



# Pesticide Drift Prevention

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The background of the slide features several stylized plant illustrations. On the left, a tall, thin stem with a cluster of small, dark, round fruits at the top. In the center, a stem with several green leaves and a small, dark, elongated fruit. On the right, a stem with green leaves and a small, dark, elongated fruit. The plants are drawn in a simple, line-art style with green leaves and brown stems.

# What is Pesticide Drift?

- the movement of pesticide dust or droplets through the air at the time of application or soon after, to any site other than the intended treatment area.



# Effects of Pesticide Drift

- Drift of sprays can affect:
  - People's health
  - Environment's health
  - Possible economic loss to nearby crops



# Ways to Prevent Drift

- Apply pesticide only to the treatment area
- Apply during calm weather conditions
- Properly calibrating application equipment



A stylized botanical illustration featuring several thin, dark green stems with various types of leaves. Some leaves are simple and oval, while others are more complex and feathery. At the top left, there is a small cluster of dark, round berries or seeds. In the upper center, there is a small, yellow, elongated flower or seed head. The background is a light cream color with a thin green border at the bottom.

# CCR 6614

## Protection of Persons, Animals, and Property

An applicator prior to and while applying a pesticide shall evaluate the equipment to be used, meteorological conditions, the property to be treated, and surrounding properties to determine the likelihood of harm or damage.



# CCR 6614 (continued)

## Protection of Persons, Animals, and Property

No pesticide application shall be made or continued when:

- There is a reasonable possibility of damage to nontarget crops, animals, or other public or private property or contamination of the bodies or clothing of persons not involved in the application process



# CCR 6614 (continued)

## Protection of Persons, Animals, and Property

- There is a reasonable possibility of contamination of nontarget public or private property, including the creation of a health hazard, preventing normal use of such property. In determining a health hazard, the amount and toxicity of the pesticide, the type and uses of the property and related factors shall be considered.



# General Drift Minimization

## Appendix C

Minimize environmental contamination from drift





# Aircraft

- Equipment used to apply a pesticide spray solution shall be configured as follows:
- Functional boom length, shall not exceed 75% of the overall wing span or rotor length
- Boom pressure not exceed 40 lbs. per square inch for the nozzles being used



# Aircraft

- Flow of liquid from each nozzle be controlled by a positive shutoff system
- Nozzle orifice be directed backward, neutral to the airstream



# Aerial Applications

- Apply only when there is a positive airflow
- Wind speed not to be more than 10mph



# Aerial Applications

- Discharge shall:
  - Start after entering target site
  - Not exceed 10 feet above the crop
  - Be shut off when raising equipment over obstacles
  - Be shut off before exiting

