



2024 County of Monterey Chloropicrin and Chloropicrin with 1,3-Dichloropropene Permit Conditions *Broadcast and Drip*

General Conditions

All persons involved in the fumigation must follow the restrictions and requirements of the current label of the product being applied, regardless of the labeling on the fumigant product you will be using.

In all cases, the most restrictive requirement must be followed, whether it is the label, regulations, or Monterey County permit conditions.

When approved, the notification log, encroachment and vacating agreements become conditions of the restricted materials permit, along with this document.

Only a California licensed Pest Control Business (PCB) registered in Monterey County to work in Soil Fumigation Pest Control (Category L) is allowed to apply the fumigant.

Throughout this document, whenever the pronoun “you” or “your” is used, it refers to the operator of the property to be fumigated who is the fumigant use permit holder.

You, the PCB, and the Pest Control Adviser (PCA) are all responsible to comply with the conditions of this permit. Failure to comply with permit conditions or fumigation regulations may result in an administrative civil penalty consisting of a fine to you and/or the PCB and/or the PCA, depending on the circumstances of the violation.

You or your representative, who has the authority to control the activities of your employees, must be present at the fumigation site during the application to supervise your handlers. Your representative must be trained and equipped as a pesticide handler. During the application and when on site, in addition to site monitoring and controlling the activities of your employees, you (or your representative) must monitor the buffer zone and ensure that only vehicular transit and fumigation handling activities occur within the buffer zone, whether on your property or on adjacent properties. All your other employees at the fumigation site must be aware of who your representative is if you delegate this activity.

When a school property is within $\frac{1}{4}$ mile (1320 feet) of a fumigation block, the injection must be completed 36 hours prior to the start of a school session. School sessions are those times when students are attending scheduled classes.

The map submitted with the permit application must show the location of all wells used for potable water within 100 feet of the intended application block(s).

Unless otherwise approved by this office, all broadcast applications must be completed no later than 1:00 p.m. and all drip (chemigation) applications must be completed no later than 3:00 p.m.

Application Block Size

The application block size is limited to 40 acres at one location within a 24-hour period.

Tarps

Totally impermeable films (TIF) tarps are required for all applications; the tarp name and lot number must be printed on the tarp in a font size equal to 2-3 inches in height and printed at least one foot from each edge and at an interval of 20-30 feet along the length of the tarp.

For products with chloropicrin as the sole active ingredient, you must use tarps listed in [DPR's Approved Tarp List for Products Containing Chloropicrin](https://tinyurl.com/Chloropicrin-TIF-Tarps). <<https://tinyurl.com/Chloropicrin-TIF-Tarps>>

For products with combined chloropicrin and 1,3-D active ingredients, you must use tarps listed in [DPR's Approved Tarp List for Products Containing 1,3-Dichloropropene](https://tinyurl.com/13D-TIF-Tarps). <<https://tinyurl.com/13D-TIF-Tarps>>

The tarps are considered part of the application equipment and they must be kept in good repair throughout the application.

Proposed Soil Fumigation Plan

You must submit a complete proposed Soil Fumigation Plan which must be evaluated and approved before our office will add a fumigant to your Monterey County Restricted Materials Permit. **Submission of incomplete or problematic proposed fumigation plans may delay approval, which may require fumigations to be rescheduled.** If the proposed fumigation plan is incomplete or there are changes that need to be made, an inspector will contact you for amendments/corrections. You are responsible for notifying the PCB of any changes, amendments or corrections to the fumigation plan. *For applications within 1/4 mile (1320 feet) of any school site in Monterey County, the fumigation plan should be submitted at minimum 30 days before the intended application.

The fumigation plan, (including all required calculations, permissions, and notifications), must be submitted on either the County of Monterey Chloropicrin Drip Soil Fumigation Plan form or the County of Monterey Chloropicrin Shank Soil Fumigation Plan form.

It is critical that the number of acres to be fumigated per block is accurate on the worksite plan to ensure buffer zones are calculated correctly. To avoid possible buffer zone or notification violations if you are estimating the actual acreage, you should overestimate rather than underestimate.

You must submit a Restricted Materials Permit application with the Soil Fumigation Plan if you do not currently possess a Restricted Materials Permit.

