WORKER PROTECTION STANDARDS: THE FINAL CHAPTER

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Here it is; the follow-up article on Worker Protection Standards (WPS). To refresh your memory, you may want to refer back to the April 1993 Bulletin ("Updated worker safety regulations: are you ready?" NC Commercial Flower Growers' Bul., 38(2):1-11), where we discussed the sections (¶) of WPS that went into effect on 21 April 1993. Those sections addressed: 1) Restrictions associated with pesticide applications; 2) Restrictions on worker reentry after pesticide application; and 3) Requirements for notification of pesticide applications. The April article contains ¶ 170.110 through ¶ 170.124 of the WPS as recorded in Vol. 57, No. 163 of the Federal Register (FR 38102)

This article addresses and contains the remaining sections of the WPS not discussed in the April Bulletin, ¶¶ 170.1-170.102 and 170.1-170.260. As we stated in the first article, the Federal Register is never going to make the best seller list; it is difficult to read and comprehend. Hopefully the attached text will assist readers in following the WPS and complying with the regulations. We will discuss the WPS sections in the order that they appear in the legislation.

Subpart A--General Provisions

Scope and Purpose of the WPS. Section 170.1 briefly describes what the intent of the WPS is and what it hopes to accomplish with respect to worker safety. In essence, the legislation was put in place to reduce/prevent employees' contact with pesticides.

Definitions used in the WPS. Please take the time to read over the definitions in ¶170.3. You need to know how EPA defines our industry, especially phrases such as "hand labor," "handler," and "worker."

The hand labor definition (defined as any activity that causes a worker to have substantial contact with pesticide residues) is important because guidelines for early entry during a restricted entry interval (REI) <u>prohibit</u> employees from conducting hand labor activities. The good news is: "hand labor does not include operating, moving or repairing irrigation or watering equipment." Therefore, workers can enter a treated area under a REI to water plants or turn on/off irrigation equipment, provided the equipment is free of pesticide residues and the procedure for early entry as outlined in ¶ 170.112(c) is followed. Keep in mind that workers must wear appropriate personal protective equipment (PPE) during early entry, and that the time workers can be in treated areas under a REI is restricted to 1 hour in any 24-hour period.

The distinction between a *handler* and a *worker* is very important because your training obligations are different for the two categories. Handlers perform tasks where they come in contact with pesticides and pesticide residues.

Any worker that conducts handler tasks (as outlined in the definition) is considered a handler. You must provide additional pesticide safety training and task training for handlers (¶ 170.230-170.234) than is required for workers (¶ 170.130). Make sure every worker performing handler tasks has been trained and certified (¶ 170.230[d]) as a handler.

Compliance Dates. You should already be complying with the sections discussed last April; those provisions went into effect 21 April 1993. The compliance date for all other provisions is 15 April 1994. As was pointed out in the October issue of the Bulletin ("WPS inspections: get ready for them," N.C. Commercial Flower Growers' Bul. 38(5):15-19), we do not have much time until compliance inspections begin.

Duties of the Agricultural Employer. Section 170.7 clearly states that the responsibility for compliance falls upon the agricultural employer. It also prohibits employers from preventing, discouraging, or penalizing compliance with the WPS.

Violations of the WPS. Section 170.9 describes what will happen if an employer or someone in his/her employment violates or is not in compliance with any provision of the WPS. Such an act will be considered a violation of the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA). Violations of FIFRA will result in "civil penalties" and "criminal sections."



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Subpart B--Standard for Workers

Applicability of this subpart. According to ¶170.102, you must comply with all sections of Subpart B when any pesticide product is used on your agricultural establishment in the production of agricultural plants except when one of the sets of circumstances of ¶170.102(b)(1-10) occurs.

The only exemptions of Subpart B are for owners and members of their immediate family. These people are exempt from the pesticide safety training, pesticide application notification, decontamination, and emergency assistance provisions found in ¶ 170.112(c)(5) through (9) as referenced in ¶¶ 170.112(d)(2)(iii) and 170.112(e); and ¶¶ 170.120,170.122,170.130,170.135,170.150, and 170.160. However, owners must provide any protections required by these sections to other workers who are not members of their immediate family. Also, owners and their immediate family are not exempt from pesticide-specific requirements found on pesticide labels, such as PPE requirements and REI time periods.

Pesticide Safety Training. All workers except certified applicators, certified handlers, the owner, and immediate family members of the owner must be trained according to the guidelines in § 170.130. Some of the highlights of this section are: (1) workers must complete the training prior to performing early-entry activities during the REI; (2) until 20 October 1997, workers must complete training before the 16th day of entering an area that has been under a REI with the past 30 days; (3) after 20 October 1997, workers must complete training before the 6th day of entering an area that has been under a REI within the past 30 days; (4) training must be repeated every 5 years, and a training certificate is only good for 5 years counting from the end of the month in which the training was completed; (5) training must include written or audiovisual materials and must be presented "in a manner that the workers can understand" (such as through a translator); (6) the person conducting the training must respond to workers' questions during the training, must meet at least one of the criteria listed in ¶ 170.130(c)(2)(i-iv) (the trainer must be a certified applicator, a trainer of certified applicators, someone who has completed an approved train-the-trainer course, or a trained handler), and must assure that the worker received the training prior to issuing a training certificate; (7) the training materials used must contain the information listed in ¶ 170.130(c)(4)(i-xi); and (8) it is the employer's responsibility to assure that workers meet the requirements of this section.

Posted Pesticide Safety Information. The requirement for posting pesticide safety information is outlined in ¶ 170.135 (for workers) and is repeated again in ¶ 170.235 (for handlers). The requirements for workers and handlers are identical with respect to safety information needed: (1) you must display a pesticide safety poster that conveys the concepts listed in ¶ 170.135(b) [same as ¶ 170.235(b)]; (3) the information has to be legible; (4) it must be displayed at

a central location that is accessible to workers and workers are to be informed of the location; and (5) the information must be displayed until at least 30 days after the most recent REI on your establishment expires (which will probably mean it must always be displayed). The EPA is currently developing a safety poster that will meet the requirements of this section of use by agricultural employers. We will announce in the Bulletin if/when the poster becomes available.

Establishing a Decontamination Site. You must provide a decontamination site for workers to wash off pesticide residues according to the provisions in ¶ 170.150. The site must contain: (1) enough water for routine washing and emergency eye flushing (EPA recommends supplying at least 1 gal/worker/day; water must be of a quality and temperature that will not cause illness or injury when used for washing, eye flushing, or if swallowed); (2) sufficient supplies of soap and single-use towels for washing.

If workers are performing early-entry activities and workers are required to wear protective eye wear during early-entry, you must also supply each worker with at least 1 pint of water for emergency eye flushing in case of an emergency. Eye flushing water must be immediately available to early-entry workers when eye wear is part of the required PPE. The decontamination site for early-entry workers must be located where they remove their PPE. This site must contain: (1) enough water to allow early-entry workers to wash thoroughly after removing their PPE; and (2) sufficient supplies of soap and single use towels for washing.

There are location requirements for the decontamination site listed in ¶ 170.150(c) that must be followed. For example, the site cannot be in an area being treated with pesticides and cannot be in an area under a REI unless it is for workers performing early-entry task and no other site would be reasonably accessible to the workers.

Supplying Emergency Assistance. Section 170.160 outlines the procedures that must be followed in the case of a suspected pesticide poisoning or exposure injury. You must supply the worker with prompt transportation to an emergency medical facility. You must also supply the worker or the attending medical personnel with the label information and a description of the pesticide exposure as outlined in § 170.160(b).

<u>Subpart C--Standard for Pesticide</u> <u>Handlers</u>

Applicability of this subpart. Provisions in section apply whenever any pesticide is handled for use of an agricultural establishment <u>except</u> when one of the sets of circumstances of ¶ 170.202(b)(1-9) occurs. The only <u>exemptions</u> of Subpart B are for owners and members of their immediate family. These people are exempt from the pesticide safety training, pesticide application notification, decontamination, visual monitoring requirements during applications, application equipment training, PPE training, and

emergency assistance provisions found in ¶¶ 170.210 (b) and (c), 170.222, 170.230, 17-.234, 170.235, 170.240(e) through (g), 170.250, and 170.260. However, owners must provide any protections required by these sections to other handlers who are not members of their immediate family.