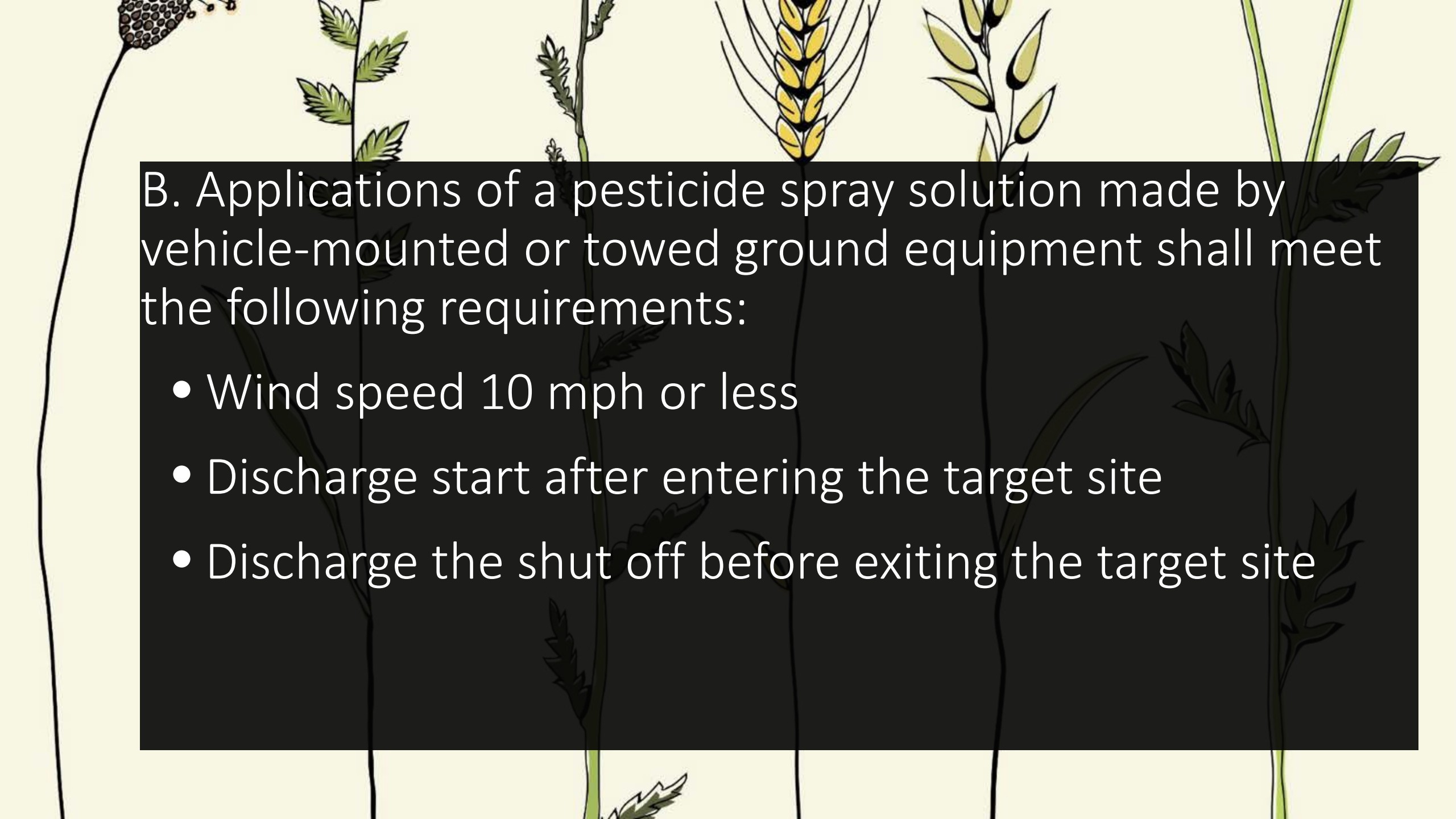




# Ground

A. Vehicle-mounted or towed ground equipment shall be equipped with:

- Nozzles having orifice not less than 1/16 of an inch and operated at a boom pressure not to exceed manufacturers recommended pressure, or
- Low pressure fan nozzles with fan angle number no larger than 80 degrees and a nozzle orifice not less than 0.2 gallons per minute flow rate and operated at a boom pressure not to exceed 15 lbs. per square inch



B. Applications of a pesticide spray solution made by vehicle-mounted or towed ground equipment shall meet the following requirements:

- Wind speed 10 mph or less
- Discharge start after entering the target site
- Discharge the shut off before exiting the target site

A botanical illustration featuring several different plant species. On the left, a tall, thin stem with a cluster of small, dark, round fruits at the top. Next to it, a stem with several green, serrated leaves. In the center, a stem with a small, spiky seed head. To the right of that, a stem with a large, yellow, elongated seed head. Further right, a stem with several green, oval-shaped leaves. On the far right, a stem with a large, green, serrated leaf. A dark gray horizontal bar is overlaid across the middle of the image, containing the word "Questions?" in white text.

Questions?



The background of the entire slide is a close-up photograph of a honeycomb. The hexagonal cells are filled with a golden-yellow substance, likely honey, and are separated by thin, darker lines. Several bees are visible on the right side of the image, their bodies and wings partially obscured by the honeycomb structure. The bees have characteristic black and yellow stripes.

# Beekeeper Notification

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# CCR Section 6650

## Bee Protection

Pesticides toxic to bees are those that include the words "toxic to bees" on the labeling of the pesticide, regardless of modifying words on the label that state "highly" or "moderately."

# ENVIRONMENTAL HAZARDS

This product is extremely toxic to aquatic invertebrates. For terrestrial uses, do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not apply when weather conditions favor drift from area treated. Drift and run-off may kill aquatic invertebrates in water adjacent to treated areas. Do not contaminate water by cleaning equipment or disposal of wastes. Do not contaminate water when disposing of equipment washwaters.

Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) Permit and the permitting authority has been notified in writing prior to the discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your state water board or regional office of the EPA.

## **BEE CAUTION: MAY KILL HONEYBEES AND OTHER BEES IN SUBSTANTIAL NUMBERS.**

This product is highly toxic to bees exposed to direct treatment or residues on crops or weeds in bloom.

For crops in bloom, do not apply this product to target crops or weeds in bloom. Notifying beekeepers within 1 mile of treatment area at least 48 hours before product is applied will allow them to take additional steps to protect their bees. Limiting application to times when bees are least active, e.g., within 2 hours of sunrise or sunset, will minimize risk to bees.

