Laws, regulations, and labels: Getting through the fume season

Santa Barbara County
Agricultural Commissioner's Office

Fumigants

- Methyl Bromide
- Chloropicrin
- 1,3, D when mixed w/Chloropicrin
- Metam Sodium/Metam Potassium

Permit conditions

- Santa Barbara County's fumigation permit conditions are a combination of regulations, DPR suggested permit conditions, and responses, over the years to local conditions and events.
 - Incident Investigation
 - Need to determine the cause
 - Favorable outcomes
 - Unfavorable outcomes

The Grower and the Pest Control Company

Important to remember

- The permit conditions apply to the field. Labels apply to chemical. Everyone must follow both.
- Growers and pest control businesses must rely on each other for a successful and compliant fumigation.
- Excellent communication among all parties involved is key.
- Growers and PCBs must have copies of the label, entire permit, and FMP BEFORE the fumigation begins!

Which fumigant to use?

- What is nearby?
- What tarps do you have?
- What size BZ can you afford?
- 1,3-D cap, especially near sensitive sites!
- Don't bed up too soon!



Which fumigant to use?

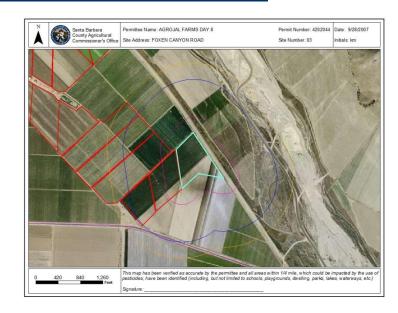
Example: 1,3-D has a100' application restriction to structures regardless of whether the structure is in the buffer zone or which tarp you use



- Growers that worked with their PCB/PCA prior to their appointment were well prepared and knew their field layout and chemical
- We turned away some growers when they cam to their appointments without the necessary information

Which tarp to use?

- Chemical
- What is nearby?
- Do you need credits?
- Availability?
- Identification?
- Bed or broadcast?



Tarp info

- Credits found on US EPA website
 http://www.epa.gov/pesticides/reregistration/soil_fumigants
- Standard, 10-40% tarps, 30-60% tarps
- Proof of tarp type may be required
- 100% Chloropicrin requires a 60% credit tarp in both Santa Barbara and SLO Counties
- DPR allows credits for tarp type and water seals only

- We had to verify info with several tarp companies
- Some growers purchased tarps they did get the tarp credit they needed or thought the purchased
- A few growers were caught without the 60% tarps when 1,3 D capped
- Plan well in advance, work with your PCA/PCB and us to make sure you are getting the tarps you need

FMP maps

- SBCAC requires a complete FMP map before issuing a RM Permit
 - ID all the blocks to be fumigated
 - Location of buffer zones
 - Roadways
 - Other right-of-ways
 - Sidewalks/walking paths
 - Bus stops
 - Nearby blocks (overlapping BZ)
 - Structures
 - Difficult to Evacuate Sites

FUMIGATION MAP LEGENDS

🕈 = designates that a buffer extends into an area

- Maps were better than expected
- Growers that worked with their PCA/PCB usually had acceptable maps that did not require many edits

Other paperwork

- Permission slips: Adjacent grower must state how he will keep people out of the BZ, including contractors
- Vacating Agreements: No option for returning. Date and time stated on agreement. If amended must give new date and time.
- Notification for methyl bromide
- Monitoring required for metam



Other paperwork

- Difficult to Evacuate sites emergency response: notify or monitor, details of plan
 - Responsibilities during and after the application
 - Who is the responsible person applicator/grower?
 - Are the employees trained?
 - SCBA's
 - Air measuring devices
 - Water seals

Other paperwork

- Notices of Intent
 - Documentation of map, notification, vacating agreement, and buffer zone permission
 - At least 48 hours prior to the application
 - NOIs for Saturday, Sunday and Monday applications must be submitted by 2pm on Thursday.
 - Change in the initial start date. It is the responsibility of the applicator to insure the change does not result in applications with overlapping buffer zones within 12 hours of each other.
 - For chemigations indicate which device is used to prevent backflow into groundwater.
 - fumigation@agcommissioner.com

Many permission slips were not accurately filled out and had to be returned

Go over the information with the person signing the slip, make sure it is accurate before leaving and turning in

