INITIAL STATEMENT OF REASONS AND PUBLIC REPORT
DEPARTMENT OF PESTICIDE REGULATION

Title 3. California Code of Regulations
Amend Sections 6000, 6445, 6447, 6447.2, 6447.3, 6448.1,
6449.1, 6450.1, 6452, 6452.2, and 6784
Pertaining to Field Fumigant Use Requirements

This is the Initial Statement of Reasons (ISR) required by Government Code section 11346.2, and the public report specified in section 6110 of Title 3, California Code of Regulations (3 CCR). Section 6110 meets the requirements of Title 14, CCR section 15252, and Public Resources Code section 21080.5 pertaining to certified state regulatory programs under the California Environmental Quality Act.

SUMMARY OF PROPOSED ACTION/PESTICIDE REGULATORY PROGRAM ACTIVITIES AFFECTED

The Department of Pesticide Regulation (DPR) proposes to amend 3 CCR sections 6000, 6445, 6447, 6447.2, 6447.3, 6448.1, 6449.1, 6450.1, 6452, 6452.2, and 6784. The pesticide regulatory program activities that will be affected by the proposal are those pertaining to environmental monitoring and pesticide enforcement. In summary, the proposed action would add and revise existing field fumigation methods in the Sacramento Metro, San Joaquin Valley, South Coast, Southeast Desert, and Ventura ozone nonattainment areas (NAAs) when using methyl bromide, 1,3-Dichloropropene (1,3-D), chloropicrin, metam-sodium, and potassium N-methyldithiocarbamate (metam-potassium), and make changes to be consistent with product labeling.

SPECIFIC PURPOSE AND FACTUAL BASIS

DPR protects human health and the environment by regulating pesticide sales and use, and by fostering reduced-risk pest management. DPR's strict oversight includes: product evaluation and registration; statewide licensing of commercial and private applicators, pest control businesses, dealers, and advisers; environmental monitoring; and residue testing of fresh produce. This statutory scheme is set forth primarily in Food and Agricultural Code (FAC) Divisions 6 and 7.

The proposed regulatory action pertains to some of the most widely used fumigant active ingredients in agriculture in the state: methyl bromide, 1,3-D, chloropicrin, and metam-sodium, and potassium N-methyldithiocarbamate.

Before planting, farmers use fumigants to control disease, weeds, and pests in the soil. Fumigants are also used to control pests in structures and harvested commodities. Measured in pounds, fumigants represent approximately 20 percent of all agricultural pesticides used in California. Because fumigants are usually applied at a rate of several hundred pounds an acre and are very volatile, fumigants account for an even higher proportion of volatile organic compounds (VOCs) emitted by pesticides. In some areas of the state, up to three-quarters or more of the pesticide VOCs are from fumigants.

VOCs can contribute to the formation of ground-level ozone, which is harmful to human health and vegetation when present at high enough concentrations. The federal Clean Air Act requires each state to submit a State Implementation Plan (SIP) for achieving and maintaining federal ambient air quality standards for ozone. An ozone NAA is a geographical region in California that does not meet either federal or state ambient air quality standards. The U.S. Environmental Protection Agency (U.S. EPA) designates NAAs in Title 40, Code of Federal Regulations (CFR) section 81.305. In 1994, California's Air Resources Board (ARB) and DPR developed a plan to reduce pesticidal sources of VOCs in five NAAs--Sacramento Metro, San Joaquin Valley, South Coast, Southeast Desert, and Ventura--as part of the California SIP to meet the ozone standard.

In January 2008, DPR adopted regulations (Office of Administrative Law File No. 2007-1219-01S) to achieve a reduction of pesticide VOC emissions from 1991 levels in the five NAAs. Those regulations, in part, focus exclusively on fumigant emissions to achieve reductions from pesticides during the May 1 through October 31 peak ozone season through controls on application methods, and established a process to allow the use of interim field fumigation method as part of DPR's efforts to reduce VOC emissions and to provide the necessary flexibility for innovations that reduce emissions to occur.

