the final standard.

(e) If the substance is classified as a Category II potential carcinogen, the final standard shall conform to the provisions of §1990.142(a)(3)(iii). If the final standard contains other provisions that substantially differ from the proposed provisions, the Secretary shall explain the reasons for the changes in the preamble to the final standard.

(f) If the substance is classified as a Category II potential carcinogen, the Secretary shall notify the applicable federal and state agencies, including the Administrator of EPA, the Director of NCI, the Director of NIEHS, the Director of NIOSH, the Commissioner of FDA and the Chairperson of CPSC of such determination and request that the applicable agencies engage in, or stimulate, further research pursuant to their legislative authority, to develop new and additional scientific data.

(g) If, after a rulemaking, the Secretary determines that the substance under consideration should not be classified as a Category I potential carcinogen or a Category II potential carcinogen, the Secretary shall publish a notice of this determination in the FEDERAL REGISTER, together with the reasons therefor.

MODEL STANDARDS

§ 1990.151 Model standard pursuant to section 6(b) of the Act.

Occupational Exposure to ___________

Permanent Standard (insert section number of standard)

(a) Scope and application—(1) General. This section applies to all occupational exposures to ______ or to (specify those uses or classes of uses of ______ [Chemical Abstracts Service Registry Number 0000] which are covered by the standard, including, where appropriate, the type of exposure to be regulated by the standard) except as provided in paragraph (a)(2).

(2) Exemptions. This section does not apply to (insert those uses or classes of uses of ______ which are exempted from compliance with the standard, including, where appropriate,

(i) Workplaces where exposure to ______ results from solid or liquid mixtures containing a specified percentage of ______ or less;

(ii) Workplaces where another Federal agency is exercising statutory authority to prescribe or enforce standards or regulations affecting occupational exposure to ______; or

(iii) Workplaces which are appropriately addressed in a separate standard).

(b) Definitions.

______ means (definition of the substance, group of substances, or combination of substances, to be regulated).

Action level means an airborne concentration of ______ of (insert appropriate level of exposure).

NOTE: Where appropriate, consider an action level as a limitation on requirements for periodic monitoring (para. (e)(3)), medical surveillance (para. (n)), training (para. (o)), labels (para. (p)(3)), and other provisions.

Assistant Secretary means the Assistant Secretary of Labor for Occupational Safety and Health, U.S. Department of Labor, or designee.
Authorized person means any person specifically authorized by the employer whose duties require the person to enter regulated areas or any person entering such an area as a designated representative of employees for the purpose of exercising the opportunity to observe monitoring procedures under paragraph (r) of this section.

Director means the Director, National Institute for Occupational Safety and Health, U.S. Department of Health, and Human Services, or designee.

Emergency means any occurrence such as, but not limited to, equipment failure, rupture of containers, or failure of control equipment which may result in a massive release of which is (insert appropriate quantitative or qualitative level of release which constitutes an emergency).

OSHA Area Office means the Area Office of the Occupational Safety and Health Administration having jurisdiction over the geographic area where the affected workplace is located.

(c) Permissible exposure limits provisions—(1) Inhalation—(i) Time weighted average limit (TWA). Within (insert appropriate time period) of the effective date of this section, the employer shall assure that no employee is exposed to an airborne concentration of in excess of: (insert appropriate exposure limit or when it is determined by the Secretary that there are available suitable substitutes for uses or classes of uses that are less hazardous to humans, the proposal shall permit no occupational exposure) as an eight (8)-hour-time-weighted average. (Where the Secretary finds that suitable substitutes for may exist, the determination of the level shall include consideration of the availability, practicability, relative degree of hazard, and economic consequences of the substitutes.)

(ii) Ceiling limit (if appropriate). Within (insert appropriate time period) of the effective date of this section, the employer shall assure that no employee is exposed to an airborne concentration of in excess of: (insert exposure limit) as averaged over any: (insert appropriate time period) during the working day.