The Restricted Materials Permit (RMP) Alternatives and Mitigation Measures Considered form must be submitted/updated for all Soil Fumigation Plans submitted.

Fumigation Plan Maps

A complete, legible aerial map showing an outline of the proposed application block with acreage and at least a ¼ mile distance of surrounding areas must be submitted as part of the fumigation plan. The map must identify adjacent property operators, the location and distance to all structures that are near the application site, including residences, onsite employee housing, schools, convalescent homes, hospitals, businesses, or other similar sites identified by the County of Monterey Agricultural Commissioner. Measurements to all adjacent structures must be made from the structure to the edge of the application block. The map must also identify residences or structures that will be vacated for the application and the location and distance of all potable water wells within 100 feet of the block(s) to be fumigated. The maps must also include locations of difficult-to-evacuate sites within ¼ mile of the application block; and distances to bus stops; roadways; rights-of-way; walking paths; sidewalks; lakes; waterways; and wells. If the application is a chemigation, the

injection point(s) must be indicated on the map. The map legends included with the County of Monterey Chloropicrin Drip Soil Fumigation Plan form, or the County of Monterey Chloropicrin Shank Soil Fumigation Plan form should be used to identify sensitive areas.

Failure to submit complete maps may delay the issuance of your permit.

Buffer Zones

Buffer zones begin at the start of the application and end 48 hours after the end of the application. Whenever the term “buffer zone” is used, it refers to products containing chloropicrin and extends outward from the application block.

Label-specified buffer zone reduction credits are not allowed. The only buffer zone credit allowed is for DPR-approved TIF tarps. This credit allows use of the decreased buffer zone distances in DPR’s TIF-specific buffer zone tables, found on DPR’s [Additional Labeling Requirements for Use of All Products Containing Chloropicrin as an Active Ingredient in California](https://tinyurl.com/Pic-BZ-Table) webpage <<https://tinyurl.com/Pic-BZ-Table>>. The buffer zone tables include minimum buffer zone distances.

Round up to the nearest rate and block size when determining the buffer zone. The minimum buffer zone distance for all TIF fumigation methods for products containing chloropicrin as the sole active ingredient is 25 feet.

Overlapping Buffer Zones

If the buffer zones for two or more applications (covered by these permit conditions) overlap within the first *36 hours, the following restrictions apply:

- Twelve (12) hours must elapse from completion of the earlier application, until the start of injection of the next application.
- The combined acreage of application blocks shall not exceed 40 acres.
- Buffer zone distance for each block shall be based on individual method, application rate and acres.

If buffer zones for two or more applications of products covered by these permit conditions overlap during the first *48 hours, and there are businesses or residences within 300 feet of the outer edge of the buffer zone for either fumigation, the certified applicator must take Emergency Preparedness and Response Measures listed on the fumigant label.

*The 36 and 48 hours are measured from the time the earlier application is complete until the start of the later application.

Notification and Monitoring

Fumigation notification must be provided to all properties within 300 feet of the perimeter of the fumigant buffer zone at least one week before the fumigation begins **and** the field must be monitored during the fumigation and for 72 hours after completion of the fumigation.

Properties requiring notification include, but are not limited to, properties that contain schools, residences, hospitals, convalescent homes, onsite employee housing, or businesses, including operators of agricultural fields.

Notifications must be provided using the Notification of Field Fumigation in Monterey County form, or other form(s) approved for use by the Commissioner. The notifications must be noted on the County of

Monterey Chloropicrin Notification Log form. Columns A, B, C, D, E & F of the log are required and must be completed and submitted with the Soil Fumigation Plan before the fumigant is added to your permit. Columns G & H must be filled out when applicable.

Specific notification of the date and time of the start of the fumigation must be provided 48 hours prior to the application to property/business operators or residents who received fumigation notification and requested specific notification. If the request for specific notification is made less than 48 hours prior to the start of the application, specific notification must be given but the 48-hour requirement does not apply.

A trained and fully equipped handler (monitor) must monitor the entire periphery of the fumigated block and buffer zone during the application, and for 72 hours following completion of the application, as follows: one hour before sunset; once during the night; one hour after sunrise; and once during daylight hours. Monitoring must take place outside of the buffer zone.