## Environmental Hazards

This pesticide is extremely toxic to fish and aquatic organisms and toxic to wildlife.

For terrestrial uses: do not apply directly to water or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not apply when weather conditions favor drift from treated areas. Drift and runoff from treated areas may be hazardous to aquatic organisms in neighboring areas. Do not contaminate water when disposing of equipment washwater.

This product is highly toxic to bees exposed to direct treatment or residues on blooming crops or weeds. Do not apply this product or allow it to drift to blooming crops or weeds if bees are visiting the treatment area.

Examples of bee toxicity statement on pesticide labels.



# CCR Section 6650

## Bee Protection

- Bees are considered to be inactive from 1 hour after sunset to 2 hours before sunrise
- When the temperature is below 55 degrees F



# CCR Section 6652

## Bee Protection

Beekeepers who desire advance notice of applications shall inform the commissioner of a two-hour period between 6 a.m. and 8 p.m.



# CCR Section 6654

## Notification to Beekeepers.

- Each person intending to apply any pesticide toxic to bees is required to do a bee check prior to the application.
- This allows any beekeeper in a 1 mile radius that has requested notification, to be notified of the application.



If the person applying pesticides is advised of a request for notification, they shall notify the beekeeper, at least 48 hours in advance of the application with the following information:

- Time and place the of the application
- Crop and acreage to be treated
- Method of application
- Identity and dosage rate of the application
- Contact information of applicator to  
beekeepers



# BeeCheck for Applicators

<https://beewhere.calagpermits.org>

- Registered Beekeeper information based on a one mile proximity to application site
- Registered Beekeeper Contact Information and Notification Preferences
- Provides a timestamp of beekeeper information request to capture all currently registered/reported hives at time of request



# 2020 PESTICIDE NOTIFICATION

- Beekeepers who want notification should complete the Request for Pesticide Notification portion of the Registration Form.
- Beekeepers will not receive notifications until this form is completed and processed by the commissioner's office.
- Request for notification expires on December 31st each year.



# 2020 PESTICIDE NOTIFICATION

- Notification to beekeepers needed if applying pesticide toxic to bees or during time of pollination.
- This is done with a Bee Check



# How Can I do a Bee Check?

- By calling the county agricultural commissioner's office, a biologist can do it for you
- With a CalAgPermits login, you can go to [beewherecalifornia.com](http://beewherecalifornia.com) and use the Bee Check option





<https://beewhere.calagpermits.org>

Bringing beekeepers and pesticide applicators together by tracking and safeguarding hive locations across California using simple mapping tools.

[LEARN MORE](#)

### Beekeepers

Beekeepers can use this website to fulfill their obligation to register annually in their home county, notify other counties when they first move bees into those counties, and notify the County Agricultural Commissioner when they move bees to new locations within the county.

All information provided by beekeepers through this site is carefully protected according to the provisions of California law.

[ACCESS BEEKEEPER MANAGEMENT](#)

### Pest Control Advisors

Licensed Pest Control Advisors (PCAs) can use this website to find out if bee colonies will be present within one mile of the application site under consideration on or around the potential application date.

PCAs will not receive information about specific beekeepers or bee colony locations, nor will they receive contact information for beekeepers with colonies in the one-mile buffer zone.

[ACCESS PCA BEE CHECK](#)

### Growers/Pesticide Applicators

Pesticide applicators (either a Grower applying pesticides on their own crops or a contracted Pest Control Business operating on behalf of a Grower) can use the BeeWhere web site to obtain contact information for beekeepers with colonies within a mile of an upcoming pesticide application.

The pesticide applicator will not receive any information about the specific locations of the bee colonies.

[ACCESS GROWER BEECHECK](#)



# Pesticide Regulations Trivia

## Specimen Label

### RESTRICTED USE PESTICIDE

Due to high acute inhalation toxicity and carcinogenicity.  
For retail sale to and use only by Certified Applicators or persons under their direct supervision and only for those uses covered by the Certified Applicator's certification.



### Soil Fumigant

®Trademark of Dow AgroSciences LLC

**A multi-purpose liquid fumigant for preplant treatment of soil to control plant parasitic nematodes, symphyllans and to help manage certain soil borne diseases in cropland**

**Not for use in greenhouses or other enclosed areas.**

**Not for formulation or manufacturing use. Do not formulate this product into other products.**

Active Ingredient: ..... (by weight)  
1,3-dichloropropene ..... 97.5%  
Other Ingredients ..... 2.5%  
Total ..... 100.0%

1 gallon of Telone II weighs 10.15 lb at 70°F. Contains 9.85 lb of 1,3-dichloropropene per gallon.

