



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, DC 20460

OFFICE OF CHEMICAL SAFETY  
AND POLLUTION PREVENTION

June 21, 2023

Nestor Algarin  
Regulatory Product Manager  
Syngenta Crop Protection, LLC  
P.O. Box 18300  
Greensboro, NC 27419

Subject: PRIA Label Amendment – **Mefenoxam**: Crop group conversions/revisions for Cottonseed, subgroup 20C; Leaf petiole subgroup 22B; Leafy vegetable, Crop Group 4-16 (except spinach); Vegetable, Brassica, head and stem, group 5-16; Vegetable, fruiting, group 8-10; Vegetable, legume, bean, succulent shelled, subgroup 6-22C; Vegetable, legume, pea, succulent shelled, subgroup 6-22D; Vegetable, stalk and stem, subgroup 22A; Plant back Interval – 30 days for sugarcane

Product Name: Mefenoxam 2E  
EPA Registration Number: 100-1145  
Application Dates: 11/23/2021, 11/24/2021  
Petition Numbers: 1F8970, 1F8971  
Decision Numbers: 580474, 580481, 580471, 580479

Dear Nestor Algarin:

The application referred to above, submitted under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA), as amended, is acceptable under FIFRA section 3(c)(5).

You must submit and/or cite all data required for registration/reregistration/registration review of your product when the Agency requires all registrants of similar products to submit such data.

A stamped copy of your labeling is enclosed for your records. This labeling supersedes all previously accepted labeling. You must submit one (1) copy of the final printed labeling before you release the product for shipment with the new labeling. In accordance with 40 CFR 152.130(c), you may distribute or sell this product under the previously approved labeling for 18 months from the date of this letter. After 18 months, you may only distribute or sell this product if it bears this new revised labeling or subsequently approved labeling. "To distribute or sell" is defined under FIFRA section 2(gg) and its implementing regulation at 40 CFR 152.3.

Should you wish to add/retain a reference to the company's website on your label, then please be aware that the website becomes labeling under FIFRA and is subject to review by the Agency. If the website is false or misleading, the product would be misbranded and unlawful to sell or

Page 2 of 2

EPA Reg. No. 100-1145

Decision No. 580474, 580481, 580471, 580479

distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) lists examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product's label, claims made on the website may not substantially differ from those claims approved through the registration process. Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA's Office of Enforcement and Compliance.

Your release for shipment of the product constitutes acceptance of these conditions. If these conditions are not complied with, the registration will be subject to cancellation in accordance with FIFRA section 6.

If you have any questions, please contact Stephanie Suarez at 202-566-2918 or at [Suarez.Stephanie@epa.gov](mailto:Suarez.Stephanie@epa.gov).

Sincerely,



Cynthia Giles-Parker, Chief  
Fungicide Branch  
Registration Division (7505T)

Enclosure – stamped “accepted” label

<b>MEFENOXAM</b>	<b>GROUP</b>	<b>4</b>	<b>FUNGICIDE</b>
------------------	--------------	----------	------------------

**Mefenoxam 2E**

**FUNGICIDE**

For the control of certain diseases in listed crops caused by Oomycetes

**Active Ingredient:**

Mefenoxam* .....	25.1%
Other Ingredients:	74.9%
<b>Total:</b>	<b>100.0%</b>

\*CAS No. 70630-17-0 and 69516-34-3

Contains petroleum distillate

Mefenoxam 2E is formulated as a soluble concentrate and contains 2.0 lb active ingredient per gallon.

**KEEP OUT OF REACH OF CHILDREN.**

**WARNING/AVISO**

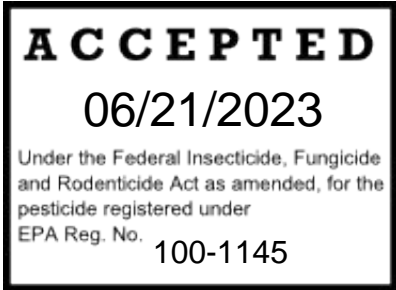
*Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle.  
(If you do not understand the label, find someone to explain it to you in detail.)*

See additional Precautionary Statements and Directions for Use inside booklet.

EPA Reg. No. 100-1145  
EPA Est.

\_\_\_\_\_  
Net Contents

[Batch Code: \_\_\_\_\_] (For nonrefillables only.)



# TABLE OF CONTENTS

## 1.0 FIRST AID

## 2.0 PRECAUTIONARY STATEMENTS

### 2.1 Hazards to Humans and Domestic Animals

### 2.2 Personal Protective Equipment (PPE)

#### 2.2.1 USER SAFETY REQUIREMENTS

#### 2.2.2 ENGINEERING CONTROLS

#### 2.2.3 USER SAFETY RECOMMENDATIONS

### 2.3 Environmental Hazards

#### 2.3.1 GROUNDWATER ADVISORY

### 2.4 Physical or Chemical Hazards

## DIRECTIONS FOR USE

## 3.0 PRODUCT INFORMATION

### 3.1 Integrated Pest Management (IPM)

### 3.2 Resistance Management

## 4.0 APPLICATION DIRECTIONS

### 4.1 Methods of Application

#### 4.1.1 BAND APPLICATION

#### 4.1.2 IN-FURROW APPLICATION

### 4.2 Application Equipment

#### 4.2.1 NOZZLES

#### 4.2.2 PUMP

### 4.3 Application Volume and Spray Coverage

### 4.4 Mixing Directions

#### 4.4.1 MEFENOXAM 2E ALONE

#### 4.4.2 TANK-MIX PRECAUTIONS

#### 4.4.3 TANK-MIX COMPATIBILITY TEST

#### 4.4.4 MEFENOXAM 2E IN TANK MIXTURES

### 4.5 Application through Irrigation Systems (Chemigation)

#### 4.5.1 CHEMIGATION RESTRICTIONS

#### 4.5.2 OPERATING INSTRUCTIONS FOR PUBLIC WATER SYSTEMS

#### 4.5.3 SPECIFIC INSTRUCTIONS FOR PUBLIC WATER SYSTEMS

#### 4.5.4 APPLICATION DIRECTIONS FOR IRRIGATION SYSTEMS

## 5.0 REPLANT AND ROTATIONAL CROP RESTRICTIONS

### 5.1 Replanting

### 5.2 Rotational Crop Restrictions

## 6.0 RESTRICTIONS AND PRECAUTIONS

### 6.1 Use Restrictions

### 6.2 Use Precautions

### 6.3 Spray Drift Management

### 6.4 Spray Drift Advisory

#### 6.4.1 IMPORTANCE OF DROPLET SIZE

- 6.4.2 CONTROLLING DROPLET SIZE – GROUND BOOM
- 6.4.3 CONTROLLING DROPLET SIZE – AIRCRAFT
- 6.4.4 BOOM HEIGHT – GROUND BOOM
- 6.4.5 RELEASE HEIGHT - AIRCRAFT
- 6.4.6 SHIELDED SPRAYERS
- 6.4.7 TEMPERATURE AND HUMIDITY
- 6.4.8 TEMPERATURE INVERSIONS
- 6.4.9 WIND

## **7.0 CROP USE DIRECTIONS**

### **7.1 Alfalfa**

### **7.2 Apple**

### **7.3 Artichoke**

### **7.4 Avocado**

### **7.5 Berry and Small Fruit**

7.5.1 BUSHBERRY, CROP SUBGROUP 13-07B

7.5.2 CANEBERRY, CROP SUBGROUP 13-07A

7.5.3 CRANBERRY

7.5.4 SMALL FRUIT VINE CLIMBING (EXCEPT GRAPE), CROP SUBGROUP 13-07E

7.5.5 STRAWBERRY

### **7.6 Brassica Head and Stem Vegetables, Crop Group 5-16**

### **7.7 Brassica Leafy Greens, Crop Subgroup 4-16B**

### **7.8 Bulb Vegetables, Crop Group 3-07**

### **7.9 Cacao**

### **7.10 Citrus Fruit, Crop Group 10**

### **7.11 Clover**

### **7.12 Cotton, Crop Subgroup 20C**

### **7.13 Cucurbit Vegetables, Crop Group 9**

### **7.14 Fruiting Vegetables, Crop Group 8-10**

### **7.15 Grapes**

### **7.16 Grass Forage, Fodder, and Hay, Crop Group 17**

### **7.17 Herbs (fresh and dried), Crop Subgroup 19A**

### **7.18 Hops**

### **7.19 Leafy Greens, Crop Subgroup 4-16A**

### **7.20 Spinach**

### **7.21 Legume Vegetables, Crop Group 6-22**

### **7.22 Succulent Shelled Beans, Crop Subgroup 6-22C**

### **7.23 Succulent Shelled Peas, Crop Subgroup 6-22D**

### **7.24 Peanut**

### **7.25 Pineapple, Crown Dip**

### **7.26 Root and Tuber Vegetables**

7.26.1 CARROT

7.26.2 GINSENG

7.26.3 POTATO

7.26.4 ROOT AND TUBER VEGETABLES, CROP GROUP 1 (EXCEPT CARROT, GINSENG, AND POTATO)

**7.27 Soybean**

**7.28 Celtnce**

**7.29 Fennel**

**7.30 Kohlrabi**

**7.31 Leaf Petiole Vegetables, Crop Subgroup 22B**

**7.32 Stalk and Stem Vegetables, Crop Subgroup 22A**

**7.33 Stone Fruits, Crop Group 12**

**7.34 Tobacco**

**7.35 Tree Nuts, Crop Group 14-12**

**7.36 Tropical and Subtropical Fruit**

**7.36.1 MEDIUM TO LARGE FRUIT, SMOOTH PEEL**

**7.36.2 MEDIUM TO LARGE FRUIT, ROUGH OR HAIRY PEEL**

**7.37 Wasabi**

**8.0 STORAGE AND DISPOSAL**

**9.0 CONDITIONS OF SALE AND LIMITATION OF WARRANTY AND LIABILITY**

**10.0 APPENDIX**

**10.1 [Optional] Mefenoxam 2E Use Summary Table**

## 1.0 FIRST AID

<b>FIRST AID</b>	
<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 lenses, 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>
<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 swallowed</b>	<ul style="list-style-type: none"> <li>• Call a poison control center or doctor immediately for treatment advice.</li> <li>• <b>DO NOT</b> give any liquid to the person.</li> <li>• <b>DO NOT</b> induce vomiting unless told to do so by the poison control center or doctor.</li> <li>• <b>DO NOT</b> give anything by mouth to an unconscious person.</li> </ul>
<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 treatment advice.</li> </ul>
<b>NOTE TO PHYSICIAN</b>	
Contains petroleum distillate – vomiting may cause aspiration pneumonia. Treat symptomatically.	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment.	
<b>HOTLINE NUMBER</b>	
For 24-Hour Medical Emergency Assistance (Human or Animal) or Chemical Emergency Assistance (Spill, Leak, Fire, or Accident) Call <b>1-800-888-8372</b>	

## 2.0 PRECAUTIONARY STATEMENTS

### 2.1 Hazards to Humans and Domestic Animals

#### WARNING/AVISO

Causes substantial but temporary eye injury. **DO NOT** get in eyes. Wear safety glasses, goggles, or a face shield. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco, or using the toilet. Harmful if swallowed or absorbed through skin. Avoid contact with skin or clothing. Remove contaminated clothing and wash before reuse.

## 2.2 Personal Protective Equipment (PPE)

### Applicators and other handlers must wear:

- Protective eyewear
- Long-sleeved shirt and long pants
- Chemical-resistant gloves made of barrier laminate, butyl rubber  $\geq$  14 mils, nitrile rubber  $\geq$  14 mils, neoprene rubber  $\geq$  14 mils, polyvinyl chloride (PVC)  $\geq$  14 mils, or Viton™  $\geq$  14 mils
- Shoes plus socks

### 2.2.1 USER SAFETY REQUIREMENTS

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. **DO NOT** reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

### 2.2.2 ENGINEERING CONTROLS

When handlers use closed systems, enclosed cabs, or aircraft in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides (40 CFR 170.240(d)(4-6)), the handler PPE requirements may be reduced or modified as specified in the WPS.

### 2.2.3 USER SAFETY RECOMMENDATIONS

#### User Safety Recommendations

##### Users should:

- Remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

## 2.3 Environmental Hazards

**DO NOT** apply directly to water, to areas where surface water is present, or to intertidal areas below the mean high-water mark. **DO NOT** contaminate water when disposing of equipment washwater or rinsate.



### 2.3.1 GROUNDWATER ADVISORY

Mefenoxam is known to leach through soil into groundwater under certain conditions as a result of label use. This chemical may leach into groundwater if used in areas where soils are permeable, particularly where the water table is shallow.

## 2.4 Physical or Chemical Hazards

**DO NOT** use or store near heat or open flame.

## **DIRECTIONS FOR USE**

It is a violation of federal law to use this product in a manner inconsistent with its labeling.

**DO NOT** apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your state or tribe, consult the agency responsible for pesticide regulation.

**FAILURE TO FOLLOW DIRECTIONS AND PRECAUTIONS ON THIS LABEL MAY RESULT IN CROP INJURY, POOR DISEASE CONTROL, OR ILLEGAL RESIDUES.**

### **AGRICULTURAL USE REQUIREMENTS**

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE), restricted-entry interval, and notification to workers (as applicable). The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard (WPS).

**DO NOT enter or allow worker entry into treated areas during the restricted-entry interval (REI) of 48 hours.**

**Exception:** If the product is soil-injected or soil-incorporated, the Worker Protection Standard, under certain circumstances, allows workers to enter the treated area immediately if there will be no contact with anything that has been treated.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, including plants, soil, or water, is:

- Protective eyewear
- Coveralls
- Chemical-resistant gloves made of barrier laminate, butyl rubber ≥ 14 mils, nitrile rubber ≥ 14 mils, neoprene rubber ≥ 14 mils, polyvinyl chloride (PVC) ≥ 14 mils, or Viton ≥ 14 mils
- Shoes plus socks

### **3.0 PRODUCT INFORMATION**

Mefenoxam 2E is a systemic fungicide for use on selected crops to control certain diseases caused by Oomycetes.