The monitor must record the time, wind speed and direction, and comments about conditions at the field (such as odors, sensory irritation, tarp tears, unusual conditions, people in the buffer zone, etc...) on the Post Application Monitoring Form provided by the County of Monterey Agricultural Commissioner. The wind speed must be measured with an electronic anemometer. A complete copy of the monitoring form must be submitted to the Agricultural Commissioner's Office after completion of all fumigated blocks.

The monitor must have full olfactory capabilities, (e.g., must not be impaired by conditions such as, but not limited to, allergies or head colds).

If the monitor experiences sensory irritation, you must implement the emergency response plan immediately, and you must notify your PCA immediately. The PCA or a QAL holder licensed in Category L from the Pest Control Business must respond to the field within 30 minutes to one hour and use chloropicrin gas detection tubes to determine fumigant levels. You must also notify our office within one hour.

Encroachment and Vacating Agreements

If buffer zones extend into an adjoining outdoor residential, agricultural, or other property that is not under your direct control, a completed, signed, and initialed Encroachment Agreement from the operator of the adjoining property (or head of household if the adjoining property is residential) must be submitted as part of the Soil Fumigation Plan. You are responsible to make sure that the person signing the form understands their responsibilities. **A copy of the encroachment agreement must be left with the person who signed the form.**

If an occupant/head of household of a structure agrees to vacate a residence, garage, barn, shed or other structure to allow the buffer zone to extend into the area that contains the structure, a completed, signed, and initialed Monterey County Residential & Non-Production Ag Encroachment/Vacating Agreement from the occupant/head of household must be submitted with the Soil Fumigation Plan before the fumigant is added to your permit. You are responsible to make sure that the person signing the form understands their responsibilities. **A copy of the agreement must be left with the person who signed the form.** In this case, a separate encroachment agreement does not need to be signed and submitted, unless the property includes agricultural fields under the control of the head of household of the residence to be vacated.

You must use the Chloropicrin/Chloropicrin-1,3-D Buffer Encroachment or Residential & Non-Production Ag Encroachment/Vacating Agreement forms provided by our office.

At least forty-eight (48) hours prior to the start of the fumigation, notification of the date and time of the start of the application and the anticipated expiration of the buffer zone must be provided to those persons who have signed an encroachment agreement or encroachment/vacating agreement. Written notification (Notice to Vacate) must be provided to persons agreeing to vacate. When notifications are required, you and/or the PCA must keep a notification log on the County of Monterey Chloropicrin Notification Log form. Columns A, B, C, D, E & F of the log must be completed and submitted with the Soil Fumigation Plan before the fumigant is added to your permit.

If the fumigation of an application block does not commence on the day specified on the NOI, a new notification must be provided to those persons who are required to receive notification. Failure to do this will delay the application.

Notice to Vacate

At least 48 hours prior to starting the fumigation, you must provide a completed Notice to Vacate form to all persons who have provided you with a signed Vacating Agreement. A copy of the signed Notice to Vacate must be submitted with your Notice of Intent.

Weather

Field fumigations should not commence if the weather forecast for the day of the fumigation and 48 hours following the fumigation indicate any of the following:

- the air temperature in the vicinity of the fumigation will be above 85°F,
- wind speeds will drop below 3 mph for 5 or more consecutive hours,
- wind speeds will rise above 20 mph.

You can find this information at The National Weather Forecast Office: <http://www.wrh.noaa.gov/mtr/>

Notices of Intent (NOIs)

NOIs and re-intents must be submitted electronically through TELUS Agronomy (formerly Agrian) and PCAs must ensure TELUS communicates with www.CalAgPermits.org to forward the NOIs for review by an inspector. NOIs or re-intents, recommendations, and maps **must also** be submitted by e-mail or in person. If submitting an NOI or re-intent by e-mail, the NOI or re-intent, recommendation, and map must be sent in one email. Failure to include everything in one e-mail may cause a delay to the fumigation.

A separate and unique NOI must be submitted for each application block to be treated. **NOIs with multiple application dates and/or multiple application blocks are no longer allowed.**

When e-mailing an NOI or re-intent, recommendation, and map, the subject line of the e-mail **must** contain:

Grower Name, Ranch Name and Recommendation Number

There are three offices and e-mails where growers, PCB's and/or PCA's may e-mail or drop off NOIs or re-intents, recommendations, and maps depending on the location of the fumigation:

Coastal District Office:

For fumigations west of Highway 1, north of State Route 156 from Castroville to Prunedale, and west of Highway 101 north of Prunedale.