(2) Dermal and eye exposure. (As appropriate.) (i) Within (insert appropriate time period) of the effective date of this section, the employer shall (If eye exposure to does not create a risk of cancer, insert exposure level or criteria which will prevent other adverse health effects of eye exposure to if any. If eye exposure creates a risk of cancer, insert exposure level or criteria which represents the level of eye exposure to ).

(ii) Within (insert appropriate time period) of the effective date of this section, the employer shall (If skin exposure to does not create a risk of cancer, insert exposure level or criteria which will prevent other adverse health effects of skin exposure to if any. If skin exposure creates a risk of cancer, insert exposure level or criteria which represents the level of skin exposure to ).

(d) Notification of use and emergencies—(1) Use. Within (insert appropriate time period and additional information requirements if appropriate), of the effective date of this standard or within thirty days of the introduction of into the workplace, every employer who has a place of employment in which present shall report the address and location of each place of employment to the OSHA Area Office and an estimate of the number of employees exposed.

(2) Emergencies. Emergencies, and the facts obtainable at that time, shall be reported within (insert appropriate number) hours of, or during the first federal working day after, the time the employer becomes aware of the emergency to the OSHA Area Office, whichever is longer. Upon request of the OSHA Area Office, the employer shall submit additional information in writing relevant to the nature and extent of employee exposures and measures taken to prevent future emergencies of a similar nature.

(e) Exposure monitoring—(1) General. (i) Determinations of airborne exposure levels shall be made from air samples that are representative of each employee’s exposure over an eight (8) hour period. (Modify the time period as appropriate to be practical in the relevant industries yet reasonably representative of full shift exposures.) Monitoring of exposure levels required under this paragraph shall be made as
follows: [Insert method or alternative methods to be used to meet the requirements of this paragraph].

(ii) For the purpose of this section, employee exposure is that exposure which would occur if the employee were not using a respirator.

(2) Initial monitoring. Each employer who has one or more workplaces where (specify the types of workplaces subject to the monitoring requirement) shall, within (insert appropriate period) of the effective date of this section (insert requirements for initial monitoring, as appropriate).

(3) Frequency. (Insert, if appropriate, provisions prescribing the minimum frequency at which monitoring must be repeated, the conditions under which such frequency must be increased or may be reduced, and conditions under which such routine monitoring may be discontinued (for example, where the action level is not exceeded). Where appropriate, specify different frequency requirements for certain types of workplaces where, for example, exposure levels are subject to greater or less variability.)

(4) Additional monitoring. (Insert, if appropriate, provisions for monitoring, in addition to the requirements (if any) of paragraph (e)(3). This may include a production, process, control or personnel change which might result in new or additional exposure to 

or whenever the employer has any other reason to suspect a change which might result in new or additional exposure to 

(5) Employee notification. (i) Within (insert appropriate period) after the receipt of monitoring results, the employer shall notify each employee in writing of the results which represent that employee’s exposure.

(ii) Whenever the results indicate that the representative employee exposure exceeds the permissible exposure limits, the employer shall include in the written notice a statement that the permissible exposure limits were exceeded and a description of the corrective action being taken to reduce exposure to or below the permissible exposure limits.

(6) Accuracy of measurement. (Insert requirements for accuracy of methods of measurement or detection used to comply with the paragraph).

(f) Regulated areas—(1) Within (insert appropriate time period) of the effective date of this section, the employer shall, where practicable, establish regulated areas where concentrations are in excess of the permissible exposure limits.

(2) Regulated areas shall be demarcated and segregated from the rest of the workplace, in any manner that minimizes the number of persons who will be exposed to 

(3) Access to regulated areas shall be limited to authorized persons or to persons otherwise authorized by the Act or regulations issued pursuant thereto.

(4) The employer shall assure that in the regulated area, food or beverages are not present or consumed, smoking products are not present or used, and cosmetics are not applied (except that these activities may be conducted in the lunchroom, change rooms and showers required under paragraphs (m)(1) through (m)(3) of this section).