To ensure maximum activity on soilborne pathogens, Mefenoxam 2E must be moved into the seed or root zone of the plant. Placement in the seed or root zone includes in-furrow sprays, soil injections, and crown dips. Incorporation includes preplant incorporated applications, soil drenches, or shank applications.

For soil surface sprays, rainfall will move the fungicide into the seed or root zone, but if rain is not expected within 24 hours after application, mechanically incorporate (before planting) or sprinkler irrigate (after planting) with ½ to 1 inch of water.

Under conditions conducive to severe disease pressure, additional fungicide applications may be applied using an alternate fungicide registered for the crop/disease appearing on this label.

Where rate ranges are specified on this label, use the higher specified rate when heavy disease pressure is expected and the lower specified rate when disease pressure is expected to be light, unless otherwise noted.

#### **EFFICACY**

Under certain conditions conducive to extended infection periods, use another registered fungicide for additional applications if maximum amount of Mefenoxam 2E has been used. If resistant isolates to Group 4 fungicides are present, efficacy can be reduced. Under high disease pressure, use the highest specified rate and shortest specified interval when needed.

#### **CROP TOLERANCE**

Plant tolerance has been found acceptable for all crops on the label; however, not all possible tank-mix combinations have been tested under all conditions. When possible, test the combinations on a small portion of the crop to ensure a phytotoxic response will not occur as a result of application.

### 3.1 Integrated Pest Management (IPM)

Integrate Mefenoxam 2E into an overall disease and pest management strategy (IPM) whenever the use of a fungicide is required. Follow cultural practices known to reduce disease development. Consult your local agricultural authorities for additional IPM strategies established for your area.

### 3.2 Resistance Management

For resistance management, Mefenoxam 2E contains a Group 4 fungicide. Any fungal population may contain individuals naturally resistant to Mefenoxam 2E and other Group 4 fungicides. A gradual or total loss of pest control may occur over time if these fungicides are used repeatedly in the same fields. Appropriate resistance-management strategies must be followed.

To delay fungicide resistance, take one or more of the following steps:

- Rotate the use of Mefenoxam 2E or other Group 4 fungicides within a growing season sequence with different groups that control the same pathogens.
- Use tank mixtures with fungicide from a different group that are equally effective on the target pest when such use is permitted. Use at least the minimum application rate as labeled by the manufacturer.
- Adopt an integrated disease management program for fungicide use that includes scouting, uses historical information related to pesticide use and crop rotation, and which considers host plant resistance, impact of environmental conditions on disease development, disease thresholds, as well as cultural, biological and other chemical control practices.
- Where possible, make use of predictive disease models to effectively time fungicide applications. Note that using predictive models alone is not sufficient to manage resistance.
- Monitor treated fungal populations for resistance development.
- Contact your local extension specialist or certified crop advisor for any additional pesticide resistance-management and/or IPM guidance for specific crops and pathogens.
- For further information or to report suspected resistance, contact Syngenta at 1-866-Syngent(a) (866-796-4368). You can also contact your pesticide distributor or university extension specialist to report resistance.

## 4.0 APPLICATION DIRECTIONS

### 4.1 Methods of Application

Applications with Mefenoxam 2E are permitted by ground, by air, and via chemigation as specified in **Section 7.0** unless otherwise restricted in **Section 6.1**. Ground application includes broadcast sprays, soil incorporation, banded and in-furrow applications, as well as soil injections and crown dips. Incorporation includes preplant incorporated, soil drenches, and shank applications.

For band applications, refer to **Section 4.1.1** to calculate the amount of Mefenoxam 2E and water volume needed. For in-furrow applications, refer to **Section 4.1.2** for the amount of product to use with common row spacings. Refer to **Section 4.5** for details of application by chemigation.

**4.1.1 BAND APPLICATION**

Application rates in **Section 7.0** are expressed as an amount per acre which refers to the total crop area to be treated. If rates are expressed as amount per acre and banded applications are used, then the correct amount of pesticide used per acre will be proportionately less because the area to be treated is actually the area covered by the band, not the total cropland planted. Use the following formula to calculate the amount of Mefenoxam 2E needed per acre of crop when banded applications are made.

$$\frac{\text{band width in inches}}{\text{row spacing in inches}} \times \text{broadcast rate per acre} = \text{amount needed per acre of field}$$

**4.1.2 IN-FURROW APPLICATION**

The following table provides common row spacing and the amount of Mefenoxam 2E to apply per acre for applications in Cotton, Peanut, Potato, and Soybean **ONLY**.

Use Rate fl oz/1,000 row feet (oz ai/1,000 row feet)	Mefenoxam 2E								
	fl oz/A								
	20 inch rows	22 inch rows	24 inch rows	30 inch rows	32 inch rows	34 inch rows	36 inch rows	38 inch rows	40 inch rows
0.15 (0.038)	4.0	3.6	3.2	2.6	2.5	2.3	2.2	2.1	2.0
0.3 (0.075)	7.8	7.0	6.5	5.2	5.0	4.6	4.3	4.1	4.0
0.56 (0.14)	14.5	13.3	12.2	9.8	9.1	8.5	8.1	7.7	7.3

0.84 (0.21)	22.0	20.0	18.3	14.5	13.7	13.0	12.2	11.6	11.0
20" = 26,136 row ft/A, 22" = 23,760 row ft/A, 24" = 21,780 row ft/A, 30" = 17,424 row ft/A, 32" = 16,315 row ft/A, 34" = 15,374 row ft/A, 36" = 14,520 row ft/A, 38" = 13,754 row ft/A, 40" = 13,068 row ft/A									

## 4.2 Application Equipment

- Arrange spray equipment configuration to provide accurate application and minimize the potential for spray drift.
- To ensure accuracy, calibrate sprayer before each use.
- For information on spray equipment and calibration, consult spray equipment manufacturers and/or state guidance.
- All ground/aerial/chemigation application equipment must be properly maintained and calibrated using appropriate carriers.

### 4.2.1 NOZZLES

- Equip sprayers with nozzles that provide accurate and uniform application.
- Use same size nozzles and uniform spacing across the boom.
- Use screens to protect the pump and to prevent nozzles from clogging.
- Screens placed on suction side of pump must be 16-mesh or coarser.
- **DO NOT** place a screen in the recirculation line.
- Use 50-mesh or coarser screens between the pump and boom, and where required, at the nozzles.
- Check nozzle manufacturer's specifications.

### 4.2.2 PUMP

- Use a pump with capacity to:
  - Maintain 35-40 psi at nozzles.
  - Provide sufficient agitation in tank to keep mixture in suspension - this requires recirculation of 10% of tank volume per minute.
- Use a jet agitator or liquid sparger tube for agitation.
- **DO NOT** air sparge.

For more information on spray equipment and calibration, consult sprayer manufacturers and state guidance. For specific local directions and spray schedules, consult the current state agricultural guidance.

## 4.3 Application Volume and Spray Coverage

- Apply by ground or air in sufficient water or liquid fertilizer to provide uniform coverage of the soil surface.
- For maximum effectiveness, Mefenoxam 2E must be moved into the seed or root zone of the plant.
- For in-furrow application, apply as an in-furrow spray in 3-7 gallons of water per acre at planting. Mount the spray nozzle so the spray is directed into the furrow just before the seed is covered.
- For ground broadcast application, apply in a minimum of 20 gallons of water per acre, unless specified otherwise. If rain is not expected within 24 hours after application, mechanically incorporate (before planting) or sprinkler irrigate (after planting) with ½ to 1 inch of water.
- For aerial application, apply in a minimum of 3 gallons of water per acre, unless specified otherwise. Avoid application when uniform coverage cannot be obtained or when excessive spray drift may occur.

## 4.4 Mixing Directions

1. Thoroughly clean spray equipment before using this product.
2. Prepare no more spray mixture than is needed for the immediate operation.
3. Keep product container tightly closed when not in use.
4. Agitate the spray solution before and during application.
5. **DO NOT** let the spray mixture stand overnight in the spray tank.
6. Rinse the spray equipment thoroughly after each day's use and dispose of pesticide rinsate by application to an already treated area.

### 4.4.1 MEFENOXAM 2E ALONE

1. Add ¼ - ½ of the required amount of water to the spray or mixing tank.
2. With the agitator running, add Mefenoxam 2E to the tank.
3. Continue agitation while adding the remainder of the water.
4. Begin application of the spray solution after Mefenoxam 2E has completely dispersed into the mix water.
5. Maintain agitation until all of the mixture has been sprayed.

### 4.4.2 TANK-MIX PRECAUTIONS

- It is the pesticide user's responsibility to ensure that all products are registered for their intended use. Read and follow the applicable restrictions and limitations and directions for use on all product labels involved in tank mixing. Users must follow the most restrictive directions for use and precautionary statements for each product in the tank mixture.
- Tank mixes of Mefenoxam 2E with other pesticides, fertilizers, or any other additives not specifically labeled for use with Mefenoxam 2E may result in tank-mix incompatibility or unsatisfactory performance. In such cases, always check tank-mix compatibility by conducting a jar test according to guidance in **Section 4.4.3** before actual tank mixing.

### 4.4.3 TANK-MIX COMPATIBILITY TEST

- Conduct a jar test using a 1 pt to 1 qt container with lid by adding water or other intended carrier (e.g., a liquid fertilizer) to the jar.
- Next, add the appropriate amount of pesticide(s) or tank-mix partner(s) in their relative proportions based on specified label rates. Add tank-mix components separately in the order described in **Section 4.4.4**. After each addition, shake or stir gently to thoroughly mix.
- After all ingredients have been added, put the lid on the jar, tighten and invert the jar 10 times to mix.
- After mixing, let the mixture stand 15 – 30 minutes and then examine for signs of incompatibility including obvious separation, large flakes, precipitates, gels, or heavy oily film on the jar.
- If the mixture remains mixed or can be remixed readily, it is physically compatible and can be used.
- If the mixture is incompatible, repeat the test using a compatibility agent at the directed rate. Or, if applicable, slurry dry formulations in water before adding to the jar. If incompatibility is still observed after following these procedures, **DO NOT** use the mixture.
- After compatibility testing is complete, dispose of any pesticide wastes in accordance with **Section 8.0**.

### 4.4.4 MEFENOXAM 2E IN TANK MIXTURES

1. Add  $\frac{1}{4}$  -  $\frac{1}{2}$  of the required amount of water to the spray or mixing tank.
2. With the agitator running, add the tank-mix partner(s) into the tank in the following order:
  - a. wettable powders
  - b. water dispersible granular products
  - c. liquid flowables
  - d. emulsifiable concentrates
3. Allow the material to completely dissolve and disperse into the mix water.
4. Continue agitation while adding the remainder of the water and Mefenoxam 2E to the spray tank.
5. Allow Mefenoxam 2E to completely disperse.
6. Spray the mixture with the agitator running.
7. Follow the precautions and limitations of the most restricted product in the tank mixture.

## 4.5 Application through Irrigation Systems (Chemigation)

### 4.5.1 CHEMIGATION RESTRICTIONS

- Use only on crops for which chemigation is specified on this label.
- Apply Mefenoxam 2E only through center pivot, solid set, hand move, moving wheel, micro-sprinkler, micro-emitter, or drip irrigation systems. **DO NOT** apply this product through any other type of irrigation system.

- Crop injury, lack of effectiveness, or illegal pesticide residues in the crop can result from non-uniform distribution of treated water.
- If you have questions about calibration, contact your State Extension Service specialists, equipment manufacturers, or other experts.
- **DO NOT** connect an irrigation system (including greenhouse systems) used for pesticide application to a public water system unless the pesticide label-prescribed safety devices for public water systems are in place.
- A person knowledgeable of the chemigation system and responsible for its operation, or under the supervision of the responsible person, shall shut the system down and make necessary adjustments if the need arises.
- Mefenoxam 2E must be applied on the schedule specified in the specific crop use directions, not according to the irrigation schedule.

**Note:** Mefenoxam 2E can affect many seal materials and must not be used at full strength. Leather seals are best; EPDM or silicone rubber seals can be used, but must be checked and replaced once a year if needed. **DO NOT** use Viton, Buna-N, Neoprene, or PVC seals.

#### 4.5.2 OPERATING INSTRUCTIONS FOR PUBLIC WATER SYSTEMS

1. The system must contain a functional check valve, vacuum relief valve, and low pressure drain appropriately located on the irrigation pipeline to prevent water-source contamination from backflow.
2. The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.
3. The pesticide injection pipeline must also contain a functional, normally closed, solenoid-operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.
4. The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops.
5. The irrigation line or water pump must include a functional pressure switch which will stop the water pump motor when the water pressure decreases to the point where pesticide distribution is adversely affected.
6. Systems must use a metering pump, including a positive displacement injection pump (e.g., diaphragm pump), effectively designed and constructed of materials that are compatible with pesticides and capable of being fitted with a system interlock.
7. **DO NOT** apply when wind speed favors drift beyond the area intended for treatment.

#### 4.5.3 SPECIFIC INSTRUCTIONS FOR PUBLIC WATER SYSTEMS

1. Public water system means a system for the provision to the public of piped water for human consumption if such system has at least 15 service connections or regularly serves an average of at least 25 individuals daily at least 60 days out of the year.
2. Chemigation systems connected to public water systems must contain a functional, reduced-pressure zone (RPZ) backflow preventer or the functional equivalent in the water supply line upstream from the point of pesticide introduction. As an option to the



RPZ, the water from the public water system must be discharged into a reservoir tank prior to pesticide introduction. There shall be a complete physical break (air gap) between the outlet end of the fill pipe and the top or overflow rim of the reservoir tank of at least twice the inside diameter of the fill pipe.