On July 18, 2008, U.S. EPA revised California's SIP to allow an additional 1.3 tons per day (tpd) of VOCs from pesticides in Ventura in 2008. (73 Federal Register 41277, 41278.) That SIP revision required a portion of the additional 1.3 tons of emission allowed in 2008 to be reduced each year thereafter until the total 20 percent reduction was reached in Ventura in 2012. In September 2008, DPR amended the regulations (Office of Administrative Law File No. 2008-0828-01S) to make it consistent with the phase-in of 1.3 tpd reduction requirement in Ventura approved by U.S. EPA.

In 2009, ARB submitted a revised SIP to U.S. EPA for the San Joaquin Valley that included a pesticide VOC emissions limit of 18.1 average tpd, reflecting the 12 percent reduction from 1990 levels required by the SIP. The proposed SIP revision also includes a commitment to implement restrictions adopted by DPR in 2013 (Office of Administrative Law File No. 2013-0419-01S) that reduce VOC emissions from nonfumigant pesticides by 2014. That submission has not yet been approved by U.S. EPA.

Pesticides must be registered (licensed for sale and use) with U.S. EPA before they can be registered in California. DPR's preregistration evaluation is in addition to, and complements, U.S. EPA's evaluation. Before a pesticide can be sold or used, both agencies require data on a product's toxicology and chemistry--how it behaves in the environment; its effectiveness against targeted pests, and the hazards it poses to nontarget organisms; its effect on fish and wildlife; and its degree of worker exposure.

In 2012, U.S. EPA approved updated labels for soil fumigants currently registered to include new requirements for buffer zones and related measures. The revised labels include buffer zone credits for tarpaulins that greatly reduce the emissions of the fumigants in the soil, also known as totally impermeable film (TIF) tarpaulins. On the labels, they are referred to as tarpaulins that have been tested for permeability and determined by U.S. EPA to qualify for at least 60 percent buffer zone reduction credit.

Within the five NAAs during May 1 through October 31, only the fumigation methods specified in sections 6447.3, 6448.1, 6449.1, and 6450.1 are allowed except some of these methods classified as "high-emission" are prohibited in the San Joaquin Valley, Southeast Desert, and Ventura NAAs. As mentioned above, under specific criteria pursuant to 3 CCR 6452, the Director may grant interim approval of fumigation methods that reduce VOC emissions. The interim method approved must be accompanied by scientific documentation showing VOC emissions are not higher than other "low-emission" methods allowed in a NAA. The interim approval expires three years after the date of the approval unless adopted by regulation. Section 6452 sets different standards by which to evaluate whether a new fumigation method will be allowed: one for the Sacramento Metro and South Coast ozone NAAs; and one for the San Joaquin Valley, Southeast Desert, and Ventura ozone NAAs. Sacramento Metro and South Coast have a less stringent standard because no further VOC reductions from pesticides are needed in these ozone NAAs. Both "low-emission" and "high-emission" methods can be used in these two areas. Only "low-emission" methods are allowed in the San Joaquin Valley, Southeast Desert, and Ventura ozone NAAs during the May-October peak ozone season. The key information is the emission rating (percent of the fumigant applied that is emitted to the air) and the emission rate (emission rating multiplied by the maximum application rate). Either the emission rating or the emission rate can be no greater than the current methods allowed within the ozone NAAs by the regulations. The maximum emission rating allowed in the San Joaquin Valley, Southeast Desert, and Ventura ozone NAAs for methyl bromide is 48 percent, and for chloropicrin and 1,3-D it is 44 percent.

In the past several years, DPR reviewed several studies that estimated fumigant emissions from applications that used TIF tarpaulins. Except for the type of tarpaulin, fumigations with TIF tarpaulins are identical to other methods specified by DPR’s VOC regulations. DPR determined that the TIF tarpaulin fumigation methods meet the standard for an interim method, and in 2013 and 2014, approved interim use of the TIF tarpaulin methods using methyl bromide, chloropicrin, or 1,3-D. The Director's decisions to approve these methods, based upon supporting documentation, are included in the rulemaking file as "Documents Relied Upon." DPR defined TIF tarpaulins as those for which labeling assigns a buffer zone reduction credit of 60 percent.