Work with your PCA/PCB on scheduling so that you give accurate dates on your permission slips and notifications

Buffer zones

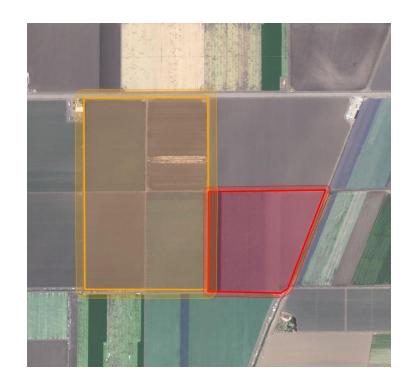
- Buffer Zones defined by the label
 - Who can go in?
 - Handlers & non-handlers
 - Transit
 - Owners vs employees
 - Labels define
 - Size Variable
 - Credits tarp type, water
 - Duration 48 hrs
 - Overlapping 12 hrs to 36 hrs



- Growers did not respect their own buffer zones
- People who signed buffer zone permission slips did not respect the buffer zones
- Trespassers did not respect the buffer zones
- Call and alert us if there is a problem
- Note problems on the PAS of the FMP

Overlapping buffer zones

- No overlapping buffer zones in first 12 hours.
- For overlapping BZ within first 36 hrs, add acreage together and apply to label tables (except 60% tarps)



- PCA/PCBs worked well together on scheduling and avoiding overlapping BZs
- A few job schedules had to be changed
- Can avoid this problem by using 60% tarps

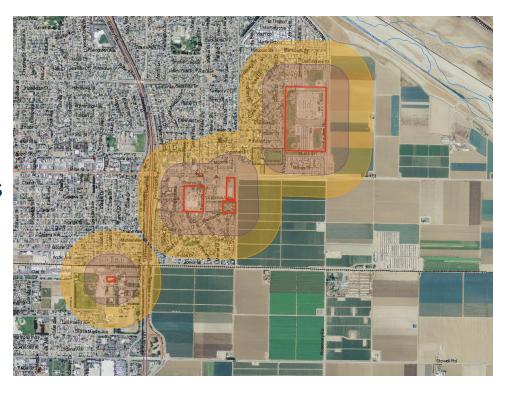
Difficult to evacuate

Buffer Zones and Difficult to Evacuate Sites (DTES)

< 300': 1/8 mile</p>

>300': ½ mile

Hospitals, nursing homes, schools, day care, prisons



- Growers, PCA/PCBs worked well with the schools to get scheduling
- Must follow special permit conditions-people are watching!
- We have a few places that can not be fumigated with the new labels, if you are not sure, check with us before leasing

Signs

- Field Posting Signs
 - Prior to application
 - Corners, entrances to field
 - Responsibility
- Buffer Zone Signs
 - Prior to application
 - Every 200'
 - Responsibility



BZ signs – Scenario 1

Orange field to be fumigated. Surrounding fields operated by adjacent property operators except red field, which has NOT been fumigated.



Signs – Scenario 2

Orange field previously fumigated and under ERP. Currently fumigating red field.



- Signs were often missing after the applicationneed to assign someone to check at least daily, more during bad weather or where there is potential for people removing signs
- Signs were not placed for maximum visibilitythink, what is the purpose of this sign?
- Signs were not removed in a timely mannercauses others to give less importance to the signs and ignore

ERP (entry restricted period)

- Do not disturb the tarp for min 5 days (7 days for 1,3-D products)
- Handling tasks are defined by when they occur. When can unrestricted entry into a field occur?

If application is	and tarp will be	then ERP will end
Untarped	N/A	5 days after application is
		complete
Tarped	Perforated and removed 5-14 days	once tarp removal is completed
	after application is complete	
	(note: remove no sooner than 2 hours	
	after perforation)	
Tarped	Perforated 5-14 days after application	48 hours after perforating tarps
	is complete, but not removed	
Tarped	Perforated and/or removed more than	5 days after application is
	14 days after application is completed	complete (because tarps are still
	_	intact)

Early removal for broadcast and bedded applications

- Growers need to know the information on the label and in the FMP-ERPs are very complicated
- Tarp activities are handling activities and employees must have proper pesticide handler training and EPA safe fumigant handling information
- Plan activities ahead-you or your neighbor can't prep for a fumigation inside the BZ or application area