3. The pesticide injection pipeline must contain a functional, automatic, quick-closing check valve to prevent the flow of fluid back toward the injection pump.
4. The pesticide injection pipeline must contain a functional, normally closed, solenoid-operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.
5. The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops, or, in cases where there is no water pump, when the water pressure decreases to the point where pesticide distribution is adversely affected.
6. Systems must use a metering device, including a positive displacement injection pump (e.g., diaphragm pump), effectively designed and constructed of materials that are compatible with pesticides and capable of being fitted with a system interlock.
7. **DO NOT** apply when wind speed favors drift beyond the area intended for treatment.

#### 4.5.4 APPLICATION DIRECTIONS FOR IRRIGATION SYSTEMS

- Apply Mefenoxam 2E only through center pivot, solid set, hand move, moving wheel, micro-sprinkler, micro-emitter, or drip irrigation systems. **DO NOT** apply this product through any other type of irrigation system.
- **DO NOT** inject Mefenoxam 2E at full strength or deterioration of seals may occur. Use a dilution ratio of at least 15 parts water to 1 part Mefenoxam 2E in the tank-mix.
- Thoroughly clean the chemical tank and injector system. Flush system with clean water.
- Maintain good agitation during the entire application period.
- Uniform coverage is required for good control.

## 5.0 REPLANT AND ROTATIONAL CROP RESTRICTIONS

### 5.1 Replanting

If replanting is necessary, additional applications of Mefenoxam 2E may be made, provided that the total amount of active ingredient in Mefenoxam 2E applied does not exceed the maximum allowed for the specific crop.

## 5.2 Rotational Crop Restrictions

The following crops may be planted at the specified interval following application of Mefenoxam 2E.

Crop, Crop Group, or Crop Subgroup	Replant/Plant-Back Interval
Alfalfa Apple Artichoke, globe Birdsfoot trefoil Brassica Head and Stem Vegetables, Crop Group 5-16 Brassica Leafy Greens, Crop Subgroup 4-16B Bulb Vegetables, Crop Group 3-07 Clover Corn Cotton, Crop Subgroup 20C Cucurbit Vegetables, Crop Group 9 Fruiting Vegetables, Crop Group 8-10  Grass Forage, Fodder, and Hay, Crop Group 17 Herbs (fresh and dried), Crop Subgroup 19A Hops Leafy Greens, Crop Subgroup 4-16A Legume Vegetables, Crop Group 6-22 Peanut Pineapple Root and Tuber Vegetables, Crop Group 1 Soybean Stalk, Stem, and Leaf Petiole Vegetables, Crop Subgroups 22A and 22B Strawberry Succulent Shelled Beans, Crop Subgroup 6-22C Succulent Shelled Peas, Crop Subgroup 6-22D Sunflower Tobacco Wasabi	0 days
Cereal grains (except corn)	14 days
Sugarcane	30 days
Crops <b>not intended</b> for food or feed	0 days
All other crops <b>intended</b> for food and feed	365 days

## 6.0 RESTRICTIONS AND PRECAUTIONS

See **Section 7.0** for crop-specific Restrictions and Precautions.

### 6.1 Use Restrictions

- **DO NOT** use in greenhouses or other structures including lath houses, float houses, and hydroponic facilities, unless specified on this label.
- **DO NOT** use for disease control in bedding plants, transplant trays, or nurseries except where specifically allowed in certain crop sections.
- **DO NOT** use as a foliar application unless specified on this label.

- **DO NOT** dip plants or roots, spray bare roots, or use a transplant water treatment with solutions containing Mefenoxam 2E except where specifically allowed in certain crop sections.
- Maximum usage when applying both mefenoxam- and metalaxyl-containing products to the same crop within the same season: **DO NOT** apply more than the maximum yearly total application rate for the active ingredient as stated on the label of the product containing the lowest yearly total on that crop.
- Maximum application rates included for all uses in **Section 7.0**.

## 6.2 Use Precautions

- Avoid spray overlap as crop injury may occur.

## 6.3 Spray Drift Management

- AVOIDING SPRAY DRIFT AT THE APPLICATION SITE IS THE RESPONSIBILITY OF THE APPLICATOR AND THE GROWER.
- To avoid spray drift, **DO NOT** apply when conditions favor drift beyond the target area.
- The interaction of many equipment and weather-related factors determine the potential for spray drift.

## 6.4 Spray Drift Advisory

THE APPLICATOR IS RESPONSIBLE FOR AVOIDING OFF-SITE SPRAY DRIFT. BE AWARE OF NEARBY NON-TARGET SITES AND ENVIRONMENTAL CONDITIONS.

### 6.4.1 IMPORTANCE OF DROPLET SIZE

- An effective way to reduce spray drift is to apply large droplets. Use the largest droplets that provide target pest control.
- While applying larger droplets will reduce spray drift, the potential for drift will be greater if applications are made improperly or under unfavorable environmental conditions.

### 6.4.2 CONTROLLING DROPLET SIZE – GROUND BOOM

- **Volume**-Increasing the spray volume so that larger droplets are produced will reduce spray drift. Use the highest practical spray volume for the application. If a greater spray volume is needed, consider using a nozzle with a higher flow rate.
- **Pressure**-Use the lowest spray pressure specified for the nozzle to produce the target spray volume and droplet size.
- **Spray Nozzle**-Use a spray nozzle that is designed for the intended application. Consider using nozzles designed to reduce drift.

### 6.4.3 CONTROLLING DROPLET SIZE – AIRCRAFT

- **Adjust Nozzles**-Follow nozzle manufacturer's specifications for setting up nozzles. To reduce fine droplets, nozzles must be oriented parallel with the airflow in flight.

#### 6.4.4 BOOM HEIGHT – GROUND BOOM

- Use the lowest boom height that is compatible with the spray nozzles that will provide uniform coverage. For ground equipment, the boom must remain level with the crop and have minimal bounce.

#### 6.4.5 RELEASE HEIGHT - AIRCRAFT

- Higher release heights increase the potential for spray drift. When applying aurally to crops, **DO NOT** spray at a height greater than 10 ft above the crop canopy, unless a greater application height is necessary for pilot safety.

#### 6.4.6 SHIELDED SPRAYERS

- Shielding the boom or individual nozzles can reduce spray drift. Consider using shielded sprayers.
- Verify that the shields are not interfering with the uniform deposition of the spray on the target area.

#### 6.4.7 TEMPERATURE AND HUMIDITY

- When making applications in hot and dry conditions, use larger droplets to reduce effects of evaporation.

#### 6.4.8 TEMPERATURE INVERSIONS

- Drift potential is high during a temperature inversion.
- Temperature inversions are characterized by increasing temperature with altitude and are common on nights with limited cloud cover and light to no wind.
- The presence of an inversion can be indicated by ground fog or by the movement of smoke from a ground source or an aircraft smoke generator.
- Smoke that layers and moves laterally in a concentrated cloud (under low wind conditions) indicates an inversion, while smoke that moves upward and rapidly dissipates indicates good vertical air mixing.
- Avoid applications during temperature inversions.

#### 6.4.9 WIND

- Drift potential increases with wind speed.
- **AVOID APPLICATIONS DURING GUSTY WIND CONDITIONS.**
- Applicators need to be familiar with local wind patterns and terrain that could affect spray drift.

## 7.0 CROP USE DIRECTIONS

### 7.1 Alfalfa

Crops (including all cultivars, varieties, and/or hybrids of these)			
Alfalfa Birdsfoot trefoil			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.) Root rot ( <i>Phytophthora</i> spp.)	0.50 – 1.0 (0.125- 0.25)	At planting	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil surface spray.  If alfalfa seed was previously treated with mefenoxam or metalaxyl as a seed dressing, or if an application was made while inter-seeding into existing stands for renovation, use the 0.50 pt/A (0.125 lb ai) rate.
	0.50 (0.125)	Established plantings	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil surface spray when inter-seeding into existing stands for renovation.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 1.0 pt/A (equivalent to 0.25 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 1.0 pt/A/year (equivalent to 0.25 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.25 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>DO NOT</b> feed green forage or cut hay for 60 days following application.</li> <li><b>Pre-harvest Interval (PHI):</b> 60 days</li> </ol>			

## 7.2 Apple

Crops (including all cultivars, varieties, and/or hybrids of these)												
Apple, bearing trees		Apple, non-bearing trees										
Target Disease	Rate (lb ai)	Application Timing	Use Directions									
Collar rot Crown rot Root rot ( <i>Phytophthora</i> spp.)	8.0 pt/A (2.0) or 3.0 fl oz/1000 sq ft	Apply in the early spring before growth begins (established plantings) and in the fall after harvest but before the ground freezes.	<p><b>Soil Spray (broadcast, band, or via drip/micro-sprinkler irrigation):</b> Apply to soil beneath the tree canopy or apply through irrigation water.</p> <p>The treated area is based on the area under the tree canopy or the area of the sprayed row.</p> <p>Use sufficient water volume to obtain thorough coverage of the soil.</p> <p>To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p>									
	Diluted mixture: 1.0 pt in 100 gal water (0.25)	<p>Apply in early spring before growth starts and in the fall after harvest, but before the ground freezes.</p> <p>On new plantings, delay the first application until 2 weeks after planting.</p> <p><b>NOTE:</b> Apply before symptoms appear.</p>	<p><b>Soil Drench:</b> Apply the diluted mixture around the trunk of each tree. Use the amount of diluted mixture based upon the following tree parameters:</p> <table border="1"> <thead> <tr> <th>Trunk diameter at 12 inches above the soil line</th> <th>Quantity of diluted mixture (lb ai)</th> </tr> </thead> <tbody> <tr> <td>&lt;1 inch</td> <td>1 qt (0.00063)</td> </tr> <tr> <td>1-3 inches</td> <td>3 qt (0.0019)</td> </tr> <tr> <td>4 inches</td> <td>3.5 qt (0.0022)</td> </tr> <tr> <td>5 inches</td> <td>4 qt (0.0025)</td> </tr> </tbody> </table> <p>Use Mefenoxam 2E in conjunction with good cultural practices and rootstocks that are most tolerant to disease.</p>	Trunk diameter at 12 inches above the soil line	Quantity of diluted mixture (lb ai)	<1 inch	1 qt (0.00063)	1-3 inches	3 qt (0.0019)	4 inches	3.5 qt (0.0022)	5 inches
Trunk diameter at 12 inches above the soil line	Quantity of diluted mixture (lb ai)											
<1 inch	1 qt (0.00063)											
1-3 inches	3 qt (0.0019)											
4 inches	3.5 qt (0.0022)											
5 inches	4 qt (0.0025)											
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>												
<p><b>Precaution:</b></p> <ul style="list-style-type: none"> <li>Mefenoxam 2E will not revitalize trees showing moderate to severe disease symptoms.</li> </ul>												
<b>USE RESTRICTIONS</b>												
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 8.0 pt/A (equivalent to 2.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 16.0 pt/A/year (equivalent to 4.0 lb ai/A/year mefenoxam)</li> </ol>												

- a) **DO NOT** exceed 4.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 2 applications at the maximum application rate per year.
- 6) **DO NOT** graze or feed cover crops in treated orchards.
- 7) **Pre-harvest Interval (PHI):** NA

## 7.3 Artichoke

Crops (including all cultivars, varieties, and/or hybrids of these)			
Artichoke, globe			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.) Root rot ( <i>Phytophthora</i> spp.)	2.0 – 4.0 (0.50-1.0)	At planting	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil surface spray.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 200 days</li> </ol>			

## 7.4 Avocado

Crops (including all cultivars, varieties, and/or hybrids of these)			
Avocado			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Root rot ( <i>Phytophthora</i> spp.)	Diluted mixture: 0.50 fl oz in 18 gal water	At transplanting	<b>Sleeve Drench:</b> Drench the roots inside the sleeve with 1 qt of the diluted mixture per tree.  Sleeve drench does not replace other soil applications for long-term control of root rot.
	2.0 – 8.0 pt/A (0.5-2.0)  or  1.0 – 2.0 fl oz/1000 gal water (3.9-7.8 ppm)	Start of the growing season at transplanting or when soil tests detect the presence of <i>Phytophthora</i> .  Two additional applications may be made at 3-month intervals.	<b>Irrigation:</b> Apply via the irrigation system (drip, micro-emitter, or sprinkler).  Use 2.0 pt/A if the trees have a canopy diameter of 2 ft. Increase the rate as the canopy diameter increases. For canopy diameters of 15 ft or more, use the 8.0 pt/A rate.  <b>Soil Spray:</b> Apply to the soil directly under/over the drip emitter. Use irrigation to incorporate the material into the soil. If there is more than one emitter, distribute the amount of Mefenoxam 2E among the emitters.  For new plantings, use <i>Phytophthora</i> -resistant rootstocks.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Mature trees in moderate to advanced stage of decline cannot be cured with Mefenoxam 2E.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 8.0 pt/A (equivalent to 2.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 24.0 pt/A/year (equivalent to 6.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 6.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 3 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 28 days</li> </ol>			