Email: 281-Pajaro-PUE@co.monterey.ca.us

South County District Office:

For fumigations south of Soledad, NOIs and maps should be sent to:

Email: 281-KingCity-PUE@co.monterey.ca.us

Salinas Office:

All other fumigations south of the Coastal District boundary described above should be sent to the Salinas office.

Email: 281-Salinas-PUE@co.monterey.ca.us

NOIs must be submitted at least **48 hours** before the start of the fumigation. No waivers of the 48-hour NOI requirement will be granted.

For any application within ¼ mile (1320 feet) of a Pajaro Valley Unified School District school or North Monterey County School District school, the NOI must be submitted **120 hours** before the start of the intended application.

In addition to the standard information required in 3 CCR section 6434, the following information must be included on or submitted with the NOI:

- The hour fumigant injection will start.
- The fumigation method and the four-digit field fumigation code.
- A copy of each Notice to Vacate.
- A clear, complete and accurate aerial map of the fumigation site showing:
 - Area to be fumigated with acreage.
 - Identification of adjacent property operators.
 - Areas within the application block(s) that will not be fumigated.
 - Buffer zone size for each block.
 - Areas where the buffer zone encroaches onto property not operated by the operator of the property to be fumigated with distances identified in feet.
 - Structures that will be vacant or vacated for the fumigation:
 - Numbers on map must correspond to Monterey County Encroachment and Vacating Agreements and Notification Log (as applicable).
 - Structures under the control of the owner of the application block that will be vacated must be identified on the map with **GV**.
 - Locations of difficult to evacuate sites within ¼ mile (1320 feet) of the fumigation blocks.
 - All occupied structures and bystander areas within 300 feet of the outer perimeter of the buffer zone.
 - Distances must indicate where the measurements were taken.
 - The location of the well supplying water for the fumigation, location of backflow prevention device(s), and the injection site(s) that will be used for each block (if applicable).

For a Sunday or Monday fumigation, or Tuesday fumigation when Monday is a County-observed holiday, an NOI must be submitted no later than noon on the Thursday before.

The fumigation must not commence sooner than the intended starting time or later than 12 hours after

the starting time specified on the NOI.

If fumigation of an application block does not commence within 12 hours of the time specified in the NOI, a new NOI is required with the new dates and/or times.

Changes to the NOI must be made in writing, either in person or by e-mail. Inspectors will not alter or change the information on the NOI.

When an NOI is re-submitted because of a change, rescheduling, or to finish a job the 48- hour waiting period may be waived provided there are no vacating or encroachment agreements associated with the application, and the applicator re-submits the NOI prior to commencing the fumigation. Re-submitted NOIs that are for jobs more than 3 days after the original application date may not have the 48-hour waiting period waived.

Re-submitted NOIs must clearly indicate that it is a re-intent and the reason for the request must be noted. An NOI re-submitted to finish a job must specify the area to be completed. When an NOI is re-submitted with reconfigured blocks, the completed sections of the block must be clearly identified on the map.

Use Reporting

A separate pesticide use report (PUR) must be submitted for each application block treated in a 24-hour period.

See page 9 for additional NOI, PUR, and other requirements for products that contain 1,3-Dichloropropene (1, 3-D).

Chemigation System (Drip Fumigations)

You or your representative, who is knowledgeable of the irrigation system, must be present at the treatment site from the start of the fumigation until the injection is complete (drip lines are purged). Your representative must be trained and equipped as a pesticide handler.

During a drip application, if there is more than one fumigant injection site, each injection site must be continuously accessible to and within the line of sight of an applicator for the PCB or the certified private applicator until injection and system flushing is complete.

The chemigation equipment (check valve, low pressure drain, and vacuum relief) that is required at the well head must be installed **before** the NOI is submitted.

All row end drip tape connections must be covered by the same type of tarp that is covering the beds, or by two inches of soil.

The drip system must be filled with water and tested for pressure variation, clogged emitters, and leaks **before** the chemigation. The system pressure must not exceed the pressure rating of the drip tape and the pressure variation in the drip tape throughout the field must be less than three pounds per square inch. Drip system must be free of leaks and clogged emitters.