Restrictions during applications. Section 170.210 outlines specific restrictions that must be followed by handlers during pesticide applications. They are: (1) no pesticide shall be applied so as to in any way contact any worker, or other person (such as a customer!), other than an appropriately trained and equipped (with appropriate PPE) handlers; (2) handlers must be monitored visually or by voice communication at least every two hours when they are handling a product that bears the skull and crossbones symbol on the label; (3) any handler handling a fumigant or entering a greenhouse prior to the completion of ventilation criteria outlined in ¶ 170.110(c)(3) must maintain continuous visual or voice contact with another handler; and (4) the "contact handler" described above must have immediate access to PPE required by the fumigant label, in case emergency entry for rescue becomes necessary.

Providing specific information about applications to handlers. Section 170.222 repeats ¶ 170.122 (discussed in the April 1993 issue of the Bulletin). These sections list the information about pesticide applications that must be posted, when it should be posted, and how long it has to remain posted. This "pesticide information poster" must



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contain: (1) the location and description of the treated area; (2) the product name, EPA registration number, and active ingredient(s) of the pesticide; (3) the time and date the pesticide is to be/was applied; and (4) the REI for the pesticide. This information must be posted before the application takes place and the information must stay posted for 30 days after the end of the REI, or 30 days after the end of the application, if no REI is required by the pesticide product label.

Notice of applications to agricultural employers. If you are an independent handler company making pesticide applications on an agricultural establishment, you must inform the agricultural employer of the information outlined in ¶170.224 prior to the pesticide application. If you are a greenhouse contracting with an off-site pesticide application company, make sure they comply with this section. You will need the information required so that you can post it in accordance with ¶¶170.120, 170.122, and 170.222.

Pesticide safety training for handlers. Unless your handler employees have a restricted-use pesticide applicators license or have already completed the training program outlined in ¶ 170.230, you must assure that your handlers have been trained prior to allowing them perform any handling tasks. We suggest that you require all handlers to be licensed. This assures compliance with the safety training requirements and also allows your handlers to be certified safety trainers, capable of giving workers safety training as required in ¶ 170.130. If you prefer to hire non-licensed handlers, then you must assure that your handlers receive the training outlined in ¶ 170.230(c). Please read over this section, if you plan on supplying the safety training to your handlers yourself. Be able to verify that your handlers have received the safety training, as outlined in ¶ 170.230(d).

Knowledge of labeling and site-specific information. Section 170.232 requires handler employers to: (1) assure that handlers either read the product labeling or have been informed of all labeling requirements for a pesticide product prior to handling that product; and (2) assure that the handler has access to the product labeling information during handling activities.

This section also requires handler employers working for a commercial pesticide handling company to assure that their handler employees have knowledge of pesticide applications made on the agricultural establishment on which the handler will be working. This means that if you hire in a commercial pesticide applicator from an off-site company, you must inform that handler employer of any pesticide applications made previously on your establishment so they can pass that information on to their employees.

Safe operation of pesticide equipment. There are three main points to ¶ 170.234 dealing with operation of pesticide mixing, loading, transferring, and application equipment: (1) handlers must be trained to properly use pesticide

equipment prior to using the equipment: (2) equipment must be inspected and repaired (if necessary) prior to each day of use; and (3) pesticide residue must be removed prior to equipment inspection/repair.

If it is not feasible to remove pesticide residue from equipment prior to repairing/adjusting/cleaning the equipment, then you must notify the worker who repairs, cleans, or adjusts the equipment of the information found in ¶ 170.234(c)(1-3) that warns the worker of possible effects of exposure to pesticides.

Posted pesticide safety information. Section 170.235 is identical to ¶ 170.135, discussed earlier in this article. In essence, the pesticide safety poster information is the same for both workers and handlers.

Personal protective equipment. The complete treatise on PPE is given in ¶ 170.240. You are required to assure that handlers wear the clothing and PPE specified on the labeling for use of a pesticide. The definition and provision of PPE articles are given in § 170.240(b-c). Make sure that the PPE you supply to your handlers meets the specifications outlined in this section. For example, only four types of eve wear meet the definition of "protective eye wear" [¶ 170.240(c)(7)].

There are special substitutions allowable for PPE, as outlined in § 170.240(d), dealing with specific body protection PPE; substitutions when using a closed system for pesticide application: acceptable PPE substitutions when using an enclosed cab application vehicle; substitutions allowable for aerial applicators; and PPE substitutions for use by crop advisors. If any of these situations apply to your establishment, then read over subsection (d) of ¶ 170.240 carefully.

Subsection (e) of ¶ 170.240 requires you to assure that PPE is used correctly, that PPE is inspected before each day of use for damage, and that damaged PPE is repaired or discarded if needed. Subsection (f) outlines the cleaning and maintenance requirements for PPE. It also defines when respirator filters need to be replaced. Make sure you are cleaning and maintaining PPE according to these guidelines. Subsection (g) of ¶ 170.240 requires handler employers to take all possible steps to prevent heat-related illnesses. As mentioned in October issue of the Bulletin, there is an excellent pamphlet series available from your County Extension Center or NCDA dealing with PPE selection, PPE maintenance, and avoidance of heat stress.

Decontamination. Just as for all workers and early-entry workers, there is a requirement for a decontamination site for handlers during any handling activity. The "decon" site requirements for handlers are the same as for early-entry workers plus an additional requirement for one clean change of clothing, such as coveralls, and enough water to "wash the entire body" rather than to "wash thoroughly." There are slight differences in location requirements for handler decon and worker decon. The handler decon site

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can be in an area to be treated, if no other area is available. If the decon site is in an area to be treated with pesticides, the soap, towels, and clothes must be in a sealed container and the wash water must either be running water or in a closed/sealed container. You must also supply soap, single-use towels, and enough water for thorough washing at the site where handlers remove their PPE (this can be the same site as the handler decon site).

Emergency assistance. Section 170.260 is identical to ¶ 170.160, discussed earlier. You are required to have emergency transportation assistance available to both handlers and workers.

Closing Comments

Please take time to read the sections of the WPS enclosed in Figure 1 or at the very least, refer back to each subsection as you reread this article. The EPA has printed a 140page compliance guide for WPS, "The worker protection standard for agricultural pesticides--how to comply," which is available for about \$15.00. Call the Southeast regional office of EPA at (404)347-5201 for ordering information. NCDA will be sending out pesticide application warning signs and order forms for this EPA compliance guide to all certified applicators in the state. Another source of the EPA compliance guide is Gempler's, an excellent safety supply company. Gempler's has copies of the EPA plus another 14 pages outlining their product line that includes EPA/ WPS-approved respirators; all types of PPE; eye flush kits: copies of the EPA safety poster, information chart, and emergency information chart; and a worker and handler safety training video. The cost of the Gempler's reference guide is only \$5.85 (including shipping). Call (800)381-8473 to order this guide; it's less expensive than ordering the manual from EPA. Even if you do not intend to purchase equipment from Gempler's, the reference guide and descriptions of EPA/WPA-approved equipment makes it a valuable resource to have on hand.

Where else can you turn to for assistance with WPS? The North Carolina Cooperative Extension Service (NCCES) has committed to teaching employers how to comply with WPS. Pesticide applicators license certification and recertification courses will both contain sections on WPS. The NCCES will also offer "how to conduct safety training for workers" and "how to conduct safety training for handlers" classes during 1994 and probably 1995. You or whoever will be conducting the safety training for your business should plan on attending one of these courses. Contact your county Cooperative Extension Center for dates and times for training programs.