## 7.5 Berry and Small Fruit

### 7.5.1 BUSHBERRY, CROP SUBGROUP 13-07B

Crops (including all cultivars, varieties, and/or hybrids of these)			
Aronia berry	Elderberry	Jostaberry	
Blueberry, highbush	European barberry	Juneberry (Saskatoon Berry)	
Blueberry, lowbush	Gooseberry	Lingonberry	
Buffalo currant	Highbush cranberry	Native currant	
Chilean guava	Honeysuckle, edible	Salal	
Currant, black	Huckleberry	Sea buckthorn	
Currant, red			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Root rot ( <i>Phytophthora</i> spp.)	7.2 (1.8)	<b>New Plantings:</b> Apply at time of planting.	<b>Soil Application (broadcast, band, or via drip/micro-sprinkler irrigation):</b> Make one application at planting and reapply once during a period favorable for root rot.  For band applications, use an 18-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
		<b>Established Plantings:</b> Apply before the plants start to grow in the spring.  One additional application may be made to coincide with the period most favorable for root rot development.	Make a soil-directed application towards the base of the plant in a 3-ft band over the row or via the drip irrigation.  To calculate the rate as a band application, see <b>Section 4.1.1</b> .  Use Mefenoxam 2E in conjunction with good cultural practices to minimize disease.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Mefenoxam 2E will not revitalize plants showing moderate to severe root rot symptoms.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 7.2 pt/A (equivalent to 1.8 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 14.4 pt/A/year (equivalent to 3.6 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 3.6 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 2 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 0 days</li> </ol>			

## 7.5.2 CANEBERRY, CROP SUBGROUP 13-07A

Crops (including all cultivars, varieties, and/or hybrids of these)			
Blackberry Loganberry		Raspberry, black Raspberry, red	Raspberry, wild
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Root rot ( <i>Phytophthora</i> spp.)	7.2 (1.8)	<b>New Plantings:</b> Apply at time of planting.	<b>Soil Application (broadcast, band, or via drip/micro-sprinkler irrigation):</b> Make one application at planting and reapply once during a period favorable for root rot.  For band applications, use an 18-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
		<b>Established plantings:</b> Apply before the plants start to grow in the spring.  One additional application may be made to coincide with the period most favorable for root rot development.	Make a soil-directed application towards the base of the plant in a 3-ft band over the row or via the drip irrigation.  To calculate the rate as a band application, see <b>Section 4.1.1</b> .  Use Mefenoxam 2E in conjunction with good cultural practices to minimize disease.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Mefenoxam 2E will not revitalize plants showing moderate to severe root rot symptoms.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 7.2 pt/A (equivalent to 1.8 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 14.4 pt/A/year (equivalent to 3.6 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 3.6 lb ai/A/year of soil-applied and 0.2 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> use an adjuvant.</li> <li><b>DO NOT</b> make more than 2 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 45 days</li> </ol>			

## 7.5.3 CRANBERRY

Crops (including all cultivars, varieties, and/or hybrids of these)			
Cranberry			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Root rot ( <i>Phytophthora</i> spp.)	2.0 – 3.5 (0.5-0.875)	Make 3 applications: Make the first application in the fall after harvest, the second application in the spring, and the final application up to, but no later than, 45 days before harvest.	<b>Soil Spray (broadcast):</b> Apply as a soil spray by ground or via chemigation ( <b>Section 4.5</b> ) equipment.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 3.5 pt/A (equivalent to 0.875 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 10.5 pt/A/year (equivalent to 2.625 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 2.625 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 3 applications at the maximum application rate per year.</li> <li><b>DO NOT</b> apply by air.</li> <li><b>Pre-harvest Interval (PHI):</b> 45 days</li> </ol>			

## 7.5.4 SMALL FRUIT VINE CLIMBING (EXCEPT GRAPE), CROP SUBGROUP 13-07E

Crops (including all cultivars, varieties, and/or hybrids of these)			
Amur river grape Gooseberry Kiwifruit, fuzzy		Kiwifruit, hardy Maypop Schisandra berry	
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Root and Crown rot ( <i>Pythium</i> and <i>Phytophthora</i> spp.)	11.2 – 22.4 fl oz/40 gal water  (0.175-0.35)	Make the first application in the fall after harvest or in February or early March.  Make a second application in the spring or approximately 60 days after the February or March application.	<b>Soil Drench:</b> Apply 1.0 qt of Mefenoxam 2E solution as a soil drench in a one square foot area around the base of each vine.  At the labeled rate of 11.2-22.4 fl oz/40 gallons of water, this will apply 0.175-0.350 lb ai/A if the planting density is 160 vines per acre.
	22.4 fl oz/A  (0.35)	Make the first application in April and follow with two additional applications on 30-day intervals. Make the fourth application in September and the final application approximately 30 days later, which must be at least 7 days before harvest.	<b>Banded Soil Application:</b> Make up to five applications as a spray toward the soil in a 2- to 3-ft band on each side of the row.  To calculate the rate as a band application, see <b>Section 4.1.1</b> .
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 22.4 fl oz/A (equivalent to 0.35 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 30 days</li> <li><b>Maximum Annual Application Rate:</b> 7.0 pt/A/year (equivalent to 1.75 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.75 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 5 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 7 days</li> </ol>			

## 7.5.5 STRAWBERRY

Crops (including all cultivars, varieties, and/or hybrids of these)			
Strawberry Strawberry, field nursery			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Leather rot ( <i>Phytophthora cactorum</i> ) Red stele ( <i>Phytophthora fragariae</i> ) Vascular collapse ( <i>Phytophthora cactorum</i> )	2.0 (0.5)	<p><b>Annual plantings:</b> Apply up to 3 times per crop. Make the first application after transplanting. Make the second application 30 days before the beginning of harvest or at fruit set. Make the third application during harvest, depending on disease pressure and environmental conditions.</p>	<p><b>For ANNUAL AND ESTABLISHED PLANTINGS only</b></p> <p><b>Soil Application:</b> Ground (banded), drip, or overhead chemigation (<b>Section 4.5</b>).</p> <p>When applying through drip irrigation, calculate the rate as a band application (<b>Section 4.1.1</b>) with a band width equal to the root zone width. Inject Mefenoxam 2E into the irrigation water.</p>
		<p><b>Established plantings:</b> Apply up to 3 times per crop. Make the first application in the spring after the ground thaws and before first bloom. Make the second application after harvest in the fall. <i>For control of leather rot</i>, make an additional application during the growing season at fruit set.</p>	<p>Mefenoxam 2E may be applied the day of harvest.</p>
		<p>Apply to young plants in field nurseries.</p>	<p><b>For FIELD NURSERY application only</b></p> <p><b>Soil Application:</b> Ground (banded), drip, or overhead chemigation (<b>Section 4.5</b>).</p> <p>When applying through drip irrigation, calculate the rate as a band application (<b>Section 4.1.1</b>) with a band width equal to the root zone width. Inject Mefenoxam 2E into the irrigation water.</p>
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			





			<p><b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water at the labeled rates.</p>
Damping off ( <i>Pythium</i> spp.)	0.50 – 1.0 pt/A (0.125-0.25)	Preplant incorporated	<p><b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.</p> <p>For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p>
Downy mildew ( <i>Peronospora parasitica</i> )	0.25 – 0.50 pt/A (0.063-0.125)	Apply when conditions are favorable for disease but before infection on a 14-day schedule.	<p><b>Foliar Application:</b> Apply as a foliar spray by ground or air.</p> <p>Mefenoxam 2E must be used in a tank-mix with other fungicides registered for control of downy mildew. Apply with the full label rate of the tank-mix partner fungicide.</p> <p><b>NOTE:</b> Foliar applications to turnip plants may not be made to dual purpose turnip cultivars or varieties which produce a harvestable root.</p>
Arugula and Cress <b>ONLY</b> Damping off ( <i>Pythium</i> spp.)	2.0 – 4.0 pt/A (0.50-1.0)	Preplant incorporated  At planting	<p><b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.</p> <p><b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.</p> <p>For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p> <p><b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water at the labeled rates.</p>



	Transplant water:  0.50-1.0 pt /100–200 gal water/A  (0.125-0.25)	At transplant or immediately following planting.	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.
--	---	--	---

\*Not for use in California.

**Resistance Management:**

- Refer to **Section 3.2**.

**Precautions:**

- There is a risk of plant injury with transplant water application:
  - Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.
  - Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:**
  - a) **Soil:** 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)
  - b) **Foliar:** 0.50 pt/A (equivalent to 0.125 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:**
  - a) **Soil:** NA
  - b) **Foliar:** 14 days
- 4) **Maximum Annual Application Rate:** **Soil:** 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam)  
**Foliar:** 2.0 pt/A/year (equivalent to 0.5 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 1.0 lb ai/A/year of soil-applied and 0.50 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 1 soil-applied application and 4 foliar-applied applications at the maximum application rate per year.
- 6) **DO NOT** apply foliar sprays of Mefenoxam 2E without a labeled tank-mix partner for downy mildew.
- 7) **DO NOT** apply Mefenoxam 2E mixture in fields where downy mildew is already established.
- 8) **DO NOT** apply to dual purpose turnip cultivars or varieties which produce a harvestable root.
- 9) **Pre-harvest Interval (PHI):** 7 days

## 7.8 Bulb Vegetables, Crop Group 3-07

Crops (including all cultivars, varieties, and/or hybrids of these)			
<u>Onion, Bulb</u>		<u>Onion, Green</u>	
Daylily, bulb	Lily, bulb	Chive, fresh leaves	Onion, Beltsville bunching
Fritillaria, bulb	Onion, bulb	Chive, Chinese, fresh leaves	Onion, fresh
Garlic, bulb	Onion, Chinese, bulb	Elegans hosta	Onion, green
Garlic, great-headed, bulb	Onion, pearl	Fritillaria, leaves	Onion, macrostem
Garlic, serpent, bulb	Onion, potato, bulb	Kurrat	Onion, tree, tops
	Shallot, bulb	Lady's leek	Onion, Welsh, tops
		Leek	Shallots, fresh leaves
		Leek, wild	
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	1.0-2.0 (0.25-0.5)	Preplant incorporated  At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li>For onions (bulb): <b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied and 0.5 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> <li>For onions (green): <b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied and 0.3 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 2 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.9 Cacao

Crops (Including all cultivars, varieties, and/or hybrids of these)			
Cacao			
Target Disease	Rate fl oz/A (lb ai)	Application Timing	Use Directions
Black pod rot ( <i>Phytophthora</i> spp.)	0.64  (0.01)	Make the first application prior to disease development, and additional applications on a 21-day schedule.	<b>Foliar/Pod Spray:</b> Apply in mixture with a copper fungicide.  Apply in sufficient volume of water to ensure complete coverage of the canopy and developing pods.
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Make no more than two consecutive applications of Mefenoxam 2E or other Group 4 fungicides before alternating with a fungicide that is not in Group 4.</li> </ul>			
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 0.64 fl oz/A (equivalent to 0.01 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 21 days</li> <li><b>Maximum Annual Application Rate:</b> 2.56 fl oz/A/year (equivalent to 0.04 lb ai/A/year mefenoxam)               <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.04 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 4 applications at the maximum application rate per year.</li> <li><b>Pre-Harvest Interval (PHI):</b> 30 days</li> </ol>			

## 7.10 Citrus Fruit, Crop Group 10

Crops (including all cultivars, varieties, and/or hybrids of these)			
Calamondin	Grapefruit	Orange, sour	
Citrus citron	Kumquat	Orange, sweet	
Citrus hybrids	Lemon	Pummelo	
chironja	Lime	Satsuma mandarin	
tangelo	Mandarin (tangerine)		
tangor			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Brown rot Citrus foot rot Gummosis Root rot Trunk canker ( <i>Phytophthora</i> spp.)	Broadcast 4.0 pt/A (1.0)  Irrigation 1.0 pt/grove acre (0.25)	<b>Citrus Resets or New Plantings:</b> Make the first application after planting. Make two or three applications per year (spring + summer, summer + fall, or spring + summer + fall).	<b>Spray Boom:</b> Apply to soil beneath the tree canopy. If rain is not expected within 24 hours after application, sprinkler irrigate with ½ to 1 inch of water to move product into root zone.  <b>Irrigation:</b> Mefenoxam 2E can be applied through irrigation water (micro-sprinkler or drip).
<b>NOTE:</b> for best <i>Phytophthora</i> control, use a combination of cultural practices, fungicides with	<b>California only:</b> Broadcast 4.0 – 8.0 pt/A		

different modes of action, and resistant varieties.	(1.0-2.0) Irrigation 1.0 – 2.0 pt/grove acre (0.25-0.50)		
	Water Ring Drench 2.0 – 3.0 fl oz/100 gal water (0.03-0.05)		<b>Water Ring Drench:</b> Apply 5 gallons of the mix around the base of each tree within the watering ring of resets or new plantings.
Newly planted to 6 months: 1.0 fl oz/20 trees (0.016)	<b>Individual Tree Treatment for Resets/New Plantings:</b> Newly planted to 6 months		Mix desired amount of Mefenoxam 2E in a water solution. Apply as a directed spray to individual trees (8-12 fl oz solution/tree) around the base of the tree and outwards to cover the fibrous root system.  Follow with sprinkler irrigation to move product into the root zone.
Trees >6months: 2.0-3.0 fl oz/20 trees (0.03-0.05)	Trees >6 months		May be tank mixed with other approved pesticides.
Broadcast 2.0 – 4.0 pt/A (0.5-1.0)	<b>Established Plantings:</b> Begin applications during the spring root flush period.		<b>Spray Boom:</b> Apply to soil beneath the tree canopy. If rain is not expected within 24 hours after application, sprinkler irrigate with ½ to 1 inch of water to move product into root zone.
Irrigation 1.0 – 2.0 pt/grove acre (0.25-0.50)	One or two additional applications may be made to coincide with flushes of root growth.		<b>Irrigation:</b> Mefenoxam 2E can be applied through irrigation water (micro-sprinkler or drip).
<b>California only:</b> Broadcast 2.0 – 12.0 pt/A (0.5-3.0)	Time the applications as in the <b>Citrus Resets or New Plantings</b> section above.		Consult local extension bulletins for additional use directions.
4 pt in 3 gal water (1.0)	<b>Trunk Spray for Gummosis:</b> Apply up to 3 times per year.		Spray the trunks to thoroughly wet the cankers.
<b>Florida only:</b> 4 pt in 10 gal water (1.0)			