During application, which includes the drip system flush, do not allow treatment solution to accumulate on the soil surface. If puddling or run-off occurs, discontinue the application immediately, and cover with enough soil to absorb the puddling.

After application, the drip system must be flushed with a volume of water at least three times the

volume of the mainline and laterals of the drip system.

Buffer Zone Posting

- You, the PCB and the PCA are responsible for ensuring **all** boundaries of the buffer zone are posted with warning signs. The warning signs must meet the criteria described in the fumigant labeling.
- The signs must be posted at intervals not exceeding 200 feet.
- Signs must be placed at all usual points of entry and along likely routes of approach.
- You must maintain the signs so that they are upright and legible for the duration of the buffer zone, and you must remove the signs within 3 days (72 hours) after the expiration of the buffer zone period.
- Signs must remain visible and readable from 25 feet during the entire posting period.

Tarp Failure and Re-Treatment

If at any time after the fumigation the integrity of the tarp is compromised; there is any evidence of excessive gas escaping, or about to escape; you must evaluate the hazard and immediately report the status of the tarp to the PCA. You must also notify the County of Monterey Agricultural Commissioner's Office within one hour.

Prior to retreating any portion of a previously treated field you must notify the County of Monterey Agricultural Commissioner's office.

- The notification shall be either oral, in writing or both and include the location, the specific date and time of re-treatment and the pesticide(s) to be used.
- As soon as possible, the NOI for the original job must be re-submitted to our office. The re-submitted NOI must clearly indicate that it is a re-treat.
- Pesticide use reports for the re-treatment shall be completed and submitted to our office and may be marked "re-treat".

Tarp Cutting and Removal

When you hire a tarp cutting and removal company to cut and remove fumigation tarps, you and the tarp cutting & removal company share responsibility for compliance with Tarp Cutting & Removal conditions of this permit.

Failure to comply with permit conditions or fumigation regulations may result in an administrative civil penalty consisting of a fine to either you and/or the tarp cutting and removal company, depending on the circumstances of the violation.

Tarps must not be cut before 10 days (240 hours) have passed after the application is complete and must not be removed sooner than one day (24 hours) after the tarps are cut.

No tarps may be perforated or removed early regardless of weather conditions without prior approval of the County of Monterey Agricultural Commissioner's office.

Notification to Tarp Cutters and Pullers

You or your authorized representative must notify the tarp cutting and removal company of the date and exact time when the tarps can be cut.

For Products Containing 1,3-Dichloropropene (1, 3-D)

All applications of products containing 1,3-D are prohibited during the month of December.

1,3-D is prohibited for use in a greenhouse.

For all townships in California, the 1,3-D use limit is 136,000 Adjusted Total Pounds (ATP) per calendar year. Dow AgroSciences LLC (DAS) or DAS's contractor is responsible for tracking, reporting, and ensuring township use limits are observed. The annual township use limit is fixed and cannot be exceeded.

Maximum Application Rate

An application cannot exceed the maximum application rate of 332 pounds of 1,3-D active ingredient per broadcast-equivalent acre.

Occupied Structures

Application of a product containing 1,3-D is prohibited within the setback distance from occupied structures, including residences, onsite employee housing, schools, convalescent homes, hospitals, businesses, or other similar sites identified by the County of Monterey Agricultural Commissioner. For the purposes of establishing the setback distance, non-residential agricultural buildings, including barns, livestock facilities, sheds, and outhouses, are not by default considered to be an occupied structure. Additionally, the setback is measured from the wall of the structure, not lawns or other outdoor areas associated with a structure. However, a setback is also required for any other indoor or outdoor site that will be occupied for at least 72 consecutive hours during and following a 1,3-D application. The County of Monterey Agricultural Commissioner has the discretion to apply the setback to other sites if someone may be at an indoor or outdoor area for more than 24 consecutive hours during and following the application.

Setbacks

The minimum setback distance from an occupied structure to the perimeter of a 1,3-D fumigation is 100 feet. However, the setback tables in DPR's [1,3-Dichloropropene Field Fumigation Requirements manual Established January 1, 2024](https://tinyurl.com/13D-Manual) on DPR's website at <<https://tinyurl.com/13D-Manual>> or the [setback calculator](https://tinyurl.com/13D-Setback-calculator) found on DPR's website at <<https://tinyurl.com/13D-Setback-calculator>> must be used to calculate the setback distance for each application. All applications in Monterey County must use the Coastal Counties setback tables.