### RESTRICTED USE PESTICIDE DUE TO ACUTE TOXICITY

For retail sale to and use by certified applicators or persons under their direct supervision and only for those uses covered by the certified applicator's certification.

## Tri-Clor Fumigant

**ACTIVE INGREDIENT:**  
Chloropicrin ..... 99%  
**OTHER INGREDIENTS:** ..... 1%  
**TOTAL:** ..... 100%

*This product weighs 13.88 lbs./gal. @ 68°F (20°C).*

**KEEP OUT OF REACH OF CHILDREN**

**DANGER**



**PELIGRO**

**POISON**

*Si Usted no entiende la etiqueta, busque a alguien para que se la explique a Usted en detalle.  
(If you do not understand the label, find someone to explain it to you in detail.)*

**IN ALL CASES OF OVEREXPOSURE, GET MEDICAL ATTENTION IMMEDIATELY.  
TAKE PERSON TO A DOCTOR OR TO AN EMERGENCY TREATMENT FACILITY.**

#### FIRST AID

<b>If inhaled:</b>	<ul style="list-style-type: none"><li>• Move person to fresh air.</li><li>• If person is not breathing, call 911 or an ambulance; then give artificial respiration, preferably by mouth-to-mouth, if possible.</li><li>• Call a poison control center or doctor for further treatment advice.</li></ul>
<b>If on skin or clothing:</b>	<ul style="list-style-type: none"><li>• Take off contaminated clothing.</li><li>• Rinse skin immediately with plenty of water for 15-20 minutes.</li><li>• Call a poison control center or doctor for treatment advice.</li></ul>
<b>If in eyes:</b>	<ul style="list-style-type: none"><li>• Hold eye open and rinse slowly and gently with water for 15-20 minutes.</li><li>• Remove contact lens, if present, after the first 5 minutes, then continue rinsing eye.</li><li>• Call a poison control center or doctor for treatment advice.</li></ul>

**NOTE:** Have the product container or label with you when calling a poison control center or doctor, or going for treatment. Do not give anything by mouth to an unconscious person.

#### NOTE TO PHYSICIAN

Chloropicrin is a volatile liquid that is the active ingredient in tear gas. As a gas it is a powerful lachrymator. Early symptoms of overexposure are lachrymation, respiratory distress, and vomiting. Pulmonary edema may develop later. Treatment is symptomatic.

**EMERGENCY PHONE NUMBER:** Chemtrec, 1-800-424-9300

*See side panels for additional precautionary statements.*

1) How many times should an empty, rigid plastic pesticide container be rinsed before disposal?

a) None

b) One Time

c) Three Times

d) Until The Rinsate Runs Clear

e) Never Rinse- It Increases Your Chance Of Being Exposed To Pesticides

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2) Can an empty pesticide container be recycled with other household plastic containers?

a) Always

b) Only After Triple Rinsing & Puncturing It

c) Only On Special Collection Days

d) Never

e) If You Consider 'Recycling' Using The Huge  
Illegal Burn Pile At The Back Of My Property

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e) If You Consider 'Recycling' Using The Huge  
Illegal Burn Pile At The Back Of My Property

3) What is the minimum thickness now required for chemical-resistant gloves worn by employees?

a) 4 mils

b) 10 mils

c) 14 mils

d) 18 mils

e) My employees need gloves?



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## 4) Employees must wear coverall whenever:

- a) The Label Requires It
- b) Handling A “Warning” Or “Danger” Pesticide
- c) Mix/Loading
- d) Both a & b
- e) Both a & c
- f) They Need To Hide The Fact They Spilled Pesticide Concentrate All Over Their Clothes

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5) Per regulations, an employee handling pesticides shall wear at minimum:

- a) Shoes, Socks, Safety Glasses, Long-Sleeves, Long Pants, & Chemical-Resistant Gloves
- b) Safety Glasses, Long-Sleeves, Long Pants, Chemical-Resistant Gloves, & A Respirator
- c) Coveralls, Safety Glasses, Long-Sleeves, Long Pants, & Chemical-Resistant Gloves
- d) Only What The Label Lists
- e) A Jumpsuit, Dive Mask and Snorkel

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- e) A Jumpsuit, Dive Mask and Snorkel

6) A visible Emergency Medical Posting is required in a vehicle whenever:

- a) An Employer Purchases & Transports Pesticides
- b) Employees Are Applying Pesticides Over a Wide Geographical Area (No Designated Work Site)
- c) Employees Drive A Work Vehicle For Any Reason
- d) The Pesticides Transported Have A “Warning” Or “Danger” Signal Word
- e) Your Employees Have Allergies