**Resistance Management:**

- Refer to **Section 3.2.**

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 12.0 pt/A (equivalent to 3.0 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 90 days
- 4) **Maximum Annual Application Rate:** 24.0 pt/A/year (equivalent to 6.0 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 6.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 3 applications at the maximum application rate per year.
- 6) **DO NOT** apply to bare roots.
- 7) **DO NOT** apply to citrus in field or greenhouse nurseries.
- 8) **DO NOT** make trunk gummosis sprays and soil applications to the same tree in the same cropping season.
- 9) **DO NOT** apply rates higher than 4.0 pt/A (1.0 lb ai) to citrus resets or new plantings (less than 5 years old) in FL, PR, or TX to prevent potential phytotoxicity.
- 10) **DO NOT** use on the highly *Phytophthora* susceptible sweet orange rootstock in FL.
- 11) **DO NOT** apply tank mixes of Mefenoxam 2E and pre-emergent herbicides to trees less than 3 years old. Apply the herbicide first; then wait 3-4 weeks to apply Mefenoxam 2E.
- 12) **Pre-harvest Interval (PHI):** 0 days

## 7.11 Clover

Crops (including all cultivars, varieties, and/or hybrids of these)			
Clover			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.) Root rot ( <i>Phytophthora</i> spp.)	0.5-1.0 (0.125-0.25)	At planting	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil surface spray.  If the clover seed was previously treated with mefenoxam or metalaxyl as a seed dressing, use the 0.5 pt/A (0.125 lb ai) rate.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>• Refer to <b>Section 3.2.</b></li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>1) Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li>2) <b>Maximum Single Application Rate:</b> 1.0 pt/A (equivalent to 0.25 lb ai/A mefenoxam)</li> <li>3) <b>Minimum Application Interval:</b> NA</li> <li>4) <b>Maximum Annual Application Rate:</b> 1.0 pt/A/year (equivalent to 0.25 lb ai/A/year mefenoxam)           <ol style="list-style-type: none"> <li>a) <b>DO NOT</b> exceed 0.25 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li>5) <b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li>6) <b>DO NOT</b> feed or cut hay for 90 days following application.</li> <li>7) <b>Pre-harvest Interval (PHI):</b> 90 days</li> </ol>			

## 7.12 Cotton, Crop Subgroup 20C

Crops (including all cultivars, varieties, and/or hybrids of these)			
Cotton			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Root rot ( <i>Phytophthora</i> spp.) Seed rot ( <i>Pythium ultimum</i> ) Seedling blight ( <i>Pythium aphanidermatum</i> )	0.15-0.30 fl oz/1000 row ft (0.03-0.063)  Equivalent to 2.2 – 4.4 fl oz/A for 38-inch rowspacing	At planting	Apply as an in-furrow spray in water or liquid fertilizer. Direct the spray into the furrow over the seed just before the seeds are covered.  To calculate the rate as an in-furrow application, see <b>Section 4.1.2.</b>
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 0.30 fl oz/1000 row ft (equivalent to 0.063 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 0.30 fl oz/1000 row ft/year (equivalent to 0.063 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.125 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.13 Cucurbit Vegetables, Crop Group 9

Crops (including all cultivars, varieties, and/or hybrids of these)			
Chayote (fruit)	<b>Muskmelon</b>	Pumpkin	
Chinese waxgourd (Chinese preserving melon)	Cantaloupe	<b>Squash, summer</b>	
Citron melon	Casaba	Crookneck squash	
Cucumber	Crenshaw melon	Scallop squash	
Gherkin	Golden pershaw melon	Straightneck squash	
<b>Gourd, edible</b>	Honeydew melon	Vegetable marrow	
Hyotan	Honey balls	Zucchini	
Cucuzza	Mango melon	<b>Squash, winter</b>	
Hechima	Persian melon	Acorn squash	
Chinese okra	Pineapple melon	Butternut squash	
<b>Momordica spp.</b>	Santa Claus melon	Calabaza	
Balsam apple	Snake melon	Hubbard squash	
Balsam pear	True cantaloupe	Spaghetti squash	
Bitter melon		Watermelon	
Chinese cucumber			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Damping off/Root rot ( <i>Pythium</i> spp.)  <b>Suppression:</b> Phytophthora blight ( <i>Phytophthora capsici</i> )	2.0 – 4.0 pt/A (0.5-1.0)	Preplant incorporated          At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .  <b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water at the labeled rates.
	0.50 – 0.8 pt/A (0.125-0.20)	<b>Subsequent applications:</b> If soil applications were made at planting, two additional applications may be made at 20- to 30-day intervals.	<b>Soil Spray (directed):</b> Direct the spray to the base of the plants and cover 6-8 inches of the soil on either side of the plants.  Incorporate mechanically or sprinkler-irrigate to move Mefenoxam 2E into the root zone.

			<b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water at the labeled rates.
<b>Suppression:</b> Phytophthora blight ( <i>Phytophthora capsici</i> )	Transplant water:  0.50-1.0 pt/100 – 200 gal water/A  (0.125-0.25)	At transplant  In fields with a history of <i>Phytophthora capsici</i> blight, make a follow-up drip application of Mefenoxam 2E 14-21 days after transplanting.	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
<b>Precautions:</b>			
<ul style="list-style-type: none"> <li>There is a risk of plant injury with transplant water application. <ul style="list-style-type: none"> <li>Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.</li> <li>Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.</li> </ul> </li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 20 days <b>unless</b> following transplant water application: 14 days</li> <li><b>Maximum Annual Application Rate: Soil:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <b>Foliar:</b> 1.6 pt/A/year (equivalent to 0.4 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied and 0.5 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 2 soil-directed (foliar) applications at the maximum application rate per year <b>OR</b> 1 soil-applied application and 3 soil-directed (foliar) applications at the minimum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 5 days</li> </ol>			



## 7.14 Fruiting Vegetables, Crop Group 8-10

Crops (including all cultivars, varieties, and/or hybrids of these)			
African eggplant	Goji berry	Nonbell pepper	
Bush tomato	Groundcherry	Roselle	
Bell pepper	Martynia	Scarlet eggplant	
Cocona	Naranjilla	Sunberry	
Currant tomato	Okra	Tomatillo	
Eggplant	Pea eggplant	Tomato	
Garden huckleberry	Pepino	Tree tomato	
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Damping off <i>(Pythium spp.)</i>  <b>Suppression:</b> Crown rot <i>(Phytophthora capsici)</i>	2.0 pt/A (0.5)	Preplant or at planting  For <b>direct seeded peppers</b> , apply preplant or prior to emergence.	<b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer preplant or at planting.  For banded applications, use a 12- to 16-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .  <b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water.
		<b>Post Planting:</b> Make 2 post-directed applications at 30-day intervals following planting.  For <b>crown rot</b> , apply before the plants are infected to obtain satisfactory control.	<b>Soil Spray (band):</b> Direct the spray to the base of the plants and cover 6-8 inches of the soil on either side of the plants.  Incorporate mechanically or sprinkler-irrigate to move Mefenoxam 2E into the root zone.  <b>Shank Application:</b> Apply in liquid fertilizer, shanked in as a banded treatment to either side of the plant.  <b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water.
<b>Suppression:</b> Crown rot <i>(Phytophthora capsici)</i>	Transplant water:  0.50 – 1.0 pt /100 – 200 gal water/A	In transplant water or immediately following planting.	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.

	(0.125-0.25)	14-21 days after transplanting in fields with a history of <i>Phytophthora capsici</i> blight.	In fields with a history of <i>Phytophthora capsici</i> blight, make the follow up application by drip irrigation.
<b>TOMATO ONLY</b> Damping off ( <i>Pythium</i> spp.)  Fruit rot ( <i>Phytophthora</i> spp.)	2.0 – 4.0 pt/A (0.5-1.0)	At planting	<b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
Root rot ( <i>Pythium</i> spp.)	2.0 pt/A (0.5)	<b>Subsequent applications:</b> Following soil application at planting, make up to two applications 4-6 weeks apart.	<b>Soil Spray (broadcast or band) or Injection (drip irrigation):</b> Apply as a directed soil surface spray under the vines or injected into the beds with water or liquid fertilizer.  Make subsequent applications by drip irrigation according to the application timing schedule.  For injected applications, base rate calculations on a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .

**Resistance Management:**

- Refer to **Section 3.2**.

**Precautions:**

- Plants already infected with *Phytophthora capsici* cannot be cured with Mefenoxam 2E.
- The foliar blight phase of *Phytophthora* cannot be cured with Mefenoxam 2E.
- Application of Mefenoxam 2E may cause some yellowing of pepper leaves.
- There is a risk of plant injury with transplant water application:
  - Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.
  - Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam) **except for Tomato:** 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 30 days **unless** following transplant water application, then 14 days; **except for Tomato:** 28 days
- 4) **Maximum Annual Application Rate:** 6.0 pt/A/year (equivalent to 1.5 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 1.5 lb ai/A/year of soil-applied and 0.5 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 3 applications at the maximum application rate per year **except for Tomato: DO NOT** make more than 2 applications at the maximum application rate per year **OR** 3 applications at the minimum application rate per year.
- 6) **Pre-harvest Interval (PHI):** 7 days

## 7.15 Grapes

Crops (including all cultivars, varieties, and/or hybrids of these)			
Grapes			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Crown rot Root rot ( <i>Phytophthora</i> spp.)	7.2 pt/A (1.8)	Apply in the spring before plants start growing.  Two additional applications may be made to coincide with periods most favorable for root rot development.	<b>Soil Spray (broadcast, band, or drip):</b> Apply using sufficient water to provide uniform coverage.  For banded applications, use a 3-ft band at the base of the plants.  Calculate the correct amount based on 7.2 pt/A using the instructions in <b>Section 4.1.1</b> .
	<b>Drip Irrigation:</b> 1.0 – 2.0 fl oz/1000 gal water  or  0.5 pt/1000 linear feet of row	For <b>drip irrigation</b> , apply at the beginning of the growing season (bud break) or at transplanting.  Two additional drip irrigation applications may be made at 3-month intervals.  Applications are not needed during the winter dormancy period.	<b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 7.2 pt/A (equivalent to 1.8 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 90 days</li> <li><b>Maximum Annual Application Rate:</b> 21.6 pt/A/year (equivalent to 5.4 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 5.4 lb ai/A/year of soil-applied and 0.4 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 3 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 60 days</li> </ol>			

## 7.16 Grass Forage, Fodder, and Hay, Crop Group 17

Crops (including all cultivars, varieties, and/or hybrids of these)			
<i>Forage, fodder, stover, and hay of any grass, Gramineae/Poaceae family (either green or cured) except for sugarcane and those included in the cereal grains group, including:</i>			
Bermudagrass		Bluegrass	Reed Canarygrass
Bromegrass		Orchardgrass	Timothy
Fescue		Sudangrass	Ryegrass
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Seedling diseases ( <i>Pythium</i> spp.)	0.50 – 2.0 (0.125- 0.5)	At planting	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil surface spray.  If the grass seed was previously treated with mefenoxam or metalaxyl as a seed dressing, use the 0.50-1.0 pt/A (0.125-0.25 lb ai) rate.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 2.0 pt/A/year (equivalent to 0.5 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.50 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>DO NOT</b> apply to range grasses.</li> <li><b>DO NOT</b> graze, feed green forage, or cut hay for 60 days following application.</li> <li><b>Pre-harvest Interval (PHI):</b> 60 days</li> </ol>			

## 7.17 Herbs (fresh and dried), Crop Subgroup 19A

Crops (including all cultivars, varieties, and/or hybrids of these)			
Angelica, balm	Curry (leaf)	Rosemary	
Basil	Dillweed	Rue	
Borage	Horehound	Sage	
Burnet	Hyssop	Savory, summer and winter	
Chamomile	Lavender	Sweet bay	
Catnip	Lemongrass	Tansy	
Chervil (dried)	Lovage (leaf)	Tarragon	
Chive	Marigold	Thyme	
Chive, Chinese	Marjoram	Wintergreen	
Clary	Nasturtium	Woodruff	
Coriander (leaf)	Parsley (dried)	Wormwood	
Costmary	Pennyroyal		
Culantro (leaf)			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	2.0 – 4.0 (0.5-1.0)	Preplant incorporated	<p><b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.</p> <p><b>Soil Spray (broadcast or band):</b> Apply in sufficient water to provide uniform coverage.</p> <p>For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p>
		Subsequent applications or established plantings	<p><b>Soil Spray (band):</b> Apply as a soil-directed spray 28 days after planting or after the first cutting. Direct the spray toward the base of the plants and cover 6-8 inches on each side of the plants (12- to 16-inch band width/row).</p> <p>To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p>
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 28 days</li> <li><b>Maximum Annual Application Rate:</b> 8.0 pt/A/year (equivalent to 2.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 2.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 2 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 21 days</li> </ol>			

## 7.18 Hops

Crops (including all cultivars, varieties, and/or hybrids of these)			
Hops			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Downy mildew ( <i>Pseudoperonospora humuli</i> )	1.0 (0.25)	<p><b>Soil Application:</b> Apply after pruning but before training when shoots are 6 inches or less.</p> <p><b>Foliar Application:</b> At the first sign of a secondary infection (primary infection persists after the soil drench and/or there is evidence of foliar infection).</p> <p>Make up to two applications at least 14 days apart.</p>	<p><b>Soil Application (drench or via drip/micro-sprinkler irrigation):</b> Apply as a drench in water or liquid fertilizer to the soil over the crowns.</p> <p><b>Foliar Application:</b> Apply by ground with a minimum of 50 gallons of water per acre.</p> <p>Mefenoxam 2E must be tank mixed with another fungicide (for example, a copper fungicide) labeled for downy mildew that has a different mode of action.</p>
<b>Resistance Management:</b> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 1.0 pt/A (equivalent to 0.25 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> <ol style="list-style-type: none"> <li><b>Soil:</b> NA</li> <li><b>Foliar:</b> 14 days</li> </ol> </li> <li><b>Maximum Annual Application Rate: Soil:</b> 1.0 pt/A/year (equivalent to 0.25 lb ai/A/year mefenoxam) <b>Foliar:</b> 2.0 pt/A/year (equivalent to 0.5 lb ai/A/year mefenoxam)           <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.25 lb ai/A/year of soil-applied and 0.5 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 2 foliar-applied applications at the maximum application rate per year.</li> <li><b>DO NOT</b> apply foliar sprays of Mefenoxam 2E without a labeled tank-mix partner for downy mildew.</li> <li><b>Pre-harvest Interval (PHI):</b> 45 days</li> </ol>			