Some of the available TIF data supported designation as "low-emission" fumigation methods, but the data were insufficient for other methods. DPR assigned TIF the same application method adjustment factor as a non-TIF tarpaulin for methods with insufficient TIF data. For methyl bromide, the data are limited and variable. Some of the data shows lower emissions with TIF tarpaulin, but other data show essentially no difference in comparison to non-TIF tarpaulins. For chloropicrin, the data indicate that all TIF tarpaulin methods meet the 44 percent emission rating standard for low-emission methods. For 1,3-D, the data indicate that TIF tarpaulin-broadcast-shank injection methods meet the 44 percent emission rating standard for low-emission methods. There is insufficient data to determine if other 1,3-D TIF tarpaulin methods meet the 44 percent emission rating standard for low-emission methods.

DPR proposes to amend current regulations to adopt the interim methods since the data provided show that these methods have VOC emissions no greater than the "low-emission" methods specified in section 6452. As stated above, the interim methods expire three years after the date of approval. If the interim methods are not adopted, the current regulations that prohibit TIF tarpaulins

for use with methyl bromide would require growers and applicators to use standard polyethylene tarpaulins, and therefore, further reduction in VOC emissions for each acre fumigated would not be achieved. This is contrary to DPR's goal for VOCs and U.S. EPA's goal for stratospheric ozone depletion. Also, 1,3-D and chloropicrin (and MITC generating products) fumigation methods can currently use TIF tarpaulins but the reductions achieved cannot be applied to meet our SIP requirements.

Additionally, FAC section 12973 states that use of a pesticide shall not be in conflict with the label. Since many of the same requirements in DPR's regulations are now included on the fumigant labels it is not necessary to repeat the requirements in regulation. DPR proposes revising the regulations to remove language that is required by the labels. Also, DPR proposes minor clarifying and grammatical changes throughout the proposed regulations.

In developing the proposed regulations, DPR discussed the proposal with representatives from groups that will be directly affected including registrants, agricultural commodity organizations, pest control advisers, pest control dealers, applicators, and growers. We received comments during the public meeting with DPR's Pesticide Registration and Evaluation Committee.

The adoption of these proposed regulations would assure that smog-producing emissions from pesticide use in the five ozone NAAs will not exceed the pesticide SIP goal, reducing the ozone level that may be harmful to human health and vegetation when present at high concentrations.

PROPOSED AMENDMENTS

- Section 6000. Definitions.

DPR proposes revising the definitions of "Handle" and "Treated field" to include language used on the revised fumigant label. The revised fumigant label refers to an "entry restricted period" for fumigants rather than a "restricted entry interval," which is used for other pesticides. Also, "or other handling activities specified by the label" has been added.

- Section 6445. Fumigation Handling Activities.

As described above, the term "restricted entry interval" has been revised to "entry restricted period" to conform to revised fumigant label language.

- Section 6447. Methyl Bromide Field Fumigation – General Requirements.

Revised fumigant labels provide instructions on calculating the "broadcast equivalent application rate" or "treated area application rate." The "broadcast equivalent application rate" relates to the rate of fumigant applied within the entire perimeter of the application block. The "treated area application rate" relates to only the rate of fumigant applied to the portion of the field that is fumigated (e.g., rate within the bed or strips). DPR calculates VOC emissions based on the "broadcast equivalent application rate;" therefore, DPR proposes to make specific that when calculating the application rate, the calculation must be based on "broadcast equivalent." DPR proposes changing "application rate" to "broadcast equivalent application rate" for each fumigation

method in subsections 6447(a), and 6447.3(a)(2)-(6)(A). Proposed sections 6448.1(a); 6450.1(a); proposed (e)(11)(A)-(12)(A); and 6452(a) and (b)(1)(B) have also been amended to clarify using the broadcast equivalent application rate.

DPR proposes amending subsections (a) and (c) since respiratory protection and tarpaulin requirements in section 6784(b) are proposed to be deleted. This is explained further in the ISR. Also, DPR proposes to delete subsection (g), since this requirement is included on the revised fumigant label. As mentioned above, FAC section 12973 states that use of a pesticide shall not be in conflict with the label. Since this requirement (along with other requirements proposed to be deleted) is now on revised fumigant labels, it is not necessary to repeat the requirement in regulation. Current subsection (h) has been re-lettered as (g), as well as other subsection references to reflect all the changes.