(g) Methods of compliance—(1) Engineering and work practice controls. (i) The employer shall institute engineering or work practice controls to reduce and maintain employee exposures to to or below the permissible exposure limits, except to the extent that the employer establishes that such controls are not feasible.

(ii) Engineering and work practice controls shall be implemented to reduce exposures even if they will not be sufficient to reduce exposures to or below the permissible exposure limits.

(2) Compliance program. (i) Within (insert appropriate period) of the effective date of this section, the employer shall establish and implement a written program to reduce exposures to or below the permissible exposure limits by means of engineering and work practice controls, as required by paragraph (g)(1) of this section.

(ii) Written plans for these compliance programs shall include at least the following:

(A) A description of each operation or process resulting in employee exposure to 

(B) Engineering plans and other studies contemplated or used to determine the controls for each process;
(C) A report of the technology considered or to be considered in meeting the permissible exposure limits;
(D) A detailed schedule for the implementation of engineering or work practice controls; and
(E) Other relevant information reasonably requested by OSHA.

(iii) Written plans for such a program shall be submitted, upon request, to the Assistant Secretary and the Director, and shall be available at the worksite for examination and copying by the Assistant Secretary, the Director, or any affected employee or designated representative.

(iv) The plans required by this paragraph shall be revised and updated periodically to reflect the current status of the program.

(h) Respiratory protection—(1) General. The employer shall assure that respirators are used where required pursuant to this section to reduce employee exposures to or below the permissible exposure limits and in emergencies. Compliance with the permissible exposure limits may not be achieved by the use of respirators except:

(i) During the time period necessary to install or implement feasible engineering and work practice controls; or

(ii) In work operations in which the employer establishes that engineering and work practice controls are not feasible; or

(iii) In work situations where feasible engineering and work practice controls are not yet sufficient to reduce exposure to or below the permissible exposure limits; or

(iv) In emergencies.

(2) Respirator selection. (i) Where respiratory protection is required under this section, the employer shall select and provide at no cost to the employee, the appropriate type of respirator from Table 1 below and shall assure that the employee wears the respirator provided.

Table 1—Respiratory Protection

| (The table will contain a listing of the appropriate type of respirator for various conditions of exposure to the...)

(ii) The employer shall select respirators from those approved by the National Institute for Occupational Safety and Health under the provisions of 30 CFR part 11.

(3) Respirator program. (i) The employer shall institute a respiratory protection program in accordance with 29 CFR 1910.134 (b), (d), (e), and (f).

(ii) Employees who wear respirators shall be allowed to wash their face and respirator facepiece to prevent potential skin irritation associated with respirator use.

(iii) The employer shall assure that the respirator issued to each employee is properly fitted (as appropriate, indicate the requirement for a qualitative or quantitative respirator fit testing program).

(i) Emergency situations—(1) Written plans. (i) A written plan for emergency situations shall be developed for each workplace where _____ is present. Appropriate portions of the plan shall be implemented in the event of an emergency.

(ii) The plan shall specifically provide that employees engaged in correcting emergency conditions shall be equipped with respirators as required in paragraph (b) of this section and other necessary personal protective equipment as required in paragraph (j) until the emergency is abated.

(2) Alerting employees—(i) Alarms. Where there is the possibility of employee exposure to _____ due to the occurrence of an emergency, a general alarm shall be installed and maintained to promptly alert employees of such occurrences.

(ii) Evacuation. Employees not engaged in correcting the emergency shall be restricted from the area and shall not be permitted to return until the emergency is abated.

(j) Protective clothing and equipment—(1) Provision and use. Where employees are exposed to eye or skin contact with _____ (insert criteria which trigger this requirement as appropriate), the employer shall, within (insert appropriate time period) of the effective date of this section provide at no cost to such employees, and assure that such employees wear, appropriate protective clothing or other equipment in accordance with 29 CFR 1910.132 and 1910.133 to protect the area of the body which may come in contact with _____.
(2) Cleaning and replacement. (i) The employer shall clean, launder, maintain, or replace protective clothing and equipment required to maintain their effectiveness.