## 7.19 Leafy Greens, Crop Subgroup 4-16A

Crops (including all cultivars, varieties, and/or hybrids of these)			
See Section 7.20 for separate Spinach directions.			
Amaranth, Chinese	Dandelion, leaves	Lettuce, bitter	
Amaranth, leafy	Dang-gwi, leaves	Lettuce, head	
Aster, Indian	Dillweed	Lettuce, leaf	
Blackjack	Dock	Orach	
Cat's whiskers	Dol-nam-mul	Parsley, fresh leaves	
Cham-chwi	Ebolo	Plantain, buckhorn	
Cham-na-mul	Endive	Primrose, English	
Chervil, fresh leaves	Escarole	Purslane, garden	
Chipilin	Fameflower	Purslane, winter	
Chrysanthemum, garland	Feather cockscomb	Radicchio	
Cilantro, fresh leaves	Good King Henry	Swiss chard	
Corn salad	Huauzontle	Violet, Chinese, leaves	
Cosmos	Jute, leaves		
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	2.0 – 4.0 pt/A (0.5-1.0)	Preplant incorporated  At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .  Make no more than one soil application.
	Transplant water:  0.50 – 1.0 pt/100-200 gal water/A (0.125-0.25)	At transplant or immediately following planting.	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.
<b>LETTUCE, HEAD AND LEAF ONLY</b> Downy mildew ( <i>Bremia lactucae</i> )	0.25 – 0.5 pt/A (0.063-0.125)	Apply when conditions are favorable for disease but before infection on a 14-day schedule.	<b>Foliar Spray (ground or air):</b> Mefenoxam 2E must be used in a tank-mix with other fungicides registered for control of downy mildew.

			Apply with the full label rate of the tank-mix partner fungicide.
<b>Resistance Management:</b> <ul style="list-style-type: none"> <li>• Refer to <b>Section 3.2.</b></li> </ul>			
<b>Precautions:</b> <ul style="list-style-type: none"> <li>• There is a risk of plant injury with transplant water application: <ul style="list-style-type: none"> <li>○ Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.</li> <li>○ Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.</li> </ul> </li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>1) Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li>2) <b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li>3) <b>Minimum Application Interval:</b> <ol style="list-style-type: none"> <li>a) <b>Soil:</b> NA</li> <li>b) <b>Foliar (Lettuce only):</b> 14 days</li> </ol> </li> <li>4) <b>Maximum Annual Application Rate: Soil:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam)  <b>Foliar (Lettuce only):</b> 1.6 pt/A/year (equivalent to 0.4 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li>a) <b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> <li>b) <b>For lettuce only, DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied and 0.4 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li>5) <b>DO NOT</b> make more than 1 soil application per crop year.</li> <li>6) <b>DO NOT</b> apply foliar sprays of Mefenoxam 2E without a labeled tank-mix partner.</li> <li>7) <b>DO NOT</b> apply the Mefenoxam 2E mixture in fields where downy mildew is already established.</li> <li>8) For lettuce only, <b>DO NOT</b> make more than 4 foliar applications per crop.</li> <li>9) <b>Pre-harvest Interval (PHI):</b> 7 days</li> </ol>			





### USE RESTRICTIONS

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 21 days
- 4) **Maximum Annual Application Rate:** 5.6 pt/A/year (equivalent to 1.4 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 1.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products at planting followed by **either**:
    - i. **No more than** 0.25 lb ai/A/year of post-planting shanked-in applications of mefenoxam- and metalaxyl-containing products **or**
    - ii. **No more than** 0.4 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products
- 5) **DO NOT** apply the Mefenoxam 2E mixture in fields where downy mildew is already established.
- 6) **DO NOT** make more than 1 soil application and 2 shank applications per crop year.
- 7) **Pre-harvest Interval (PHI):** 3 days **only if** soil application does not exceed 1.0 lb ai/A/year and foliar application does not exceed 0.25 lb ai/A/year of mefenoxam- and metalaxyl-containing products. **Otherwise**, the PHI is 21 days.

## 7.21 Legume Vegetables, Crop Group 6-22

Crops (including all cultivars, varieties, and/or hybrids of these)		
African yam bean	<b>Bean (<i>Vigna</i> spp.)</b>	Broad bean (fava bean)
American potato bean	<b>including but not limited to:</b>	Chickpea (garbanzo bean)
<b>Bean (<i>Lupinus</i> spp.)</b>	Adzuki bean	Goa bean (asparagus pea and winged bean)
<b>including but not limited to:</b>	Asparagus bean	Grass pea
Adean lupin	Blackeyed pea	Guar bean
Blue lupin	Catjang bean	Horse gram
Grain lupin	Chinese longbean	Jackbean
Sweet lupin	Cowpea	Lablab bean (hyacinth bean)
White lupin	Crowder pea	Lentil
White sweet lupin	Moth bean	Morama bean
Yellow lupin	Mung bean	Pigeon pea
<b>Bean (<i>Phaseolus</i> spp.)</b>	Rice bean	Sword bean
<b>including but not limited to:</b>	Southern pea	Vegetable soybean (edamame)
Black bean	Urd bean	Velvetbean
Cranberry bean	Yardlong bean	Winged pea
Dry bean	<b>Pea (<i>Pisum</i> spp.)</b>	
Field bean	<b>including but not limited to:</b>	
French bean	Dry pea	
Garden bean	Dwarf pea	
Great Northern bean		
Green bean	English pea	
Kidney bean	Field pea	
Lima bean	Garden pea	
Navy bean	Green pea	
Pink bean	Marrowfat pea	
Pinto bean	Snap pea	
Red bean	Snow pea	
Runner bean	Sugar snap pea	
Snap bean	Wrinkled pea	
Tepary bean	Yellow pea	
Wax bean		
Yellow bean		

Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off Root rot ( <i>Pythium</i> spp.)	1.0 – 2.0 (0.25-0.5)	Preplant incorporated  At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 2.0 pt/A/year (equivalent to 0.5 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.5 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.22 Succulent Shelled Beans, Crop Subgroup 6-22C

Crops (including all cultivars, varieties, and/or hybrids of these)			
<b>Bean (<i>Phaseolus</i> spp.) including but not limited to:</b> Lima bean Scarlet Runner bean Wax bean <b>Bean (<i>Vigna</i> spp.) including but not limited to:</b> Blackeyed pea Catjang bean Cowpea Crowder pea Moth bean Southern pea	<b>Bean (<i>Lupinus</i> spp.) including but not limited to:</b> Andean lupin Blue lupin Grain lupin Sweet lupin White lupin White sweet lupin Yellow lupin	Broad bean (fava bean) Jackbean Goa bean Lablab bean (hyacinth bean) Vegetable soybean (edamame) Velvetbean	
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Downy mildew ( <i>Phytophthora parasitica</i> )	0.25 – 0.4 (0.063-0.1)	Apply when conditions are favorable for disease but before infection on a 14-day schedule.	<b>Foliar Spray (ground or air):</b> Mefenoxam 2E must be used in a tank-mix with other fungicides registered for control of downy mildew.

			Apply with the full label rate of the tank-mix partner fungicide.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> <ol style="list-style-type: none"> <li><b>Foliar:</b> 0.4 pt/A (equivalent to 0.1 lb ai/A mefenoxam)</li> </ol> </li> <li><b>Minimum Application Interval:</b> 14 days</li> <li><b>Maximum Annual Application Rate: Foliar:</b> 1.6 pt/A/year (equivalent to 0.4 lb ai/A/year mefenoxam)           <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.5 lb ai/A/year of soil-applied and 0.4 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 4 foliar-applied applications at the maximum application rate per year.</li> <li>For use only on succulent beans east of the Mississippi River.</li> <li><b>Pre-harvest Interval (PHI):</b> 3 days</li> </ol>			

## 7.23 Succulent Shelled Peas, Crop Subgroup 6-22D

<b>Crops (including all cultivars, varieties, and/or hybrids of these)</b>			
Chickpea Lentil Pigeon pea		<b>Pea (<i>Pisum</i> spp.) including but not limited to:</b> English pea Garden pea Green pea	
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Downy mildew ( <i>Phytophthora parasitica</i> )	0.25 – 0.4 (0.063-0.1)	Apply when conditions are favorable for disease but before infection on a 14-day schedule.	<b>Foliar Spray (ground or air):</b> Ridomil Gold SL must be used in a tank-mix with other fungicides registered for control of downy mildew.  Apply with the full label rate of the tank-mix partner fungicide.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> <ol style="list-style-type: none"> <li><b>Foliar:</b> 0.4 pt/A (equivalent to 0.1 lb ai/A mefenoxam)</li> </ol> </li> <li><b>Minimum Application Interval:</b> 14 days</li> <li><b>Maximum Annual Application Rate: Foliar:</b> 1.6 pt/A/year (equivalent to 0.4 lb ai/A/year mefenoxam)           <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.5 lb ai/A/year of soil-applied and 0.4 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 4 foliar-applied applications at the maximum application rate per year.</li> <li>For use only on succulent beans east of the Mississippi River.</li> <li><b>Pre-harvest Interval (PHI):</b> 3 days</li> </ol>			

## 7.24 Peanut

Crops (including all cultivars, varieties, and/or hybrids of these)			
Peanut			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Pythium root rot ( <i>Pythium</i> spp.)	0.50 (0.125)	At planting	<p><b>In-furrow Spray:</b> Position the spray so the fungicide is mixed with the soil covering the seed.</p> <p>Avoid spraying the seed directly or crop injury may occur.</p> <p>To calculate the rate as an in-furrow application, see <b>Section 4.1.2.</b></p> <p><b>Soil Spray (banded):</b> Apply over the row. Use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1.</b></p>
Pod rot ( <i>Pythium</i> spp.)	1.0 – 2.0 (0.25- 0.50)	At pegging to early pod set	Apply at early pod set as a soil-directed spray or at pegging through foliar (overhead irrigation).
<b>Resistance Management:</b> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> <ol style="list-style-type: none"> <li><b>Soil (at planting):</b> 0.50 pt/A (equivalent to 0.125 lb ai/A mefenoxam)</li> <li><b>Foliar:</b> 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam)</li> </ol> </li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> <b>Soil:</b> 0.50 pt/A/year (equivalent to 0.125 lb ai/A/year mefenoxam) <b>Foliar:</b> 2.0 pt/A/year (equivalent to 0.50 lb ai/A/year mefenoxam)           <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.125 lb ai/A/year of soil-applied and 0.50 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 1 soil-directed (foliar) application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.25 Pineapple, Crown Dip

Crops (including all cultivars, varieties, and/or hybrids of these)			
Pineapple			
Target Disease	Rate pt (lb ai)	Application Timing	Use Directions
Heart rot disease ( <i>Phytophthora</i> spp.)	1.0 – 2.0 in 100 gal water (0.25- 0.50)	<b>Crown dip</b> before planting	The amount of dip solution per acre will depend on crown size, plant density, and dipping techniques.  Use 75-100 gallons of the mixture per acre for dipping.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
1) Refer to <b>Section 6.1</b> for additional product use restrictions. 2) <b>Maximum Single Application Rate:</b> 2.0 pt/100 gal water/A (equivalent to 0.5 lb ai/A mefenoxam) 3) <b>Minimum Application Interval:</b> NA 4) <b>Maximum Annual Application Rate:</b> 2.0 pt/100 gal water/A/year (equivalent to 0.5 lb ai/A/year mefenoxam) a) <b>DO NOT</b> exceed 0.5 lb ai/A/year of mefenoxam- and metalaxyl-containing products. 5) <b>DO NOT</b> make more than 1 application at the maximum application rate per year. 6) If there is a crop failure within one year of planting treated crowns, <b>DO NOT</b> harvest plant material for animal feed. 7) <b>Pre-harvest Interval (PHI):</b> NA			

## 7.26 Root and Tuber Vegetables

### 7.26.1 CARROT

Crops (including all cultivars, varieties, and/or hybrids of these)			
Carrot			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Cavity spot Damping off Root dieback ( <i>Pythium</i> spp.)	1.0 – 2.6 (0.25-0.65)	Preplant incorporated   At planting or prior to emergence	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .

			<b>NOTE:</b> If post-planting applications are planned, see notes below for guidance on maximum rates for soil and foliar applications.
	0.5 – 2.0 (0.125-0.5)	<b>Post-planting:</b> Apply 28-50 days after planting. Apply on a 14- to 21-day interval.	<b>Soil-Directed Spray, Chemigation (Section 4.5), or Shank Application:</b> All ground applications must be followed by irrigation with one inch of water to promote movement of product into the root zone.
		<b>Directed spray:</b> Make up to 4 applications beginning 40-60 days after planting. Apply on a 14- to 21-day interval.	<b>Soil-Directed Spray (broadcast or band):</b> Apply as a spray directed to the base of the plant. Use sufficient water to provide uniform coverage of soil.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .  <b>For irrigation,</b> inject Mefenoxam 2E into the irrigation water.  For best control of cavity spot, use a preventive disease control program that incorporates an at-planting or seed treatment use of mefenoxam followed by one or more additional applications.

**Resistance Management:**

- Refer to **Section 3.2**.