Currently, subsection (e) prohibits the use of tarpaulins with a permeability factor less than 5 milliliters methyl bromide per hour, per square meter, or per 1,000 parts per million under the tarpaulin at 30 degrees Celsius. However, DPR has reviewed studies showing that using a TIF tarpaulin with a permeability factor less than 5 milliliters provides reductions in VOC emissions equivalent to using the current "non-TIF" tarpaulin when applying methyl bromide. Furthermore, U.S. EPA approved updated fumigant labels to include TIF tarpaulins that have been tested for permeability and qualify for at least 60 percent buffer zone credit reduction on buffer zone distances listed on labels. DPR proposes to allow the methods to use the TIF tarpaulins that are less than five milliliters. However, using these TIF tarpaulins during a methyl bromide fumigation will not allow for the reduction of buffer zones. DPR wants to ensure that the buffer zones are maintained at current distances. DPR proposes amending this section to allow the use of these TIF tarpaulins, while still retaining current regulatory buffer zone distances, as described in section 6447.2. Also, use of a TIF tarpaulin will not lift the prohibition of certain methods specified in subsection (a) in the San Joaquin Valley, Southeast Desert, and Ventura NAAs since data do not show emissions will be further reduced. Those methods should continue to be classified as "high emission."

- Section 6447.2. Methyl Bromide Field Fumigation Buffer Zone Requirements.

DPR proposes deleting the Methyl Bromide Field Fumigation Buffer Zone Determination, Rev. 3/10, incorporated by reference from subsection (a). Methyl bromide product labels include the same buffer zones requirements that are specified in this document; therefore, it is no longer necessary to incorporate this document into the regulations.

DPR proposes deleting current subsections (b) and (c) since these requirements are on the revised fumigant labels.

Current subsections (d) through (i) have been re-lettered as proposed subsections (b)-(g). Proposed subsections (b)-(g) have been amended to provide clarity and consistency with product labeling. Current language could potentially lead to confusion with the requirements on the label.

Subsections (e)(2) and (f)(2): DPR proposes revisions to these subsections so that they conform to the revised label.

Subsection (e)(3)(A)(2): DPR proposes removing language from this subsection since that language can now be found on the revised fumigant label. In addition, DPR added language to this subsection to indicate that wording criteria are in accordance with the label.

Subsection (f)(3): DPR proposes adding the requirement that operators of other properties shall provide permission in writing whenever an outer buffer zone would extend into their property. DPR also proposes adding "buildings" as another location not to be contained in the outer buffer zone. These changes make the regulations conform to the revised fumigant label.

- Section 6447.3 Methyl Bromide Field Fumigation Methods.

Subsection (a) describes the field fumigation methods that are allowed for methyl bromide field soil fumigation and also lists the methods that are prohibited in the San Joaquin Valley, Southeast Desert, and Ventura ozone NAAs when applying methyl bromide during the May 1 through October 31 time period. DPR proposes deleting "method 1" (i.e., Nontarpaulin/Shallow/Bed) in subsection (a)(1) since the revised labels prohibit this method of application.

Proposed subsections (a)(2)(E), (a)(3)(B)2, (a)(3)(H), (a)(4)(F), (a)(5)(H), and (a)(6)(O) are being amended to delete when the application block restricted entry interval (now referred to as entry restricted period) ends since this requirement is included on the revised fumigant labels. Proposed subsection (a)(3)(B)2 is also being deleted as this requirement is also included on revised labels.

Subsections (a)(3)(F), (a)(4)(E), (a)(5)(F), and (a)(6)(N) describe the time frame in which a tarpaulin is to be cut or perforated following the completion of a methyl bromide injection to an application block. DPR proposes increasing the minimum number of days from five to nine in which the tarpaulin must not be cut or perforated when a TIF tarpaulin is used to ensure that methyl bromide emissions remain low.