The EPA still has not ruled on a petition for exemptions to the WPS by cut flower and cut foliage producers. There are also other proposed rules (not included in Figure 1) dealing with hazard communication (already covered by OSHA regulations in 29 CFR 1928.21. There has been no ruling on whether or not they will be instated. We will keep you informed of any rulings by EPA as we hear of them.

The set of regulations is at first very overwhelming. Please take time to know your responsibilities and assure that you will be in compliance by the effective dates of the regulations. We do not have much time until compliance inspections begin.

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(Editors note: When you see Doug Bailey at the SGCTS in June, thank him for putting in the arduous work required to bring this to us. (Of course, as you know, he's native to Athens, Georgia ..nuf said...) Thanks Doug!

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Subpart A—General Provisions

§ 170.1 Scope and purpose.

This part contains a standard designed to reduce the risks of illness or injury resulting from workers' and handlers' occupational exposures to pesticides used in the production of agricultural plants on farms or in nurseries, greenhouses, and forests and also from the accidental exposure of workers and other persons to such pesticides. It requires workplace practices designed to reduce or eliminate exposure to pesticides and establishes procedures for responding to exposure-related emergencies.

§ 170.3 Definitions.

Terms used in this part have the same meanings they have in the Federal Insecticide, Fungicide, and Rodenticide Act, as amended. In addition, the following terms, when used in this part, shall have the following meanings:

Agricultural employer means any person who hires or contracts for the services of workers, for any type of compensation, to perform activities related to the production

of agricultural plants, or any person who is an owner of or is responsible for the management or condition of an agricultural establishment that uses such workers.

Agricultural establishment means any farm, forest, nursery, or greenhouse.

Agricultural plant means any plants grown or maintained for commercial or research purposes and includes, but is not limited to, food, feed, and fiber plants; trees; turfgrass; flowers, shrubs; ornamentals; and seedlings.

Chemigation means the application of pesticides through irrigation systems.

Commercial pesticide handling establishment means any establishment, other than an agricultural establishment, that:

- (1) Employs any person, including a self-employed person, to apply on an agricultural establishment, pesticides used in the production of agricultural plants.
- (2) Employs any person, including a self-employed person, to perform on an agricultural establishment, tasks as a crop advisor.

Crop advisor means any person who is assessing pest numbers or damage, pesticide distribution, or the status or requirements of agricultural plants. The term does not include any person who is performing hand labor tasks.

Early entry means entry by a worker into a treated area on the agricultural establishment after a pesticide application is complete, but before any restricted-entry interval for the pesticide has expired.

Farm means any operation, other than a nursery or forest, engaged in the outdoor production of agricultural plants.

Forest means any operation engaged in the outdoor production of any agricultural plant to produce wood fiber or timber products.

Fumigant means any pesticide product that is a vapor or gas, or forms a vapor or gas on application, and whose method of pesticidal action is through the gaseous state.

Greenhouse means any operation engaged in the production of agricultural plants inside any structure or space that is enclosed with nonporous covering and that is of sufficient size to permit worker entry. This term includes, but is not limited to, polyhouses, mushroom houses, rhubarb houses, and similar structures. It does not include such structures as malls, atriums, conservatories, arboretums, or office buildings where agricultural plants are present primarily for aesthetic or climatic modification.

Hand labor means any agricultural activity performed by hand or with hand tools that causes a worker to have substantial contact with surfaces (such as plants, plant parts, or soil) that may contain pesticide residues. These activities include, but are not limited to, harvesting, detasseling, thinning, weeding, topping, planting, sucker removal, pruning, disbudding, roguing, and packing produce into containers in the field. Hand labor does not include operating, moving or repairing irrigation or watering equipment or performing the tasks of crop advisors.

Handler means any person, including a self-employed erson:

(1) Who is employed for any type of compensation by

an agricultural establishment or commercial pesticide handling establishment to which subpart C of this part applies and who is:

- (i) Mixing, loading, transferring, or applying pesticides.
- (ii) Disposing of pesticides or pesticide containers.
 - (iii) Handling opened containers of pesticides.
 - (iv) Acting as a flagger.
- (v) Cleaning, adjusting, handling, or repairing the parts of mixing, loading, or application equipment that may contain pesticide residues.
 - (vi) Assisting with the application of pesticides.
- (vii) Entering a greenhouse or other enclosed area after the application and before the inhalation exposure level listed in the labeling has been reached or one of the ventilation criteria established by this part (§ 170.110(c)(3)) or in the labeling has been met:
 - (A) To operate ventilation equipment.
- (B) To adjust or remove coverings used in furnigation.
 - (C) To monitor air levels.
- (viii) Entering a treated area outdoors after application of any soil furnigant to adjust or remove soil coverings such as tarpaulins.
 - (ix) Performing tasks as a crop advisor:
 - (A) During any pesticide application.
- (B) Before the inhalation exposure level listed in the labeling has been reached or one of the ventilation criteria established by this part (§ 170.110(c)(3)) or in the labeling has been met.
 - (C) During any restricted-entry interval.
- (2) The term does not include any person who is only handling pesticide containers that have been emptied or cleaned according to pesticide product labeling instructions or, in the absence of such instructions, have been subjected to triple-rinsing or its equivalent.

Handler employer means any person who is selfemployed as a handler or who employs any handler, for any type of compensation.

Immediate family includes only spouse, children, stepchildren, foster children, parents, stepparents, foster parents, brothers, and sisters.

Nursery means any operation engaged in the outdoor production of any agricultural plant to produce cut flowers and ferns or plants that will be used in their entirety in another location. Such plants include, but are not limited to, flowering and foliage plants or trees; tree seedlings; live Christmas trees; vegetable, fruit, and ornamental transplants; and turfgrass produced for sod.

Owner means any person who has a present possessory interest (fee, leasehold, rental, or other) in an agricultural establishment covered by this part. A person who has both leased such agricultural establishment to another person and granted that same person the right and full authority to manage and govern the use of such agricultural establishment is not an owner for purposes of this part.

Restricted-entry interval means the time after the end of a pesticide application during which entry into the treated

area is restricted.

Treated area means any area to which a pesticide is being directed or has been directed.

Worker means any person, including a self-employed person, who is employed for any type of compensation and who is performing activities relating to the production of agricultural plants on an agricultural establishment to which subpart B of this part applies. While persons employed by a commercial pesticide handling establishment are performing tasks as crop advisors, they are not workers covered by the requirements of subpart B of this part.

§ 170.5 Effective date and compliance dates.

- (a) Effective date. The effective date for this part, including § 170.112(e), shall be October 20, 1992.
- (b) Accelerated provisions. The compliance date shall be April 21, 1993, for:
 - (1) Section 170.112(a) through (c)(3);
 - (2) Section 170.112(d)(1) through (d)(2)(ii);
- (3) The requirement of § 170.112(c)(3) as referenced in § 170.112(d)(2)(iii);
- (4) The requirement of § 170.112(c)(3) as referenced in § 170.112(e)(5);
 - (5) Section 170.120(a)(3); and
 - (6) Section 170.120(b)(3).
- (c) All other provisions. The compliance date for all other provisions of this part shall be April 15, 1994.

§ 170.7 General duties and prohibited actions.

- (a) General duties. The agricultural employer or the handler employer, as appropriate, shall:
- (1) Assure that each worker subject to subpart B of this part or each handler subject to subpart C of this part receives the protections required by this part.
- (2) Assure that any pesticide to which subpart C of this part applies is used in a manner consistent with the labeling of the pesticide, including the requirements of this part.
- (3) Provide, to each person who supervises any worker or handler, information and directions sufficient to assure that each worker or handler receives the protections required by this part. Such information and directions shall specify which persons are responsible for actions required to comply with this part.
- (4) Require each person who supervises any worker or handler to assure compliance by the worker or handler with the provisions of this part and to assure that the worker or handler receives the protections required by this part.
- (b) Prohibited actions. The agricultural employer or the handler employer shall not take any retaliatory action for attempts to comply with this part or any action having the effect of preventing or discouraging any worker or handler from complying or attempting to comply with any requirement of this part.