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 2.6 pt/A (equivalent to 0.65 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 14 days
- 4) **Maximum Annual Application Rate:** 5.6 pt/A/year (equivalent to 1.4 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed a total of 1.4 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
  - b) **DO NOT** exceed 0.65 lb ai/A/year of soil-applied and 0.75 lb ai/A/year of foliar-applied metalaxyl- and mefenoxam-containing products.
- 5) **DO NOT** make more than 1 soil-applied application and 1 soil-directed (foliar) application at the maximum application rate per year **OR** 4 soil-directed (foliar) applications not exceeding 0.35 lb ai/A/application.
- 6) **DO NOT** use a soil application if a seed treatment containing mefenoxam or metalaxyl is used.
- 7) **Pre-harvest Interval (PHI):** 7 days

## 7.26.2 GINSENG

Crops (including all cultivars, varieties, and/or hybrids of these)			
Ginseng			
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Phytophthora root rot ( <i>Phytophthora cactorum</i> )	1.5 (0.375)	Apply in the spring before plants start growing.	For stand establishment, apply uniformly as a soil drench to the soil surface. Apply in 100-400 gallons of water per acre.  Follow with additional applications of Ridomil Gold® GR (EPA Reg.#100-798, mefenoxam).
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 1.5 pt/A (equivalent to 0.375 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 1.5 pt/A/year (equivalent to 0.375 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.375 lb ai/A/year of soil-applied and 1.125 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application of Mefenoxam 2E per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.26.3 POTATO

Crops (including all cultivars, varieties, and/or hybrids of these)			
Potato			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Pink rot ( <i>Phytophthora erythroseptica</i> )	0.84 fl oz/1000 row ft	At planting	<b>In-furrow spray:</b> Apply directly over the seed pieces in-furrow as a 6- to 8-inch band prior to row closure or use markout application method (incorporated).
Pythium leak ( <i>Pythium</i> spp.)	Equiva- lent to 12.2 fl oz/A on 36-inch	A follow up application may be needed at tuber initiation.	To calculate the rate as an in-furrow application, see <b>Section 4.1.2</b> .
Pythium seedling disease ( <i>Pythium</i> spp.)	row spacing (0.19)		If needed, follow this in-furrow application with a Mefenoxam 2E prepack or tank-mix foliar application at tuber initiation: <ul style="list-style-type: none"> <li>When conditions are conducive for disease development.</li> <li>When the variety is susceptible or moderately susceptible to pink rot/pythium leak.</li> </ul>



			<ul style="list-style-type: none"> <li>In areas with a long growing season.</li> </ul> <p>Mefenoxam 2E may be impregnated on dry fertilizer or applied in combination with liquid fertilizers.</p>
	6.4 fl oz/A (0.1)	<p><b>Foliar Application:</b> At tuber initiation when the largest tubers are the size in diameter of a nickel; this usually coincides with initiation of flowering.</p> <p>Make a second application 14 days later and, if the field has a history of storage rot problems, a third application 14 days after the second application.</p>	<p><b>Broadcast or Soil-Directed (air, ground, or chemigation).</b></p> <p>If the field has a history of storage rot problems, make a third application.</p> <p>If foliar diseases are expected, then a tank-mix with a labeled rate of mancozeb or chlorothalonil products is required.</p> <p>Use in conjunction with other management practices including crop rotation and resistant varieties.</p>
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> <ol style="list-style-type: none"> <li><b>Soil:</b> 0.84 fl oz/1000 row ft (equivalent to 0.19 lb ai/A mefenoxam)</li> <li><b>Foliar:</b> 6.4 fl oz/A (equivalent to 0.1 lb ai/A mefenoxam)</li> </ol> </li> <li><b>Minimum Application Interval:</b> 14 days</li> <li><b>Maximum Annual Application Rate: Soil:</b> 0.84 fl oz/1000 row ft (equivalent to 0.19 lb ai/A/year mefenoxam) <b>Foliar:</b> 19.2 fl oz/A/year (equivalent to 0.3 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.34 lb ai/A/year of soil-applied and 0.40 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application and 3 foliar-applied applications at the maximum application rate per year.</li> <li><b>DO NOT</b> use the “dribble” application method.</li> <li><b>Pre-harvest Interval (PHI):</b> 14 days</li> </ol>			

### 7.26.4 ROOT AND TUBER VEGETABLES, CROP GROUP 1 (EXCEPT CARROT, GINSENG, AND POTATO)

Crops (including all cultivars, varieties, and/or hybrids of these)			
Arracacha		Chervil, turnip-rooted	Rutabaga
Arrowroot		Chicory	Salsify (oyster plant)
Artichoke, Chinese		Chufa	Salsify, black
Artichoke, Jerusalem		Dasheen (taro)	Salsify, Spanish
Beet, garden		Ginger	Skirret
Burdock, edible		Horseradish	Sugar Beet
Canna, edible		Leren	Sweet potato
Cassava, bitter		Parsley, turnip-rooted	Tanier (cocoyam)
Cassava, sweet		Parsnip	Turmeric
Celeriac (celery root)		Radish	Turnip
Chayote (root)		Radish, oriental (daikon)	Yam bean (jicama, manioc pea)
			Yam, true
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Pythium root rot ( <i>Pythium</i> spp.) Phytophthora root rot ( <i>Phytophthora</i> spp.)	2.0 – 4.0 (0.5-1.0)	Preplant incorporated          At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil. Use sufficient water to provide uniform coverage of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1.</b>
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2.</b></li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.27 Soybean

Crops (including all cultivars, varieties, and/or hybrids of these)			
Soybean			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Phytophthora root and stem rot ( <i>Phytophthora megasperma</i> )  Pythium damping off ( <i>Pythium</i> spp.)	0.16-0.56 fl oz/1000 row ft (0.0025-0.0087)	At seeding	<p><b>In-furrow Spray:</b> Apply in water or liquid fertilizer. Position the spray so the fungicide is mixed with the soil covering the seed.</p> <p>To calculate the rate as an in-furrow application, see <b>Section 4.1.2</b>.</p> <p>Use the higher specified rate for full-season control. Use 0.16-0.30 fl oz (0.0025-0.0047 lb ai) for early- to mid-season control.</p>
	0.74-2.5 pt/A (0.18-0.625)	At seeding	<p><b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer. Use the higher specified rate for full-season control. Use 0.74-1.50 pt (0.18-0.375 lb ai) for early- to mid-season control.</p> <p>For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p> <p>For best results, use soybean varieties that have some degree of resistance to the races of <i>Phytophthora</i> present in the field.</p> <p>Use the higher specified rate in areas with a history of heavy <i>Phytophthora</i> damage.</p>
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<p><b>Precautions:</b></p> <ul style="list-style-type: none"> <li>Avoid spraying the seed directly with an in-furrow spray or crop injury may occur.</li> <li>Under heavy late-season <i>Phytophthora</i> pressure, Mefenoxam 2E may not provide complete control.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 2.5 pt/A (equivalent to 0.625 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 2.5 pt/A/year (equivalent to 0.625 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 0.625 lb ai/A/year of mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> NA</li> </ol>			

## 7.28 Celtuce

Crops (including cultivars, varieties, and/or hybrids of these)			
Celtuce			
Target Diseases	Rate (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	2.0 – 4.0 pt/A (0.50-1.0)	Preplant incorporated  At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and mechanically incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
	Transplant water:  0.50-1.0 pt/100-200 gal water/A  (0.125-0.25)	At transplant or immediately following planting	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precautions:</b>			
<ul style="list-style-type: none"> <li>There is a risk of plant injury with transplant water application: <ul style="list-style-type: none"> <li>Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.</li> <li>Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.</li> </ul> </li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 application at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 7 days</li> </ol>			



## 7.30 Kohlrabi

Crops (including cultivars, varieties, and/or hybrids of these)			
Kohlrabi			
Target Diseases	Rate pt/A (lb ai)	Application Timing	Use Directions
Basal stem rot ( <i>Phytophthora</i> spp.)	2.0 – 4.0 (0.50-1.0)	Preplant incorporated  At Planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .  <b>Injection (drip irrigation):</b> Inject Mefenoxam 2E into the irrigation water at the labeled rates.
Damping off ( <i>Pythium</i> spp.)	0.50 – 1.0 (0.125-0.25)	Preplant incorporated	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
Downy mildew ( <i>Peronospora</i> <i>parasitica</i> )	0.25 – 0.50 (0.063-0.125)	Apply when conditions are favorable for disease but before infection on a 14-day schedule.	<b>Foliar Spray (ground or air):</b> Mefenoxam 2E must be used in a tank-mix with other fungicides registered for control of downy mildew. Apply with the full label rate of the tank-mix partner fungicide.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> <ol style="list-style-type: none"> <li><b>Soil:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Foliar:</b> 0.5 pt/A (equivalent to 0.125 lb ai/A mefenoxam)</li> </ol> </li> <li><b>Minimum Application Interval:</b> <ol style="list-style-type: none"> <li><b>Soil:</b> NA</li> <li><b>Foliar:</b> 14 days</li> </ol> </li> </ol>			

- 4) **Maximum Annual Application Rate: Soil:** 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam)  
**Foliar:** 2.0 pt/A/year (equivalent to 0.5 lb ai/A/year mefenoxam)  
a) **DO NOT** exceed 1.0 lb ai/A/year of soil-applied and 0.5 lb ai/A/year of foliar-applied mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 1 soil-applied application at the maximum application rate per year.
- 6) **DO NOT** make more than 4 foliar-applied applications at the maximum application rate per year.
- 7) **DO NOT** apply foliar sprays of Mefenoxam 2E without a labeled tank-mix partner.
- 8) **DO NOT** apply the Mefenoxam 2E mixture in fields where downy mildew is already established.
- 9) **Pre-harvest Interval (PHI):** 7 days

## 7.31 Leaf Petiole Vegetables, Crop Subgroup 22B

Crops (including all cultivars, varieties, and/or hybrids of these)			
Cardoon	Fuki	Udo	
Celery	Rhubarb	Zuiki	
Celery, Chinese			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	2.0 – 4.0 pt/A (0.50-1.0)	Preplant incorporated  At planting	<b>Preplant Incorporated (broadcast or band):</b> Apply in water or liquid fertilizer and incorporate in the top 2 inches of soil.  <b>Soil Spray (broadcast or band):</b> Apply in water or liquid fertilizer at planting.  For banded applications, use a 7-inch band. To calculate the rate as a band application, see <b>Section 4.1.1</b> .
	Transplant water: 0.50-1.0 pt/100- 200 gal water/A  (0.125-0.25)	At transplant or immediately following planting	Apply in transplant water or immediately following planting via soil drench.  Apply in at least 100 gallons of transplant water per acre.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precautions:</b>			
<ul style="list-style-type: none"> <li>There is a risk of plant injury with transplant water application: <ul style="list-style-type: none"> <li>Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.</li> <li>Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.</li> </ul> </li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 4.0 pt/A (equivalent to 1.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> NA</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 1 soil-applied application at the maximum application rate per year.</li> </ol>			

6) Pre-harvest Interval (PHI): NA
-----------------------------------

## 7.32 Stalk and Stem Vegetables, Crop Subgroup 22A

Crops (including cultivars, varieties, and/or hybrids of these)			
See Sections 7.28, 7.29, and 7.30 for separate Celtuce, Fennel, and Kohlrabi directions, respectively.			
Agave Aloe vera Asparagus	Bamboo shoots Fern, edible, fiddlehead Kale, sea	Palm hearts Prickly pear, pads Prickly pear, Texas, pads	
Target Diseases	Rate pt/A (lb ai)	Application Timing	Use Directions
Crown rot Spear rot ( <i>Phytophthora</i> spp.)	2.0 (0.50)	<p><b>Cutting beds:</b> Apply 30 to 60 days before the first cutting.</p> <p>Apply again just before the beginning of harvest.</p> <p><b>New plantings:</b> Apply after planting seedlings or after covering one-year old crowns.</p>	<p><b>Soil Spray (broadcast or band):</b> Apply as a soil spray (broadcast or band).</p> <p>To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p>
<b>Resistance Management:</b> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 2.0 pt/A (equivalent to 0.5 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 30 days</li> <li><b>Maximum Annual Application Rate:</b> 4.0 pt/A/year (equivalent to 1.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 1.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 2 applications at the maximum application rate per year.</li> <li><b>Pre-harvest Interval (PHI):</b> 1 day</li> </ol>			



## 7.33 Stone Fruits, Crop Group 12

Crops (including all cultivars, varieties, and/or hybrids of these)			
Apricot		Peach	Plum, Japanese
Cherry, sweet		Plum	Plumcot
Cherry, tart		Plum, Chickasaw	Prune
Nectarine		Plum, Damson	
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Collar rot Crown rot Root rot ( <i>Phytophthora</i> spp.)	8.0 pt/A (2.0)  or  3.0 fl oz/1000 sq ft	Two weeks after planting (new plantings) or in the spring before growth begins (established plantings).  Additional applications may be made at 2- to 3-month intervals, depending on disease pressure.  Apply before symptoms appear.	<b>Soil Spray (broadcast, band, or irrigation):</b> Apply to soil beneath the tree canopy or apply through irrigation water (micro-sprinkler or drip) to cover the root zone.  For intensive plantings (2-3 times the normal planting rate), apply on a per area basis (1,000 sq ft).  To calculate the rate as a band application, see <b>Section 4.1.1</b> .
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Mefenoxam 2E will not revitalize trees showing moderate to severe disease symptoms.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 8.0 pt/A (equivalent to 2.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 60 days</li> <li><b>Maximum Annual Application Rate:</b> 24.0 pt/A/year (equivalent to 6.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 6.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 3 applications per year.</li> <li><b>DO NOT</b> concentrate spray around tree trunks.</li> <li><b>DO NOT</b> apply to trees under stress.</li> <li>In CA, <b>DO NOT</b> apply to newly planted trees within 45 days of planting. On some varieties, chlorosis may occur on leaf margins.</li> <li><b>DO NOT</b> graze livestock in treated areas.</li> <li><b>DO NOT</b> graze or feed cover crops grown in treated orchards.</li> <li><b>Pre-harvest Interval (PHI):</b> 0 days</li> </ol>			