(k) Housekeeping—(1) General. The employer shall, within appropriate time period of the effective date of this section, implement a housekeeping program to minimize accumulation of

(2) Specific provisions. The program shall include (insert appropriate elements).

(i) Periodic scheduling of routine housekeeping.

(ii) Provision for periodic cleaning of dust collection systems.

(iii) Provision for maintaining clean surfaces.

(iv) Provision for assigning personnel to housekeeping procedures; and the

(v) Provision for informing employees about housekeeping program.

(1) Waste disposal—(1) General. The employer shall assure that no waste material containing ______ is dispersed into the workplace, to the extent practicable.

(2) The employer shall label, or otherwise inform employees who may contact waste material containing ______, the contents of such waste material.

(3) (Insert specific disposal methods, as appropriate.)

(m) Hygiene facilities and practices. Where employees are exposed to airborne concentrations of ______ in excess of the permissible exposure limits specified in paragraph (c)(1), or where employees are required to wear protective clothing or equipment pursuant to paragraph (j) of this section, or where otherwise found to be appropriate, the following facilities shall be provided by the employer for the use of those employees and the employer shall assure that the employees use the facilities provided.

[Specify appropriate hygiene facilities and practices such as]:

(1) Change rooms. The employer shall provide clean change rooms in accordance with 29 CFR 1910.141(e).

(2) Showers. (i) The employer shall provide shower facilities in accordance with 29 CFR 1910.141(d)(3).

(ii) The employer shall assure that employees exposed to ______ shower at the end of the work shift.

(3) Lunchrooms (if appropriate or other suitable requirements depending on the circumstances). Whenever food or beverages are consumed in the workplace, the employer shall provide lunchroom facilities which have a temperature controlled, positive pressure, filtered air supply, and which are readily accessible to employees exposed to ______.

(n) Medical surveillance—(1) General. (i) The employer shall institute a program of medical surveillance for (specify the types of employees subject to the medical surveillance requirement, for example, by specifying the level, duration, and frequency of exposure to ______ which make medical surveillance appropriate for individual employees). The employer shall provide each such employee with an opportunity for medical examinations and tests in accordance with this paragraph.

(ii) The employer shall assure that all medical examinations and procedures are performed by or under the supervision of a licensed physician, and shall be provided without cost to the employee.

(2) Initial examinations. Within (insert appropriate time period) of the effective date of this section or thereafter, the employer shall provide each employee specified in paragraph (n)(1) of this section an opportunity for a medical examination, including at least the following elements:

(i) A work history and a medical history which shall include: (insert specific areas to be covered pertinent to the health hazards posed by ______).

(ii) A physical examination which shall include: (insert specific tests, procedures, etc., pertinent to the health hazards posed by ______.) Where appropriate, provide that the examining physician shall conduct such additional examinations and tests as are needed according to his professional judgment).
NOTE: Where appropriate, require or permit different medical protocols, or different frequencies of medical examinations, for separate sub-populations of employees covered under paragraph (n)(1).

(3) Periodic examinations. (i) The employer shall provide the examinations specified below in this subparagraph at least (insert appropriate time) for all employees specified in paragraph (n)(3)(i) of this section: (insert appropriate medical protocol for periodic examinations).

(ii) If an employee has not had the examinations prescribed in paragraph (n)(3)(i) of this section within (insert appropriate time period) prior to termination of employment, the employer shall make such examination available to the employee upon such termination.

(4) Additional examinations. If the employee for any reason develops signs or symptoms commonly associated with exposure to \( \text{lll} \), the employer shall provide appropriate examination and emergency medical treatment.