§ 170.9 Violations of this part.

(a) Under the Federal Insecticide, Fungicide, and Rodenticide Act (7 U.S.C. 136 et seq.) (FIFRA) section

12(a)(2)(C) it is unlawful for any person "to use any registered pesticide in a manner inconsistent with its labeling." When this part is referenced on a label, users must comply with all of its requirements except those that are inconsistent with product-specific instructions on the labeling. For the purposes of this part, EPA interprets the term "use" to include:

- (1) Preapplication activities, including, but not limited to:
- (i) Arranging for the application of the pesticide:
 - (ii) Mixing and loading the pesticide; and
- (iii) Making necessary preparations for the application of the pesticide, including responsibilities related to worker notification, training of handlers, decontamination, use and care of personal protective equipment, emergency information, and heat stress management.
 - (2) Application of the pesticide.
- (3) Post-application activities necessary to reduce the risks of illness and injury resulting from handlers' and workers' occupational exposures to pesticide residues during the restricted-entry interval plus 30 days. These activities include, but are not limited to, responsibilities related to worker training, notification, and decontamination.
- (4) Other pesticide-related activities, including, but not limited to, providing emergency assistance, transporting or storing pesticides that have been opened, and disposing of excess pesticides, spray mix, equipment wash waters, pesticide containers, and other pesticidecontaining materials.
- (b) A person who has a duty under this part, as referenced on the pesticide product label, and who fails to perform that duty, violates FIFRA section 12(a)(2)(C) and is subject to a civil penalty under section 14. A person who knowingly violates section 12(a)(2)(C) is subject to section 14 criminal sanctions.
- (c) FIFRA section 14(b)(4) provides that a person is liable for a penalty under FIFRA if another person employed by or acting for that person violates any provision of FIFRA. The term "acting for" includes both employment and contractual relationships.
- (d) The requirements of this part, including the decontamination requirements, shall not, for the purposes of section 653(b)(1) of Title 29 of the U.S. Code, be deemed to be the exercise of statutory authority to prescribe or enforce standards or regulations affecting the general sanitary hazards addressed by the OSHA Field Sanitation Standard, 29 CFR 1928.110, or other agricultural, nonpesticide hazards.

Subpart B—Standard for Workers

§ 170.102 Applicability of this subpart.

- (a) Requirement. Except as provided by paragraph (b) of this section, this subpart applies when any pesticide product is used on an agricultural establishment in the production of agricultural plants.
- (b) Exceptions. This subpart does not apply when any pesticide is applied on an agricultural establishment in the following circumstances:

- (1) For mosquito abatement, Mediterranean fruit fly eradication, or similar wide-area public pest control programs sponsored by governmental entities.
- (2) On livestock or other animals, or in or about animal premises.
- (3) On plants grown for other than commercial or research purposes, which may include plants in habitations, home fruit and vegetable gardens, and home greenhouses.
- (4) On plants that are in ornamental gardens, parks, and public or private lawns and grounds that are intended only for aesthetic purposes or climatic modification.
- (5) By injection directly into agricultural plants. Direct injection does not include "hack and squirt," "frill and spray," chemigation, soil-incorporation, or soil-injection.
- (6) In a manner not directly related to the production of agricultural plants, including, but not limited to, structural pest control, control of vegetation along rightsof-way and in other noncrop areas, and pasture and rangeland use.
 - (7) For control of vertebrate pests.
 - (8) As attractants or repellents in traps.
- (9) On the harvested portions of agricultural plants or on harvested timber.
 - (10) For research of unregistered pesticides.
- (c) Exemptions. For the purposes of this subpart, the owners of agricultural establishments need not assure that the protections in § 170.112(c)(5) through (9) as referenced in §§ 170.112(d)(2)(iii) and 170.112(e); and §§ 170.120, 170.122, 170.130, 170.135, 170.150, and 170.160 are provided to themselves and members of their immediate family while they are performing tasks related to the production of agricultural plants on their own agricultural establishment. However, they must provide any protections required by the these sections to other workers and other persons who are not members of their immediate family and are encouraged to provide the protections to themselves and members of their families.

See N.C. Flower Growers' Bul. Vol. 38, No. 2, pages 2–8 for §§ 170.110–170.124.

§ 170.130 Pesticide safety training.

- (a) General requirement.
- (1) Agricultural employer assurance. The agricultural employer shall assure that each worker, required by this section to be trained, has been trained according to this section during the last 5 years, counting from the end of the month in which the training was completed.
- (2) Requirement for workers performing early-entry activities. Before a worker enters a treated area on the agricultural establishment during a restricted-entry interval to perform early-entry activities permitted by § 170.112 and contacts anything that has been treated with the pesticide to which the restricted-entry interval applies, including but not limited to, soil, water, or surfaces of plants, the agricultural employer shall assure that the worker has been trained.
 - (3) Requirement for other agricultural workers.
- (i) Training before the 6th day of entry. Except as provided in paragraph (a)(2) of this section, before the 6th day that a worker enters any areas on the

agricultural establishment where, within the last 30 days a pesticide to which this subpart applies has been applied or a restricted-entry interval for such pesticide has been in effect, the agricultural employer shall assure that the worker has been trained.

- (ii) Exception for first 5-year period. Until October 20, 1997, and except as provided in paragraph (a)(2) of this section, before the 16th day that a worker enters any areas on the agricultural establishment where, within the last 30 days a pesticide to which this subpart applies has been applied or a restricted-entry interval for such pesticide has been in effect, the agricultural employer shall assure that the worker has been trained. After October 20, 1997, this exception no longer applies.
- (b) Exception. A worker who is currently certified as an applicator of restricted-use pesticides under part 171 of this chapter or who satisfies the training requirements of part 171 of this chapter or who satisfies the handler training requirements under § 170.230(c) need not be trained under this section.
 - (c) Training programs.
- (1) General pesticide safety information shall be presented to workers either orally from written materials or audiovisually. The information must be presented in a manner that the workers can understand (such as through a translator) using nontechnical terms. The presenter also shall respond to workers' questions.
- (2) The person who conducts the training shall meet at least one of the following criteria:
- (i) Be currently certified as an applicator of restricted-use pesticides under part 171 of this chapter; or
- (ii) Be currently designated as a trainer of certified applicators or pesticide handlers by a State, Federal, or Tribal agency having jurisdiction; or
- (iii) Have completed a pesticide safety trainthe-trainer program approved by a State, Federal, or Tribal agency having jurisdiction; or
- (iv) Satisfy the training requirements in part 171 of this chapter or in § 170.230(c).
- (3) Any person who issues an EPA-approved Worker Protection Standard worker training certificate must assure that the worker who receives the training certificate has been trained in accordance with (c)(4) of this section.
- (4) The training materials shall convey, at a minimum, the following information:
- (i) Where and in what form pesticides may be encountered during work activities.
- (ii) Hazards of pesticides resulting from toxicity and exposure, including acute and chronic effects, delayed effects, and sensitization.
- (iii) Routes through which pesticides can enter the body.
- (iv) Signs and symptoms of common types of pesticide poisoning.
- (v) Emergency first aid for pesticide injuries or poisonings.
 - (vi) How to obtain emergency medical care.
- (vii) Routine and emergency decontamination procedures, including emergency eyeflushing techniques. (viii) Hazards from chemigation and drift.

- (ix) Hazards from pesticide residues on clothing.
- (x) Warnings about taking pesticides or pesticide containers home.
- (xi) Requirements of this subpart designed to reduce the risks of illness or injury resulting from workers' occupational exposure to pesticides, including application and entry restrictions, the design of the warning sign, posting of warning signs, oral warnings, the availability of specific information about applications, and the protection against retaliatory acts.
 - (d) Verification of training.
- (1) Except as provided in paragraph (d)(2) of this section, if the agricultural employer assures that a worker possesses an EPA-approved Worker Protection Standard worker training certificate, then the requirements of paragraph (a) of this section will have been met.
- (2) If the agricultural employer is aware or has reason to know that an EPA-approved Worker Protection Standard worker training certificate has not been issued in accordance with this section, or has not been issued to the worker bearing the certificate, or the training was completed more than 5 years before the beginning of the current month, a worker's possession of that certificate does not meet the requirements of paragraph (a) of this section.