DPR proposes to amend subsections (a)(4)(F-G) and (a)(6)(O-P) to increase the entry restricted period when a TIF tarpaulin is used. Fumigant labels restrict entry for a minimum of 24 or 48 hours after tarpaulin cutting has been completed based on whether the tarpaulin will be removed or not before planting. As mentioned above, TIF tarpaulins must not be cut for a minimum of nine days in order to get the necessary reductions in emissions. Therefore the increase in entry restricted period reflects this, coupled with the 24- or 48-hour requirement on the label.

Also, amend various subsections to reflect numbering changes as well as sections that are proposed to be deleted.

- Section 6448.1. 1,3-Dichloropropene Field Fumigation Methods.

Subsection (b) requires specific soil moisture at the time of application and provides a "feel" method to measure soil moisture that is commonly used. DPR proposes deleting this subsection since soil moisture requirements are described on revised fumigant labels. Current subsection (c) has been re-lettered to (b).

Proposed subsection (c) will not allow applications using the same active ingredient between May 1 through October 31 during the same calendar year if the application is made to alternating fumigated and unfumigated areas (strip fumigations). The current emission rating for the non-tarpaulin, deep, shank broadcast is 64 percent; however, the strip method makes an application to only a certain percent of the total application area. The application is made to strips that cover 35-60 percent of the application area which would result in a broadcast equivalent rate of 122.5-210 pounds per acre and a VOC emission rate of 78-134 pounds per acre, respectively, at the maximum label rate of 350 pounds per treated acre. The proposed subsection will not allow a later application to the area left untreated.

As previously mentioned, under specific criteria, the Director may grant interim approval of fumigation methods that reduce VOC emissions. DPR determined that a fumigation method currently prohibited in San Joaquin Valley, Southeast Desert, and Ventura NAAs met the standard for an interim method when using a TIF tarpaulin, and approved the interim method using 1,3-D within the three NAAs. DPR proposes amending subsection (d) to allow method 2 (Tarpaulin/Shallow/Broadcast) only if applied as a broadcast (not as a "bed") and using a TIF tarpaulin. Except for using TIF tarpaulins, the interim broadcast fumigation method is identical to method in section 6448.1(d)(2).

Also in proposed subsection (d), DPR proposes to prohibit method (d)(5), i.e., Nontarpaulin/Deep/Broadcast, when 1,3-D is used in combination with chloropicrin in the San Joaquin Valley, Southeast Desert, and Ventura NAAs unless applied as alternating fumigated and unfumigated areas (strip fumigations). The current emission rating for the non-tarpaulin/ deep/broadcast is 64 percent; however, the strip method makes an application to only a certain percent of the total application area. The application is made to strips that cover 35-60 percent of the application area which would result in a broadcast equivalent rate of 122.5-210 pounds per acre and a VOC emission rate of 78-134pounds per acre, respectively, at the maximum label rate of 350 pounds per treated acre**.** The resulting rate is below the maximum allowed chloropicrin emission rate of 176 pounds per acre.

Proposed subsections (d)(5) and (6) prohibit tarpaulin/deep/bed fumigations. This type of application is no longer allowed on the revised labels.

Proposed subsections (d)(1)(A), (d)(2)(A), (d)(3)(A), and (d)(4)(A) are being deleted since the injection point requirement is contained on revised fumigant labels.

Subsections (d)(2)(D) and (d)(4)(D) describe the time frame in which a tarpaulin is to be cut or perforated following the completion of a methyl bromide injection to an application block. DPR proposes increasing the minimum number of days from five to nine in which the tarpaulin must not be cut or perforated when a TIF tarpaulin is used. Recent studies show that a minimum of nine days is required to provide necessary reductions in emissions.

- Section 6449.1. Chloropicrin Field Fumigation Methods.

Current subsections (a), (c) and (d) are proposed to be deleted since application rate, soil moisture, and tarpaulin repair requirements are now on the revised fumigant labels.