(5) Information provided to the physician. The employer shall provide the following information to the examining physician:

(i) A copy of this standard and its appendices;

(ii) A description of the affected employee’s duties as they relate to the employee’s exposure;

(iii) The employee’s actual or representative exposure level;

(iv) The employee’s anticipated or estimated exposure level (for preplacement examinations or in cases of exposure due to an emergency);

(v) A description of any personal protective equipment used or to be used; and

(vi) The names and addresses of physicians who, under the sponsorship of the employer, provided previous medical examinations of the affected employee, if such records are not otherwise available to the examining physician.

(6) Physician’s written opinion. (i) The employer shall obtain a written opinion from the examining physician which shall include:

(A) The physician’s certification that he has received the information from the employer required under the paragraph (n)(5) and has performed all medical examinations and tests which are in his opinion appropriate under this standard;

(B) The physician’s opinion as to whether the employee has any detected medical condition which would place the employee at an increased risk of material impairment of the employee’s health from exposure to \( \text{lll} \);

(C) Any recommended limitations upon the employee’s exposure to \( \text{lll} \) or upon the use of protective clothing and equipment such as respirators; and

(D) A statement that the employee has been informed by the physician of the results of the medical examination and any medical conditions which require further examination or treatment.

(ii) The employer shall instruct the physician not to reveal in the written opinion specific findings or diagnoses unrelated to occupational exposure to \( \text{lll} \);

(iii) The employer shall provide a copy of the written opinion to the affected employee.

(o) Employee information and training—(1) Training program. (i) Within (insert appropriate time period) from the effective date of this section, the employer shall institute a training program for all employees who (specify the employees subject to the training requirement), and shall assure their participation in the training program.

(ii) The training program shall be provided at the time of initial assignment, or upon institution of the training program, and at least (insert appropriate time period) thereafter, and the employer shall assure that each employee is informed of the following:

NOTE: Specify, as appropriate, some or all of the following information, or any other appropriate information. Where appropriate, require training programs with different contents, or different frequencies, for separate subpopulations of the employees specified in paragraph (o)(1).

(A) The information contained in the Appendices;

(B) The quantity, location, manner of use, release or storage of \( \text{lll} \) and the specific nature of operations which could result in exposure to \( \text{lll} \) as well as any necessary protective steps;
Occupational Safety and Health Admin., Labor § 1990.151

3 The purpose, proper use, and limitations of respirators;
3) The purpose and a description of the medical surveillance program required by paragraph (n) of this section;
3) The emergency procedures developed, as required by paragraph (i) of this section;
3) The engineering and work practice controls, their function and the employee’s relationship thereto; and
3) A review of this standard.

(2) Access to training materials.
3) The employer shall make a copy of this standard and its appendices readily available to all affected employees.
3) The employer shall provide, upon request, all materials relating to the employee information and training program to the Assistant Secretary and the Director.

(p) Signs and labels—(1) General. (i) The employer may use labels or signs required by other statutes, regulations, or ordinances in addition to, or in combination with, signs and labels required by this paragraph.

(i) The employer shall assure that no statement appears on or near any sign or label, required by this paragraph, which contradicts or detracts from the meaning of the required sign or label.

(2) Signs. (i) The employer shall post signs to clearly indicate all workplaces. (Specify as appropriate the description of the area to be signposted such as “where employees are exposed to _________,” or “where exposures exceed the action level,” or “where exposures exceed the PEL,” or “which are regulated areas”). The signs shall bear the following legend:

DANGER

(insert appropriate trade or common names)

CANCER HAZARD

AUTHORIZED PERSONNEL ONLY

(ii) The employer shall assure that signs required by this paragraph are illuminated and cleaned as necessary so that the legend is readily visible.

(iii) Where airborne concentrations of ______ exceed the permissible exposure limits, the signs shall bear the additional legend: “Respirator Required” or “Respirator May Be Required” as appropriate.

(3) Labels. (i) The employer shall assure that precautionary labels are affixed to all containers of ______ and of products containing ______ (specify if appropriate suitable modifications), and that the labels remain affixed when the ______ or products containing ______ are sold, distributed or otherwise leave the employer’s workplace.