§ 170.135 Posted pesticide safety information.

- (a) Requirement. When workers are on an agricultural establishment and, within the last 30 days, a pesticide covered by this subpart has been applied on the establishment or a restricted-entry interval has been in effect, the agricultural employer shall display, in accordance with this section, pesticide safety information.
- (b) Pesticide safety poster. A safety poster must be displayed that conveys, at a minimum, the following basic pesticide safety concepts:
- (1) Help keep pesticides from entering your body. At a minimum, the following points shall be conveyed:
- (i) Avoid getting on your skin or into your body any pesticides that may be on plants and soil, in irrigation water, or drifting from nearby applications.
- (ii) Wash before eating, drinking, using chewing gum or tobacco, or using the toilet.
- (iii) Wear work clothing that protects the body from pesticide residues (long-sleeved shirts, long pants, shoes and socks, and a hat or scarf).
- (iv) Wash/shower with soap and water, shampoo hair, and put on clean clothes after work.
- (v) Wash work clothes separately from other clothes before wearing them again.
- (vi) Wash immediately in the nearest clean water if pesticides are spilled or sprayed on the body. As soon as possible, shower, shampoo, and change into clean clothes.
- (vii) Follow directions about keeping out of treated or restricted areas.
- (2) There are Federal rules to protect workers and handlers, including a requirement for safety training.
 - (c) Emergency medical care information.
 - (1) The name, address, and telephone number

of the nearest emergency medical care facility shall be on the safety poster or displayed close to the safety poster.

- (2) The agricultural employer shall inform workers promptly of any change to the information on emergency medical care facilities.
 - (d) Location.
- (1) The information shall be displayed in a central location on the farm or in the nursery or greenhouse where it can be readily seen and read by workers.
- (2) The information shall be displayed in a location in or near the forest in a place where it can be readily seen and read by workers and where workers are likely to congregate or pass by, such as at a decontamination site or an equipment storage site.
- (e) Accessibility. Workers shall be informed of the location of the information and shall be allowed access to it.
- (f) Legibility. The information shall remain legible during the time it is posted.

§ 170.150 Decontamination.

- (a) Requirement. If any worker on an agricultural establishment performs any activity in an area where, within the last 30 days, a pesticide has been applied or a restricted-entry interval has been in effect and contacts anything that has been treated with the pesticide, including, but not limited to, soil, water, or surfaces of plants, the agricultural employer shall provide, in accordance with this section, a decontamination site for washing off pesticide residues.
 - (b) General conditions.
- (1) The agricultural employer shall provide workers with enough water for routine washing and emergency eyeflushing. At all times when the water is available to workers, the employer shall assure that it is of a quality and temperature that will not cause illness or injury when it contacts the skin or eyes or if it is swallowed.
- (2) When water is stored in a tank is to be used for mixing pesticides, it shall not be used for decontamination or eyeflushing, unless the tank is equipped with properly functioning valves ore other mechanisms that prevent movement of pesticides into the tank.
- (3) The agricultural employer shall provide soap and single-use towels at each decontamination site in quantities sufficient to meet workers' needs.
- (4) To provide for emergency eyeflushing, the agricultural employer shall assure that at least 1 pint of water is immediately available to each worker who is performing early-entry activities permitted by § 170.112 and for which the pesticide labeling requires protective eyewear. The eyeflush water shall be carried by the early-entry worker, or shall be on the vehicle the early-entry worker susing, or shall be otherwise immediately accessible.
 - (c) Location.
- (1) The decontamination site shall be reasonably accessible to and not more than 1/4 mile from where workers are working.
- (2) For worker activities performed more than 1/4 mile from the nearest place of vehicular access:
- (i) The soap, single-use towels, and water may be at the nearest place of vehicular access.

- (ii) The agricultural employer may permit workers to use clean water from springs, streams, lakes, or other sources for decontamination at the remote work site, if such water is more accessible than the water at the decontamination site located at the nearest place of vehicular access.
- (3) The decontamination site shall not be in an area being treated with pesticides.
- (4) The decontamination site shall not be in an area that is under a restricted-entry interval, unless the workers for whom the site is provided are performing early-entry activities permitted by § 170.112 and involving contact with treated surfaces and the decontamination site would otherwise not be reasonably accessible to those workers.
- (d) Decontamination after early-entry activities. At the end of any exposure period for workers engaged in early-entry activities permitted by § 170.112 and involving contact with anything that has been treated with the pesticide to which the restricted-entry interval applies, including, but not limited to, soil, water, air, or surfaces of plants, the agricultural employer shall provide, at the site where the workers remove personal protective equipment, soap, clean towels, and a sufficient amount of water so that the workers may wash thoroughly.

§ 170.160 Emergency assistance.

If there is reason to believe that a person who is or has been employed on an agricultural establishment to perform tasks related to the production of agricultural plants has been poisoned or injured by exposure to pesticides used on the agricultural establishment, including, but not limited to, exposures from application, splash, spill, drift, or pesticide residues, the agricultural employer shall:

- (a) Make available to that person prompt transportation from the agricultural establishment, including any labor camp on the agricultural establishment, to an appropriate emergency medical facility.
- (b) Provide to that person or to treating medical personnel, promptly upon request, any obtainable information on:
- (1) Product name, EPA registration number, and active ingredients of any product to which that person might have been exposed.
- (2) Antidote, first aid, and other medical information from the product labeling.
- (3) The circumstances of application or use of the pesticide on the agricultural establishment.
- (4) The circumstances of exposure of that person to the pesticide.

Subpart C—Standard for Pesticide Handlers

§ 170.202 Applicability of this subpart.

- (a) Requirement. Except as provided by paragraph
 (b) of this section, this subpart applies when any pesticide is handled for use on an agricultural establishment.
- (b) Exceptions. This subpart does not apply when any pesticide is handled for use on an agricultural establishment in the following circumstances:
 - (1) For mosquito abatement, Mediterranean fruit

fly eradication, or similar wide-area public pest control programs sponsored by governmental entities.

- (2) On livestock or other animals, or in or about animal premises.
- (3) On plants grown for other than commercial or research purposes, which may include plants in habitations, home fruit and vegetable gardens, and home greenhouses.
- (4) On plants that are in ornamental gardens, parks, and public or private lawns and grounds and that are intended only for aesthetic purposes or climatic modification.
- (5) In a manner not directly related to the production of agricultural plants, including, but limited to, structural pest control, control of vegetation along rights-of-way and in other noncrop areas, and pasture and rangeland use.
 - (6) For control of vertebrate pests.
 - (7) As attractants or repellents in traps.
- (8) On the harvested portions of agricultural plants or on harvested timber.
 - (9) For research uses of unregistered pesticides.
- (c) Exemptions. For the purposes of this subpart, owners of agricultural establishments need not assure that the protections of §§ 170.210(b) and (c), 170.222, 170.230, 170.234, 170.235, 170.240(e) through (g), 170.250, and 170.260 are provided to themselves or to members of their immediate family who are performing handling tasks on their own agricultural establishments. However, they must provide any protections required by these sections to other handlers and other persons who are not members of their immediate family, and are encouraged to provide the protections to themselves and members of their families.

§ 170.210 Restrictions during applications.

- (a) Contact with workers and other persons. The handler employer and the handler shall assure that no pesticide is applied so as to contact, either directly or through drift, any worker or other person, other than an appropriately trained and equipped handler.
- (b) Handlers handling highly toxic pesticides. The handler employer shall assure that any handler who is performing any handling activity with a product that has the skull and crossbones symbol on the front panel of the label is monitored visually or by voice communication at least every 2 hours.
- (c) Fumigant applications in greenhouses. The handler employer shall assure:
- (1) That any handler who handles a fumigant in a greenhouse, including a handler who enters the greenhouse before the acceptable inhalation exposure level or ventilation criteria have been met to monitor air levels or to initiate ventilation, maintains continuous visual or voice contact with another handler.
- (2) That the other handler has immediate access to the personal protective equipment required by the fumigant labeling for handlers in the event entry into the fumigated greenhouse becomes necessary for rescue.