## 6) A visible Emergency Medical Posting is required in a vehicle whenever:

- a) An Employer Purchases & Transports Pesticides
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- e) Your Employees Have Allergies

7) Service Containers containing pesticides must be labeled whenever:

- a) Transporting On A Public Road Or Storing
- b) Employees Are Applying Pesticides
- c) Pesticides Have A “Warning” Or “Danger” Signal Word
- d) The Applicator Will Be Applying Alone
- e) You’re Expecting An Agricultural Biologist To Do An Inspection

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8) What cannot be stored with pesticides:

- a) Food
- b) Food Containers
- c) Personal Protective Equipment
- d) Children
- e) All The Above

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- b) Food Containers
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9) If you're applying pesticides to a production agriculture site you must notify all public schools/daycares within a  $\frac{1}{4}$  mile:

- a) Annually
- b) One week prior to your first application of the season
- c) At least 48 hours before applying any pesticide not on your annual notification
- d) Both a and c
- e) By using signal flares to warn them you're beginning an application



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10) Production agriculture pesticide applications that are within  $\frac{1}{4}$  mile of a public school/daycare have restrictions between:

- a) August 1<sup>st</sup> and May 31<sup>st</sup>
- b) Between 6am and 6pm, Monday-Friday
- c) Between 8am and 8pm, Monday-Friday
- d) Between 6am and 8pm, Monday-Saturday
- e) Never as long as I only apply 1 acre at a time

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- d) Between 6am and 8pm, Monday-Saturday
- e) Never as long as I only apply 1 acre at a time



# 11) Annual Notifications to public schools/daycares must be submitted:

- a) No later than the start of the school year
- b) By January 1<sup>st</sup> for applications in the next school year
- c) Anytime by phone with written documentation optional
- d) By April 30<sup>th</sup> for applications starting July 1st
- e) By carrier pigeon under a full moon

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- a) No later than the start of the school year
- b) By January 1<sup>st</sup> for applications in the next school year
- c) optional
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- e) By carrier pigeon under a full moon

## 12) Agricultural Fieldworkers must be trained:

- a) At Least Every Five Years With Documentation  
Optional
- b) Annually With Documentation
- c) Annually With Documentation Optional
- d) Each Time Before Working In A Field During A  
“Treated Field” Time Period
- e) They Never Need To Be Trained



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- b) Annually With Documentation
- c) Annually With Documentation Optional
- d) Each Time Before Working In A Field During A  
“Treated Field” Time Period
- e) They Never Need To Be Trained

13) Backpack sprayers containing pesticide solution can be left in the open bed of a pickup truck in public view if:

- a) Visual Contact Is Maintained With The Sprayer
- b) The Sprayer Is Locked Down To The Bed
- c) Never- It's Safer To Lock The Sprayer In The Cab
- d) It's Left Unattended For Less Than 15 Minutes
- e) Either A Or B
- f) None Of The Above

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14) According to DPR standards, how long do PCBs/growers have to keep pesticide use records?

- a) One Year
- b) Two Years
- c) Three Years
- d) Four Years
- e) I Burn Those Along With The Plastic Pesticide Containers



14) According to DPR standards, how long do PCBs/growers have to keep pesticide use records?

- a) One Year
- b) Two Years
- c) Three Years
- d) Four Years
- e) I Burn Those Along With The Plastic Pesticide Containers

15) As a handler, when should you review a pesticide label?

- a) Whenever I Mix/load & Apply
- b) Whenever I Get A New Pesticide
- c) Whenever My Supplier Changes
- d) Once A Week
- e) I Only Read It When Someone Asks Me The Name Of The Pesticide I'm Using

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16) Where should a complete, registered pesticide label for the product being applied be located?

- a) Only At The Mix/Load Site
- b) Only In A file At Office Headquarters
- c) At My County Agricultural Commissioner's Office
- d) At Every Application Site & At Headquarters
- e) Uh, It Was Here Just A Minute Ago



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17) Which of the following lists signal words from least hazardous to most hazardous?

- a) Caution, Warning, Danger
- b) Warning, Caution, Danger
- c) Alert, Warning, Danger
- d) Warning, Alert, Danger
- e) Mayhem, Destruction, Death, Mild Skin Irritant

17) Which of the following lists signal words from least hazardous to most hazardous?

- a) Caution, Warning, Danger
- b) Warning, Caution, Danger
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18) The label is \_\_\_\_\_:

- a) Only For Tips And Suggestions
- b) A Guideline
- c) Optional
- d) The Law
- e) A Lie



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# The End

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