Setbacks for Adjacent Applications

Adjacent applications that occur within 36 hours from the end of an application to the start of another application must recalculate the setback distance for all applications using the combined acreage, highest application rate, and most restrictive fumigation method of those applications when the distance

between the applications is equal to or less than the combined setback distances of each application.

If an NOI for a 1,3-D application scheduled for a future date overlaps within 36 hours of a previous application's setback, the NOI must be denied if the combined acreage exceeds that specified by the setback table or the earlier application cannot accommodate the changes caused by the later application (i.e., the combined acreage cannot comply with the setback distance and maximum acreage specified by the setback table).

TIF tarpaulin methods with minimum restrictions (100-foot setback maximum) are exempt from overlapping applications requirements. Adjacent applications can occur on consecutive days with no additional overlapping application restrictions.

Soil Moisture

Except for drip chemigation field soil fumigations, 3 CCR section 6448.2(b) requires the application block to have a minimum soil moisture of 50% of field capacity at a depth of three to nine inches below the surface when the fumigation occurs. One of the following options detailed in the DPR's [1,3-Dichloropropene Field Fumigation Requirements manual Established January 1, 2024](https://tinyurl.com/13D-Manual) shall be used to comply with the soil moisture requirement:

- Option 1: Irrigation
- Option 2: Feel and Appearance
- Option 3: Soil Moisture Sensor

Notice of Intent

You must provide the CAC with a DAS- or DAS contractor-approved recommendation before the NOI is accepted and the application is allowed.

In addition to the information required in 3 CCR section 6434, the following information shall be included on or provided with the NOI:

- Starting ATP balance available in the township prior to the proposed application
- Application depth and type, including four-digit field fumigation method (FFM) code from Table 1
- The total gallons (TG) of the pesticide formulation
- The pounds per gallon (lbs./gal) of 1,3-D formulation
- The percent by weight of a.i., expressed as a decimal (.XX)
- The total pounds (TP) of 1,3-D a.i. applied
- The application factor (AF) appropriate for the proposed application from Table 2
- The adjusted total pounds (ATP) for the proposed application
- The hour the fumigation will start
- If tarps are used for the fumigation, the type of tarp used (ex.: standard, VIF, TIF).

The NOI will be denied if the proposed application ATP exceeds the available use limit balance in a township.

Tarps

For products with combined chloropicrin and 1,3-D active ingredients, you must use tarps listed in [DPR's Approved Tarp List for Products Containing 1,3-Dichloropropene](https://tinyurl.com/13D-TIF-Tarps). < <https://tinyurl.com/13D-TIF-Tarps> >

Tarp Perforation and Removal

Totally impermeable film (TIF) tarps approved by DPR for 1,3-D according to 3 CCR section 6448.2 must not be perforated until a minimum of ten (10) days (240 hours) have elapsed after the application is complete and must not be removed until a minimum of one (1) day (24 hours) after perforation, unless a weather condition exists that necessitates early tarp perforation or removal as specified by the fumigant label. Any situation where early tarp perforation or removal may be necessary must be brought to the attention of an Agricultural Commissioner's Office Pesticide Use Enforcement Deputy for evaluation with regulatory requirements before the early tarp perforation or removal can take place.

Entry into Application Block

Entry into the application block (including early entry that would otherwise be permitted by the Worker Protection Standard or 3 CCR section 6770) by any person, other than a government official mandated to regulate pesticide use or a properly trained and equipped handler who is performing a handling task permitted by the product labeling, is prohibited from the start of the application until 7 days (168 hours) after the application is complete. This prohibition applies to all applications, including all tarp types and un-tarped applications.

Use Reporting

All PUR data must be reported through TELUS per 3 CCR section 6626(g)(1). A separate use report must be submitted for each application block treated in a 24-hour period. Use reports required by 3 CCR section 6626(b) for all 1,3-D applications must include the FFM code describing methods of application pursuant to 3 CCR section 6448.2 found in Table 1 of DPR's [1,3-Dichloropropene Field Fumigation Requirements manual, Established January 1, 2024](https://tinyurl.com/13D-Manual) <<https://tinyurl.com/13D-Manual>>