§ 170.222 Providing specific information about applications.

When handlers (except those employed by a

commercial pesticide handling establishment) are on an agricultural establishment and, within the last 30 days, a pesticide covered by this subpart has been applied on the establishment or a restricted-entry interval has been in effect, the handler employer shall display, in accordance with this section, specific information about the pesticide.

(a) Location, accessibility, and legibility. The information shall be displayed in the same location specified for the pesticide safety poster in § 170.235(d) of this part and shall be accessible and legible, as specified in § 170.235(e) and (f) of this part.

(b) Timing.

- (1) If warning signs are posted for the treated area before an application, the specific application information for that application shall be posted at the same time or earlier.
- (2) The information shall be posted before the application fakes place, if handlers (except those employed by a commercial pesticide handling establishment) will be on the establishment during application. Otherwise, the information shall be posted at the beginning of any such handler's first work period.
- (3) The information shall continue to be displayed for at least 30 days after the end of the restricted-entry interval (or, if there is no restricted-entry interval, for at least 30 days after the end of the application) or at least until the handlers are no longer on the establishment, whichever is earlier.
- (c) Required information. The information shall include:
- (1) The location and description of the treated area.
- (2) The product name, EPA registration number, and active ingredient(s) of the pesticide.
- (3) The time and date the pesticide is to be applied.
 - (4) The restricted-entry interval for the pesticide.

§ 170.224 Notice of applications to agricultural employers.

Before the application of any pesticide on or in an agricultural establishment, the handler employer shall provide the following information to any agricultural employer for the establishment or shall assure that any agricultural employer is aware of:

- (a) Specific location and description of the treated area
 - (b) Time and date of application.
- (c) Product name, EPA registration number, and active ingredient(s).
 - (d) Restricted-entry interval.
 - (e) Whether posting and oral notification are required.
- (f) Any other product-specific requirements on the product labeling concerning protection of workers or other persons during or after application.

§ 170.230 Pesticide safety training.

(a) Requirement. Before any handler performs any handling task, the handler employer shall assure that the handler has been trained in accordance with this section

during the last 5 years, counting from the end of the month in which the training was completed.

- (b) Exception. A handler who is currently certified as an applicator of restricted-use pesticides under part 171 of this chapter or who satisfies the training requirements of part 171 of this chapter need not be trained under this section.
 - (c) Training programs.
- (1) General pesticide safety information shall be presented to handlers either orally from written materials or audiovisually. The information must be presented in a manner that the handlers can understand (such as through a translator). The presenter also shall respond to handlers' questions.
- (2) The person who conducts the training shall meet at least one of the following criteria:
- (i) Be currently certified as an applicator of restricted-use pesticides under part 171 of this chapter; or
- (ii) Be currently designated as a trainer of certified applicators or pesticide handlers by a State. Federal, or Tribal agency having jurisdiction; or
- (iii) Have completed a pesticide safety trainthe-trainer program approved by a State, Federal, or Tribal agency having jurisdiction.
- (3) Any person who issues an EPA-approved Worker Protection Standard handler training certificate must assure that the handler who receives the training certificate has been trained in accordance with paragraph (c)(4) of this section.
- (4) The pesticide safety training materials must convey, at a minimum, the following information:
- (i) Format and meaning of information contained on pesticide labels and in labeling, including safety information such as precautionary statements about human health hazards.
- (ii) Hazards of pesticides resulting from toxicity and exposure, including acute and chronic effects, delayed effects, and sensitization.
- (iii) Routes by which pesticides can enter the body.
- (iv) Signs and symptoms of common types of pesticide poisoning.
- (v) Emergency first aid for pesticide injuries or poisonings.
 - (vi) How to obtain emergency medical care.
 - (vii) Routine and emergency decontamination

procedures.

- (viii) Need for and appropriate use of personal protective equipment.
- (ix) Prevention, recognition, and first aid treatment of heat-related illness.
- (x) Safety requirements for handling, transport, storing, and disposing of pesticides, including general procedures for spill cleanup.
- (xi) Environmental concerns such as drift, runoff, and wildlife hazards.
- (xii) Warnings about taking pesticides or pesticide containers home.
- (xiii) Requirements of this subpart that must be followed by handler employers for the protection of

handlers and other persons, including the prohibition against applying pesticides in a manner that will cause contact with workers or other persons, the requirement to use personal protective equipment, the provisions for training and decontamination, and the protection against retaliatory acts.

- (d) Verification of training.
- (1) Except as provided in paragraph (d)(2) of this section, if the handler employer assures that a handler possesses an EPA-approved Worker Protection Standard handler training certificate, then the requirements of paragraph (a) of this section will have been met.
- (2) If the handler employer is aware or has reason to know that an EPA-approved Worker Protection Standard handler training certificate has not been issued in accordance with this section, or has not been issued to the handler bearing the certificate, or the handler training was completed more than 5 years before the beginning of the current month, a handler's possession of that certificate does not meet the requirements of paragraph (a) of this section.

§ 170.232 Knowledge of labeling and site-specific information.

- (a) Knowledge of labeling information.
- (1) The handler employer shall assure that before the handler performs any handling activity, the handler either has read the product labeling or has been informed in a manner the handler can understand of all labeling requirements related to safe use of the pesticide, such as signal words, human hazard precautions, personal protective equipment requirements, first aid instructions, environmental precautions, and any additional precautions pertaining to the handling activity to be performed.
- (2) The handler employer shall assure that the handler has access to the product labeling information during handling activities.
- (b) Knowledge of site-specific information. Whenever a handler who is employed by a commercial pesticide handling establishment will be performing pesticide handling tasks on an agricultural establishment, the handler employer shall assure that the handler is aware of the following information concerning any areas on the agricultural establishment that the handler may be in (or may walk within 1/4 mile of) and that may be treated with a pesticide or that may be under a restricted-entry interval while the handler will be on the agricultural establishment:
- (1) Specific location and description of any such areas; and
 - (2) Restrictions on entering those areas.

§ 170.234 Safe operation of equipment.

- (a) The handler employer shall assure that before the handler uses any equipment for mixing, loading, transferring, or applying pesticides, the handler is instructed in the safe operation of such equipment, including, when relevant, chemigation safety requirements and drift avoidance.
- (b) The handler employer shall assure that, before each day of use, equipment used for mixing, loading, transferring, or applying pesticides is inspected for leaks, clogging, and worn or damaged parts, and any damaged

equipment is repaired or is replaced.

- (c) Before allowing any person to repair, clean, or adjust equipment that has been used to mix, load, transfer, or apply pesticides, the handler employer shall assure that pesticide residues have been removed from the equipment, unless the person doing the cleaning, repairing, or adjusting is a handler employed by the agricultural or commercial pesticide handling establishment. If pesticide residue removal is not feasible, the handler employer shall assure that the person who repairs, cleans, or adjusts such equipment is informed:
- (1) That such equipment may be contaminated with pesticides.
- (2) Of the potentially harmful effects of exposure to pesticides.
 - (3) Of the correct way to handle such equipment.

§ 170.235 Posted pesticide safety information.