(ii) The employer shall assure that the precautionary labels required by this paragraph are readily visible and legible. The labels shall bear the following legend:

DANGER

CONTAINS ______

CANCER HAZARD

Note: Utilize the clause “POTENTIAL CANCER HAZARD” if it is appropriate to include a signs and labels provision for a Category II potential carcinogen.

(q) Recordkeeping—(1) Exposure monitoring. (i) The employer shall establish and maintain an accurate record of all monitoring required by paragraph (e) of this section.

(ii) This record shall include:

(A) The dates, number, duration, and results of each of the samples taken, including a description of the sampling procedure used to determine representative employees' exposure;

(B) A description of the sampling and analytical methods used;

(C) Type of respiratory protective devices worn, if any; and

(D) Name, social security number and job classification of the employees monitored and of all other employees whose exposure the measurement is intended to represent.

(iii) The employer shall maintain this record for (insert appropriate period) or for the duration of employment plus (insert appropriate period) whichever is longer.

(2) Medical surveillance. (i) The employer shall establish and maintain an accurate record of each employee subject to medical surveillance as required by paragraph (n) of this section.

(ii) This record shall include:

(A) A copy of the physicians' written opinions or a written explanation of
29 CFR Ch. XVII (7-1-12 Edition)

§ 1990.151

the absence of any such opinion or employee refusal to take the medical examination:

(B) Any employees medical complaints related to exposure to  

(C) A copy of the information provided to the physician as required by paragraphs (n)(5)(ii) through (v) of this section unless it is systematically retained elsewhere by the employer for the period of time specified in paragraph (q)(2)(ii); and

(D) A copy of the employee’s work history.

(iii) The employer shall assure that this record be maintained for (insert appropriate period) or for the duration of employment plus (insert appropriate period) whichever is longer.

(3) Availability. (i) The employer shall assure that all records required to be maintained by this section be made available upon request to the Assistant Secretary and the Director for examination and copying.

(ii) Employee exposure measurement records and employee medical records required by this section shall be provided upon request to employees, designated representatives, and the Assistant Secretary in accordance with 29 CFR 1910.20(a) through (e) and (g) through (i).

(4) Transfer of records. (i) Whenever the employer ceases to do business, the successor employer shall receive and retain all records required to be maintained by this section.

(ii) Whenever the employer ceases to do business and there is no successor employer to receive and retain the records for the prescribed period, these records shall be transmitted to the Director.

(iii) At the expiration of the retention period for the records required to be maintained pursuant to this section, the employer shall transmit these records to the Director.

(iv) The employer shall also comply with any additional requirements involving transfer of records set forth in 29 CFR 1910.20(h).

Note: Include other recordkeeping requirements if appropriate.

(r) Observation of monitoring—(1) Employee observation. The employer shall provide affected employees, or their designated representatives, an opportunity to observe any monitoring of employee exposure to conducted pursuant to paragraph (e) of this section.

(2) Observation procedures. (i) Whenever observation of the monitoring of employee exposure to requires entry into an area where the use of protective clothing or equipment is required, the employer shall provide the observer with personal protective clothing or equipment required to be worn by employees working in the area, assure the use of such clothing and equipment, and require the observer to comply with all other applicable safety and health procedures.

(ii) Without interfering with the monitoring, observers shall be entitled to:

(A) Receive an explanation of the measurement procedures;

(B) Observe all steps related to the measurement of airborne concentrations of performed at the place of exposure; and

(C) Record the results obtained, and receive results supplied by the laboratory.

(s) Effective date. This section shall become effective (insert effective date).

(t) Appendices. The information contained in the appendices is not intended, by itself, to create any additional obligations not otherwise imposed or to detract from any existing obligation. (In normal circumstances three appendices will be included in each standard, an “Appendix A—Substance Safety Data Sheet,” an “Appendix B—Substance Technical Guidelines,” and an “Appendix C—Medical Surveillance Guidelines.” Insert additional appendices or delete any of the suggested appendices as appropriate.)