Current subsection (b) has been re-lettered as (a). For products containing chloropicrin as the sole active ingredient, the field soil fumigation must be made using the methods described in section 6447.3 or 6448.1. However, within the San Joaquin Valley, Southeast Desert and Ventura NAAs some methods are prohibited because some methods are considered "high emission" methods. DPR determined that some fumigation methods currently prohibited met the standard for an interim method when using a TIF tarpaulin, and approved the interim method using chloropicrin. In proposed section (a), methods described in the following sections will be allowed within the three NAAs when using a TIF tarpaulin: sections 6447.3(a)(4), 6447.3(a)(3) and (5) if applied as alternating fumigated and unfumigated areas (strip fumigation), and 6488.1(d)(2) if applied as a bed fumigation. For chloropicrin, the data indicate that all TIF tarpaulin methods meet the 44 percent emission rating standard for low-emission methods.

- Section 6450.1. Metam-Sodium and Potassium N-methyldithiocarbamate (Metam-Potassium) Field Fumigation Methods.

DPR proposes deleting application rate for metam-sodium in subsection (a), soil moisture and cultivating requirements in (b) and proposed (d), respectively, since these are now included on the revised fumigant labels. Also, amend to reflect correct reference citations.

- Section 6452.2. Fumigant Volatile Organic Compound Emission Limits.

In proposed subsections (c)(3) and (d)(3), amend to reflect correct references due to lettering change.

- Section 6784. Field Fumigation.

DPR proposes amending subsection (b)(2) by deleting some employee protection requirements since these are now include on the revised labels, and using the term "entry restricted period" for reasons previously stated. Propose to delete (b)(4) since tarpaulin cutting and removal procedures are also on the labels.

Subsection (b)(2)(C) has been reordered to (b)(2)(B).

<u>COLLABORATION WITH OFFICE OF ENVIRONMENTAL HEALTH HAZARD ASSESSMENT (OEHHA) PURSUANT TO FAC SECTIONS 12980 AND 12981</u>

DPR and OEHHA jointly and mutually developed the proposed regulation as specified in FAC sections 12980 and 12981, utilizing OEHHA's health-based recommendations as a factor in setting DPR's regulatory target level related to pesticides and worker safety. DPR and OEHHA have set forth the rulemaking process used to meet these statutory requirements in a Memorandum of Agreement dated August 13, 2008.

CONSULTATION WITH OTHER AGENCIES

DPR consulted with the California Department of Food and Agriculture during the development of the text of the proposed regulations, as specified in FAC section 11454 and the February 6, 1992, Memorandum of Agreement developed per FAC section 11454.2.

DPR consulted with ARB, University of California, and the Department of Industrial Relations.

DPR has also consulted with the California Agricultural Commissioners and Sealers Association at a Pesticide Regulatory Affairs Committee meeting.

ALTERNATIVES TO THE PROPOSED REGULATORY ACTION

DPR has not identified any feasible alternatives to the proposed regulatory action that would lessen any adverse impacts, including any impacts on small businesses, and invites the submission of suggested alternatives.

ECONOMIC IMPACT ON BUSINESS [GOVERNMENT CODE SECTION 11346.2(b)(5)(A)]

The proposed regulations will not have a significant economic impact directly affecting businesses, including the ability of California businesses to compete with business in other states. The document relied upon to make this determination is listed in the "Documents Relied Upon" section of this ISR and is available from DPR.

ECONOMIC IMPACT ASSESSMENT PURSUANT TO SECTION 11346.3(b)

Creation or Elimination of Jobs within the State of California: The proposed action would add and revise existing fumigation methods in the five NAAs providing alternative methods for growers while continuing to reduce the total VOC emissions below the benchmark limits. There will be no creation or elimination of jobs within California.

Creation of New Business or the Elimination of Existing Businesses within the State of California: The proposed action would not create or eliminate businesses. The intent of the proposed regulation is to allow additional or revised fumigation method while continuing to reduce the total VOC emissions below the benchmark limit in the NAAs.