- (a) Requirement. When handlers (except those employed by a commercial pesticide handling establishment) are on an agricultural establishment and, within the last 30 days, a pesticide covered by this subpart has been applied on the establishment or a restricted-entry interval has been in effect, the handler employer shall display, in accordance with this section, pesticide safety information.
- (b) Pesticide safety poster. A safety poster must be displayed that conveys, at a minimum, the following basic pesticide safety concepts:
- (1) Help keep pesticides from entering your body. At a minimum, the following points shall be conveyed:
- (i) Avoid getting on your skin or into your body any pesticides that may be on plants and soil, in irrigation water, or drifting from nearby applications.
- (ii) Wash before eating, drinking, using chewing gum or tobacco, or using the toilet.
- (iii) Wear work clothing that protects the body from pesticide residues (long-sleeved shirts, long pants, shoes and socks. and a hat or scarf).
- (iv) Wash/shower with soap and water, shampoo hair, and put on clean clothes after work.
- (v) Wash work clothes separately from other clothes before wearing them again.
- (vi) Wash immediately in the nearest clean water if pesticides are spilled or sprayed on the body. As soon as possible, shower, shampoo, and change into clean clothes.
- (vii) Follow directions about keeping out of treated or restricted areas.
- (2) There are Federal rules to protect workers and handlers, including a requirement for safety training.
 - (c) Emergency medical care information.
- (1) The name, address, and telephone number of the nearest emergency medical care facility shall be on the safety poster or displayed close to the safety poster.
- (2) The agricultural employer shall inform workers promptly of any change to the information on emergency medical care facilities.
 - (d) Location.
- (1) The information shall be displayed in a central location on the farm or in the nursery or greenhouse where

it can be readily seen and read by workers.

- (2) The information shall be displayed in a location in or near the forest in a place where it can be readily seen and read by workers and where workers are likely to congregate or pass by, such as at a decontamination site or an equipment storage site.
- (e) Accessibility. Workers shall be informed of the location of the information and shall be allowed access to it.
- (f) Legibility. The information shall remain legible during the time it is posted.

§ 170.240 Personal protective equipment.

- (a) Requirement. Any person who performs tasks as a pesticide handler shall use the clothing and personal protective equipment specified on the labeling for use of the product.
 - (b) Definition.
- (1) Personal protective equipment (PPE) means devices and apparel that are worn to protect the body from contact with pesticides or pesticide residues, including, but not limited to, coveralls, chemical-resistant suits, chemical-resistant gloves, chemical-resistant footwear, respiratory protection devices, chemical-resistant aprons, chemical-resistant headgear, and protective eyewear.
- (2) Long-sleeved shirts, short-sleeved shirts, long pants, short pants, shoes, socks, and other items of work clothing are not considered personal protective equipment for the purposes of this section and are not subject to the requirements of this section, although pesticide labeling may require that such work clothing be worn during some activities.
- (c) Provision. When personal protective equipment is specified by the labeling of any pesticide for any handling activity, the handler employer shall provide the appropriate personal protective equipment in clean and operating condition to the handler.
- (1) When "chemical-resistant" PPE is specified by the product labeling, it shall be made of material that allows no measurable movement of the pesticide being used through the material during use.
- (2) When "waterproof" PPE is specified by the product labeling, it shall be made of material that allows no measurable movement of water or aqueous solutions through the material during use.
- (3) When a "chemical-resistant suit" is specified by the product labeling, it shall be a loose-fitting, one- or two-piece, chemical-resistant garment that covers, at a minimum, the entire body except head, hands, and feet.
- (4) When "coveralls" are specified by the product labeling, they shall be a loose-fitting one- or two-piece garment, such as a cotton or cotton and polyester coverall, that covers, at a minimum, the entire body except head, hands, and feet. The pesticide product labeling may specify that the coveralls be worn over a layer of clothing. If a chemical-resistant suit is substituted for coveralls, it need not be worn over a layer of clothing.
- (5) Gloves shall be of the type specified by the product labeling. Gloves or glove linings made of leather, cotton, or other absorbent materials must not be worn for early-entry activities unless these materials are listed on

the product labeling as acceptable for such use.

- (6) When "chemical-resistant footwear" is specified by the product labeling, one of the following types of footwear must be worn:
 - (i) Chemical-resistant shoes.
 - (ii) Chemical-resistant boots.
- (iii) Chemical-resistant shoe coverings worn over shoes or boots.
- (7) When "protective eyewear" is specified by the product labeling, one of the following types of eyewear must be worn:
 - (i) Goggles.
 - (ii) Face shield.
- (iii) Safety glasses with front, brow, and temple protection.
 - (iv) Full-face respirator.
- (8) When a "chemical-resistant apron" is specified by the product labeling, an apron that covers the front of the body from mid-chest to the knees shall be worn.
- (9) When a respirator is specified by the product labeling, it shall be appropriate for the pesticide product used and for the activity to be performed. The handler employer shall assure that the respirator fits correctly.
- (10) When "chemical-resistant headgear" is specified by the product labeling, it shall be either a chemical-resistant hood or chemical-resistant hat with a wide brim.
- (d) Exceptions to personal protective equipment specified on product labeling.
 - (1) Body protection.
- (i) A chemical-resistant suit may be substituted for "coveralls," and any requirement for an additional layer of clothing beneath is waived.
- (ii) A chemical-resistant suit may be substituted for "coveralls" and a chemical-resistant apron.
- (2) Boots. If chemical-resistant footwear with sufficient durability and a tread appropriate for wear in rough terrain is not obtainable, then leather boots may be worn in such terrain.
- (3) Gloves. If chemical-resistant gloves with sufficient durability and suppleness are not obtainable, then during handling activities with roses or other plants with sharp thoms, leather gloves may be worn over chemical-resistant glove liners. However, once leather gloves are worn for this use, thereafter they shall be worn only with chemical-resistant liners and they shall not be worn for any other use.
- (4) Closed systems. If handling tasks are performed using properly functioning systems that enclose the pesticide to prevent it from contacting handlers or other persons, and if such systems are used and are maintained in accordance with the manufacturer's written operating instructions, exceptions to labeling-specified personal protective equipment for the handling activity are permitted as provided in paragraphs (d)(4)(i) and (ii) of this section.
- (i) Persons using a closed system to mix or load pesticides with a signal word of DANGER or WARNING may substitute a long-sleeved shirt, long pants, shoes, socks, chemical-resistant apron, and any protective gloves specified on the labeling for handlers for the labeling-

specified personal protective equipment.

- (ii) Persons using a closed system to mix or load pesticides other than those in paragraph (d)(i) of this section or to perform other handling tasks may substitute a long-sleeved shirt, long pants, shoes, and socks for the labeling-specified personal protective equipment.
- (iii) Persons using a closed system that operates under pressure shall wear protective eyewear.
- (iv) Persons using a closed system shall have all labeling-specified personal protective equipment immediately available for use in an emergency.
- (5) Enclosed cabs. If handling tasks are performed from inside a cab that has a nonporous barrier which totally surrounds the occupants of the cab and prevents contact with pesticides outside of the cab, exceptions to personal protective equipment specified on the product labeling for that nandling activity are permitted as provided in paragraphs (d)(5)(i) through (iv) of this section.
- (i) Persons occupying an enclosed cab may substitute a long-sleeved shirt, long pants, shoes, and socks for the labeling-specified personal protective equipment. If a respiratory protection device is specified on the pesticide product labeling for the handling activity, it must be worn.
- (ii) Persons occupying an enclosed cab that has a properly functioning ventilation system which is used and maintained in accordance with the manufacturer's written operating instructions and which is declared in writing by the manufacturer or by a governmental agency to provide respiratory protection equivalent to or greater than a dust/mist filtering respirator may substitute a long-sleeved shirt, long pants, shoes, and socks for the labeling-specified personal protective equipment. If a respiratory protection device other than a dust/mist-filtering respirator is specified on the pesticide product labeling, it must be worn.
- (iii) Persons occupying an enclosed cab that has a properly functioning ventilation system which is used and maintained in accordance with the manufacturer's written operating instructions and which is declared in writing by the manufacturer or by a governmental agency to provide respiratory protection equivalent to or greater than the vapor- or gas-removing respirator specified on pesticide product labeling may substitute a long-sleeved shirt, long pants, shoes, and socks for the labeling-specified personal protective equipment. If an air-supplying respirator or a self-contained breathing apparatus (SCBA) is specified on the pesticide product labeling, it must be worn.
- (iv) Persons occupying an enclosed cab shall have all labeling-specified personal protective equipment immediately available and stored in a chemical-resistant container, such as a plastic bag. They shall wear such personal protective equipment if it is necessary to exit the cab and contact pesticide-treated surfaces in the treated area. Once personal protective equipment is worn in the treated area, it must be removed before reentering the cab.
 - (6) Aerial applications.
- (i) Use of gloves. Chemical-resistant gloves shall be worn when entering or leaving an aircraft contaminated by pesticide residues. In the cockpit, the gloves shall be kept in an enclosed container to prevent

contamination of the inside of the cockpit.

- (ii) Open cockpit. Persons occupying an open cockpit shall use the personal protective equipment specified in the product labeling for use during application, except that chemical-resistant footwear need not be worn. A helmet may be substituted for chemical-resistant headgear. A visor may be substituted for protective eyewear.
- (iii) Enclosed cockpit. Persons occupying an enclosed cockpit may substitute a long-sleeved shirt, long pants, shoes, and socks for labeling-specified personal protective equipment.
- (7) Crop advisors. Crop advisors entering treated areas while a restricted-entry interval is in effect may wear the personal protective equipment specified on the pesticide labeling for early-entry activities instead of the personal protective equipment specified on the pesticide labeling for handling activities provided:
- (i) Application has been completed for at least 4 hours.
- (ii) Any inhalation exposure level listed in the labeling has been reached or any ventilation criteria established by § 170.110(c)(3) or in the labeling have been met.
 - (e) Use of personal protective equipment.
- (1) The handler employer shall assure that personal protective equipment is used correctly for its intended purpose and is used according to the manufacturer's instructions.
- (2) The handler employer shall assure that, before each day of use, all personal protective equipment is inspected for leaks, holes, tears, or worn places, and any damaged equipment is repaired or discarded.
 - (f) Cleaning and maintenance.
- (1) The handler employer shall assure that all personal protective equipment is cleaned according to the manufacturer's instructions or pesticide product labeling instructions before each day of reuse. In the absence of any such instructions, it shall be washed thoroughly in detergent and hot water.
- (2) If any personal protective equipment cannot be cleaned properly, the handler employer shall dispose of the personal protective equipment in accordance with any applicable Federal, State, and local regulations. Coveralls or other absorbent materials that have been drenched or heavily contaminated with an undiluted pesticide that has the signal word DANGER or WARNING or the label shall not be reused.
- (3) The handler employer shall assure that contaminated personal protective equipment is kept separately and washed separately from any other clothing or laundry.
- (4) The handler employer shall assure that all clean personal protective equipment shall be either dried thoroughly before being stored or shall be put in a well ventilated place to dry.
- (5) The handler employer shall assure that all personal protective equipment is stored separately from personal clothing and apart from pesticide-contaminated areas.

- (6) The handler employer shall assure that when dust/mist filtering respirators are used, the filters shall be replaced:
- (i) When breathing resistance becomes excessive.
- (ii) When the filter element has physical damage or tears.
- (iii) According to manufacturer's recommendations or pesticide product labeling, whichever is more frequent.
- (iv) In the absences of any other instructions or indications of service life, at the end of each day's work period.
- (7) The handler employer shall assure that when gas- or vapor-removing respirators are used, the gas- or vapor-removing canisters or cartridges shall be replaced:
 - (i) At the first indication of odor, taste, or
- (ii) According to manufacturer's recommendations or pesticide product labeling, whichever is more frequent.
- (iii) In the absence of any other instructions or indications of service life, at the end of each day's work period.
- (8) The handler employer shall inform any person who cleans or launders personal protective equipment:
- (i) That such equipment may be contaminated with pesticides.
- (ii) Of the potentially harmful effects of exposure to pesticides.
- (iii) Of the correct way(s) to clean personal protective equipment and to protect themselves when handling such equipment.
- (9) The handler employer shall assure that handlers have a clean place(s) away from pesticide storage and pesticide use areas where they may:
 - (i) Store personal clothing not in use.
- (ii) Put on personal protective equipment at the start of any exposure period.
- (iii) Remove personal protective equipment at the end of any exposure period.
- (10) The handler employer shall not allow or direct any handler to wear home or to take home personal protective equipment contaminated with pesticides.
- (g) Heat-related illness. When the use of personal protective equipment is specified by the labeling of any pesticide for the handling activity, the handler employer shall assure that no handler is allowed or directed to perform the handling activity unless appropriate measures are taken, if necessary, to prevent heat-related illness.

§ 170.250 Decontamination.

- (a) Requirement. During any handling activity, the handler employer shall provide for handlers, in accordance with this section, a decontamination site for washing off pesticides and pesticide residues.
 - (b) General conditions.
- (1) The handler employer shall provide handlers with enough water for routine washing, for emergency eyeflushing, and for washing the entire body in case of an

emergency. At all times when the water is available to handlers, the handler employer shall assure that it is of a quality and temperature that will not cause illness or injury when it contacts the skin or eyes or if it is swallowed.

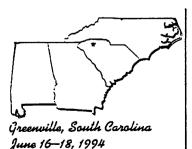
- (2) When water stored in a tank is to be used for mixing pesticides, it shall not be used for decontamination or eye flushing, unless the tank is equipped with properly functioning valves or other mechanisms that prevent movement of pesticides into the tank.
- (3) The handler employer shall provide soap and single-use towels at each decontamination site in quantities sufficient to meet handlers' needs.
- (4) The handler employer shall provide one clean change of clothing, such as coveralls, at each decontamination site for use in an emergency.
- (c) Location. The decontamination site shall be reasonably accessible to and not more than 1/4 mile from each handler during the handling activity.
- (1) Exception for mixing sites. For mixing activities, the decontamination site shall be at the mixing site.
- (2) Exception for pilots. The decontamination site for a pilot who is applying pesticides aerially shall be in the airplane or at the aircraft's loading site.
- (3) Exception for handling pesticides in remote areas. When handling activities are performed more than 1/4 mile from the nearest place of vehicular access:
- (i) The soap, single-use towels, clean change of clothing, and water may be at the nearest place of vehicular access.
- (ii) The handler employer may permit handlers to use clean water from springs, streams, lakes, or other sources for decontamination at the remote work site, if such water is more accessible than the water at the decontamination site located at the nearest place of vehicular access.
- (4) Decontamination site in treated areas. The decontamination site shall not be in an area being treated with pesticides or in an area under a restricted-entry interval, unless:
- (i) The decontamination site is in the area where the handler is performing handling activities;

- (ii) The soap, single-use towels, and clean change of clothing are in enclosed containers; and
- (iii) The water is running tap water or is enclosed in a container.
- (d) Emergency eyeflushing. To provide for emergency eyeflushing, the handler employer shall assure that at least 1 pint of water is immediately available to each handler who is performing tasks for which the pesticide labeling requires protective eyewear. The eyeflush water shall be carried by the handler, or shall be on the vehicle or aircraft the handler is using, or shall be otherwise immediately accessible.
- (e) Decontamination after handling activities. At the end of any exposure period, the handler employer shall provide at the site where handlers remove personal protective equipment, soap, clean towels, and a sufficient amount of water so that the handlers may wash thoroughly.

§ 170.260 Emergency assistance.

If there is reason to believe that a person who is or has been employed by an agricultural establishment or commercial pesticide handling establishment to perform pesticide handling tasks has been poisoned or injured by exposure to pesticides as a result of that employment, including, but not limited to, exposures from handling tasks or from application, splash, spill, drift, or pesticide residues, the handler employer shall:

- (a) Make available to that person prompt transportation from the place of employment or the handling site to an appropriate emergency medical facility.
- (b) Provide to that person or to treating medical personnel, promptly upon request, any obtainable information on:
- (1) Product name, EPA registration number, and active ingredients of any product to which that person might have been exposed.
- (2) Antidote, first aid, and other medical information from the product labeling.
 - (3) The circumstances of handling of the pesticide.
- (4) The circumstances of exposure of that person to the pesticide.



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