The Expansion of Businesses Currently Doing Business within the State of California: It is unlikely the proposed regulations will result in the expansion of businesses currently doing business within California. Based on 2012 data, an increase of additional 700 acres could have been treated without violating Ventura's VOC emissions inventory benchmark. However, the new fumigant labels have increased buffer zones to address exposure concerns which have resulted in a decrease in acres fumigated from 23,702 in 2012 to 15,760 in 2013. While the use of TIF tarps would allow 700 more acres to be fumigated without going over the fumigant limit, the new buffer zone restrictions designed to limit exposure may prohibit some or all of that increased acreage allowed by the use of TIF tarps under the interim method now being proposed as an amendment to the VOC regulations.

The Benefits of the Regulation to the Health and Welfare of California Residents, Worker Safety, and the State's Environment: The federal Clean Air Act requires each state to submit a SIP for achieving and maintaining federal ambient air quality standards for ozone. California's SIP contains an element to reduce pesticidal sources of VOCs. VOCs contribute to the formation of ground-level ozone, which is harmful to human health and vegetation when present at high enough concentrations. The adoption of these proposed regulations would assure that smog-producing emissions from pesticide use in the five ozone NAAs will not exceed the California SIP goal, reducing the ozone level that may be harmful to human health and vegetation when present at high concentration. Adoption of these regulations will provide a benefit to public health and the environment by continuing to reduce VOC emissions in the NAAs.

IDENTIFICATION OF ANY SIGNIFICANT ADVERSE ENVIRONMENTAL EFFECT THAT CAN REASONABLY BE EXPECTED TO OCCUR FROM IMPLEMENTING THE PROPOSAL

DPR's review of the proposed action showed that no significant adverse effect to California's environment can reasonably be expected to occur from implementing the proposal. Therefore, no alternatives or mitigation measures are proposed to lessen any significant adverse effects on the environment.

EFFORTS TO AVOID UNNECESSARY DUPLICATION WITH FEDERAL REGULATIONS

The proposed regulatory action does not duplicate or conflict with any regulations contained within the CFR. There are no regulations within the CFR that address this issue.

As noted in this ISR, the federal Clean Air Act requires each state to submit a SIP for achieving and maintaining federal ambient air quality standards, including the standard for ozone. In 1994 (and revised in 2007 and 2009), ARB and DPR developed a plan to reduce pesticidal sources of VOCs in NAAs as part of the California SIP to meet the ozone standard.

DOCUMENTS RELIED UPON

1. Hydrus Simulation of Chloropicrin and1,3-Dichloropropene Transport and Volatilization in the Lost Hills Fumigation Trials. Memorandum from Frank Spurlock, Bruce Johnson, and Atac Tuli to Randy Segawa, Environmental Monitoring Branch, DPR. February 8, 2013. http://www.cdpr.ca.gov/docs/emon/pubs/ehapreps/analysis_memos/2420-segawa_final.pdf

2. DPR. 2013. *Director's Decision Concerning Environmental Monitoring Branch's Request for Approval of Reduced Volatile Organic Compound Emissions Field Fumigation Method.* Brian Leahy, Director, Department of Pesticide Regulation. April 29, 2013.

3. DPR. 2014. *Director's Decision Concerning Environmental Monitoring Branch's Request for Approval of Reduced Volatile Organic Compound Emissions Field Fumigation Method.* Brian Leahy, Director, Department of Pesticide Regulation. July 31, 2014.

4. DPR. 2014. *Director's Decision Concerning TriCal, Inc.'s Request for Approval of Reduced Volatile Organic Compound Emissions Field Fumigation Method.* Brian Leahy, Director, Department of Pesticide Regulation. July 31, 2014.

5. County Agricultural Commissioner and Sealers Association's Pesticide Regulatory Affairs Committee Minutes, October 22, 2014.

6. Pesticide Registration and Evaluation Committee Minutes, September 19, 2014.

7. Economic Analysis for the Department of Pesticide Regulation Amendment to Title 3 CCR Sections 6000, 6445, 6447, 6447.2, 6447.3, 6448.1, 6449.1, 6450.1, 6452, 6452.2, and 6784. California Environmental Protection Agency, Agencywide Economic Studies Section, Air Resources Board. Memorandum from Stephen Storelli to Linda Irokawa-Otani, Regulations Coordinator, DPR. April 24, 2015.