## 7.34 Tobacco

Crops (including all cultivars, varieties, and/or hybrids of these)			
Tobacco			
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.)	1.0 – 2.0 pt/A (0.25-0.5)  or  0.50 – 1.0 fl oz/150 sq yd	Preplanting or at time of planting	<b>Soil Spray (broadcast):</b> Apply as a preplant soil application before or at time of planting. Use the higher specified application rate on broadleaf tobacco.  Use 65 gallons of water per acre (2 gallons water/150 sq yd).  Move into soil as described in <b>Section 4.3.</b>
Blue mold ( <i>Peronospora tabacina</i> )	<u>Broadcast</u> 1.0 – 2.0 pt/A (0.25-0.5)  For no-till tobacco: 1.0 – 2.0 pt/A (0.25-0.5)	Prior to transplanting	<b>Soil Spray (broadcast):</b> Apply as a broadcast soil application and incorporate in the top 2-4 inches of soil before forming beds. For additional control, make a second application at layby or at the last cultivation.  Use the lower specified rate for low disease pressure or early-season control.  Use the higher specified rate for high disease pressure, extended control, and on burley and other tobacco types other than flue-cured.
	1.0 pt/A (0.25)  For no-till tobacco: 1.0 – 2.0 pt/A (0.25-0.5)	Layby or Last cultivation	<b>Soil Spray (band):</b> Position the nozzles so the spray is deposited under the plants and is covered by the soil in cultivation.  To calculate the rate as a band application, see <b>Section 4.1.1.</b>
Black shank ( <i>Phytophthora parasitica</i> var. <i>nicotianae</i> )	Broadcast 2.0 – 6.0 pt/A (0.5-1.5)  For no-till tobacco: 1.0 – 2.0 pt/A (0.25-0.5)	Prior to transplant  Make at least one subsequent application of Mefenoxam 2E at first cultivation and/or layby if necessary.	<b>Soil Spray (broadcast):</b> Apply to the soil within a week of planting and incorporate in the top 2-4 inches of soil. Use the higher specified rate if disease epidemic is expected to be severe.  In FL and GA, use 6.0 pt/A (1.5 lb ai) where black shank is severe.  Move into soil as described in <b>Section 4.3.</b>

	<p>Transplant water: 0.50 – 1.0 pt /200 gal water (0.125-0.25)</p>	<p>At transplant (followed by additional application at first cultivation or layby).</p>	<p><b>Transplant water:</b> Apply in transplant furrow while planting tobacco seedlings. Apply 0.50-1.0 pt (0.125-0.25 lb ai) in at least 200 gallons of transplant water per acre. Use the highest specified rate if the disease epidemic is expected to be severe.</p> <p>Pre-mixing Mefenoxam 2E in a tank separate from the transplant water source tank will help to prevent incompatibility with fertilizers or other pesticides in the transplant water solution.</p>
	<p>2.0 – 4.0 pt/A (0.5-1.0)</p> <p>For no-till tobacco: 1.0 – 2.0 pt/A (0.25-0.5)</p>	<p>First Cultivation and/or layby</p>	<p><b>Soil Spray (broadcast or band):</b> Position the nozzles so the spray is deposited under the plants and covered with soil by the cultivator.</p> <p>To calculate the rate as a band application, see <b>Section 4.1.1</b>.</p> <p>Apply preventatively for effective black shank control. If black shank is expected early in the season, apply as near as possible to transplanting followed by sequential application.</p> <p>Consult local extension bulletins for additional use directions.</p> <p>For best results against black shank, use tobacco varieties that have high resistance to black shank and practice crop rotation.</p> <p>In fields with a history of severe black shank, use the highest specified rate and plant variety resistant to the race of <i>Phytophthora</i> present (Burley L8 hybrids are resistant to only <i>Phytophthora</i> Race 0).</p>
<p><b>Resistance Management:</b></p> <ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			

**Precautions:**

- There is a risk of plant injury with transplant water application, especially when applied in less than 200 gallons of carrier volume per acre. Crop injury is more likely when applied in less than 100 gallons/acre. Injury is temporary and typically disappears within three weeks.
- Failure to adequately control nematodes in fields treated with Mefenoxam 2E may result in poor control of black shank.

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 6.0 pt/A (equivalent to 1.5 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 14 days
- 4) **Maximum Annual Application Rate:** 6.0 pt/A/year (equivalent to 1.5 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 1.5 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 1 application at the maximum application rate per year OR 3 applications at the minimum application rate.
- 6) **DO NOT** use in high black shank areas on highly susceptible flue-cured varieties.
- 7) **DO NOT** use Mefenoxam 2E for black shank control in PA.
- 8) **DO NOT** apply to stressed seedlings or during hot and dry conditions due to injury potential.
- 9) **Pre-harvest Interval (PHI):** NA

## 7.35 Tree Nuts, Crop Group 14-12

Crops (including all cultivars, varieties, and/or hybrids of these)			
African nut-tree	Cashew	Hickory nut	Pecan
Almond	Chestnut	Japanese horse-chestnut	Pequi nut
Beechnut	Chinquapin		Pili nut
Brazil nut	Coconut	Macadamia nut	Pine nut
Brazilian pine	Coquito nut	Mongongo nut	Pistachio
Bunya	Dika nut	Monkey-pot	Sapucaia nut
Bur oak	Ginkgo	Monkey puzzle nut	Tropical almond
Butternut	Guiana chestnut	Okari nut	Walnut, black
Cajou nut	Hazelnut (Filbert)	Pachira nut	Walnut, English
Candlenut	Heartnut	Peach palm nut	Yellowhorn
Target Disease	Rate (lb ai)	Application Timing	Use Directions
Collar rot Crown rot Root rot ( <i>Phytophthora</i> spp.)	8.0 pt/A (2.0)  or  3.0 fl oz/1000 sq ft	2 weeks after planting (new plantings) or in the spring before growth begins (established plantings).  Additional applications may be made at 2- to 3-month intervals, depending on disease pressure.  Apply before symptoms appear.	<b>Soil Spray (broadcast, band, or irrigation):</b> Apply to soil beneath the tree or apply through irrigation water (micro-sprinkler or drip) to cover the root zone.  For intensive plantings (2-3 times the normal planting rate), apply on a per area basis (1,000 sq ft).  To calculate the rate as a band application, see <b>Section 4.1.1</b> .
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
<b>Precaution:</b>			
<ul style="list-style-type: none"> <li>Mefenoxam 2E will not revitalize trees showing moderate to severe disease symptoms.</li> </ul>			
<b>USE RESTRICTIONS</b>			
<ol style="list-style-type: none"> <li>Refer to <b>Section 6.1</b> for additional product use restrictions.</li> <li><b>Maximum Single Application Rate:</b> 8.0 pt/A (equivalent to 2.0 lb ai/A mefenoxam)</li> <li><b>Minimum Application Interval:</b> 60 days</li> <li><b>Maximum Annual Application Rate:</b> 24.0 pt/A/year (equivalent to 6.0 lb ai/A/year mefenoxam) <ol style="list-style-type: none"> <li><b>DO NOT</b> exceed 6.0 lb ai/A/year of soil-applied mefenoxam- and metalaxyl-containing products.</li> </ol> </li> <li><b>DO NOT</b> make more than 3 applications per year.</li> <li><b>DO NOT</b> concentrate spray around tree trunks.</li> <li><b>DO NOT</b> apply to trees under stress.</li> <li>In CA, <b>DO NOT</b> apply to newly planted trees within 45 days of planting. On some varieties, chlorosis may occur on leaf margins.</li> <li><b>DO NOT</b> graze livestock in treated areas.</li> <li><b>DO NOT</b> graze or feed cover crops grown in treated orchards.</li> <li><b>Pre-harvest Interval (PHI):</b> 30 days</li> </ol>			

## 7.36 Tropical and Subtropical Fruit

### 7.36.1 MEDIUM TO LARGE FRUIT, SMOOTH PEEL

Crops (including all cultivars, varieties, and/or hybrids of these)			
Canistel Mango Papaya		Sapote, black Star apple	
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Damping off ( <i>Pythium</i> spp.) Root rot ( <i>Phytophthora</i> spp.)	3.0 – 6.0 (0.75-1.5)	Two applications may be made per season.  Make the first application after transplanting or in the spring at root growth flush.  Make a second application at least 1 day before harvest.	<b>Soil Drench:</b> Add Mefenoxam 2E to water or a liquid fertilizer solution. Apply this solution to the base of the plants to deliver approximately 5 gallons per plant.
<b>Resistance Management:</b>			
<ul style="list-style-type: none"> <li>Refer to <b>Section 3.2</b>.</li> </ul>			
USE RESTRICTIONS			
1) Refer to <b>Section 6.1</b> for additional product use restrictions. 2) <b>Maximum Single Application Rate:</b> 6.0 pt/A (equivalent to 1.5 lb ai/A mefenoxam) 3) <b>Minimum Application Interval:</b> 90 days 4) <b>Maximum Annual Application Rate:</b> 12.0 pt/A/year (equivalent to 3.0 lb ai/A/year mefenoxam) a) <b>DO NOT</b> exceed 3.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products. 5) <b>DO NOT</b> make more than 2 applications per year. 6) <b>Pre-harvest Interval (PHI):</b> 1 day			

### 7.36.2 MEDIUM TO LARGE FRUIT, ROUGH OR HAIRY PEEL

Crops (including all cultivars, varieties, and/or hybrids of these)			
Atemoya Biriba Cherimoya Custard apple Ilama		Sapodilla Sapote, mamey Starfruit Soursop Sugar apple	
Target Disease	Rate pt/A (lb ai)	Application Timing	Use Directions
Crown rot Damping off Pythium root rot ( <i>Pythium</i> spp.) Crown rot Phytophthora root rot ( <i>Phytophthora</i> spp.)	3.0 – 6.0 (0.75-1.5)	Two applications may be made per season.  Make the first application after transplanting or in the spring at root growth flush.  Make a second application at least 30 day before harvest.	<b>Soil Drench:</b> Add Mefenoxam 2E to water or a liquid fertilizer solution. Make applications to the soil surface under the canopy of the trees delivering approximately 5 gallons per plant.

**Resistance Management:**

- Refer to **Section 3.2.**

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 6.0 pt/A (equivalent to 1.5 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 90 days
- 4) **Maximum Annual Application Rate:** 12.0 pt/A/year (equivalent to 3.0 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 3.0 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
- 5) **DO NOT** make more than 2 applications per year.
- 6) **Pre-harvest Interval (PHI):** 30 days

## 7.37 Wasabi

**Crops (Including all cultivars, varieties, and/or hybrids of these)**

Wasabi (greenhouse)

Target Disease	Rate (lb ai)	Application Timing	Use Directions
Root rot ( <i>Pythium</i> spp.)	1.0 – 3.0 pt/A  (0.25-0.75)  Equivalent to 0.0012 – 0.014 lb ai/ft <sup>3</sup>	Make the first application prior to disease onset and subsequent applications on a 7-day interval.	<b>Greenhouse foliar mist application only:</b>  Apply only via automatic foliar misting system in 400-1500 gal/A.  <b>DO NOT</b> apply more than 2 sequential applications of Mefenoxam 2E or other Group 4 fungicides before alternating with a fungicide that is not in Group 4.

**Resistance Management:**

- Refer to **Section 3.2.**

**USE RESTRICTIONS**

- 1) Refer to **Section 6.1** for additional product use restrictions.
- 2) **Maximum Single Application Rate:** 3.0 pt/A (equivalent to 0.75 lb ai/A mefenoxam)
- 3) **Minimum Application Interval:** 7 days
- 4) **Maximum Annual Application Rate:** 18.0 pt/A (equivalent to 4.5 lb ai/A/year mefenoxam)
  - a) **DO NOT** exceed 4.5 lb ai/A/year of mefenoxam- and metalaxyl-containing products.
- 5) **Applications may only be made via automatic foliar misting system. No workers or handlers may be present in the greenhouse during application.**
- 6) **DO NOT** make more than 6 applications per year.
- 7) **Pre-Harvest Interval (PHI):** 7 days

## 8.0 STORAGE AND DISPOSAL

### Storage and Disposal

**DO NOT** contaminate water, food, or feed by storage or disposal.

### Pesticide Storage

**DO NOT** use or store near heat or open flame. Store in original containers only. Keep container closed when not in use. **DO NOT** store near food or feed. In case of spill on floor or paved surfaces, mop and remove to chemical waste storage area until proper disposal can be made if product cannot be used according to label.

### Pesticide Disposal

Pesticide wastes are acutely toxic. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of federal law. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office.

### Container Handling [(less than or equal to 5 gallons)]

**Non-refillable container. DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container  $\frac{1}{4}$  full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then offer for recycling (if available), or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

### Container Handling [(greater than 5 gallons)]

**Non-refillable container. DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container  $\frac{1}{4}$  full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times. Then offer for recycling (if available), or puncture and dispose of in a sanitary landfill or by other procedures approved by state and local authorities.

### Container Handling [(greater than 5 gallons)]

**Refillable container.** Refill this container with pesticide only. **DO NOT** reuse this container for any other purpose. Cleaning the container before final disposal is the responsibility of the



person disposing of the container. Cleaning before refilling is the responsibility of the person refilling. To clean container before final disposal, empty the remaining contents from this container into application equipment or mix tank. Fill the container about 10 percent full with water. Agitate vigorously or recirculate water with the pump for 2 minutes. Pour or pump rinsate into application equipment or rinsate collection system. Repeat this rinsing procedure two more times. Then offer for recycling (if available), or puncture and dispose of in a sanitary landfill or by other procedures approved by state and local authorities.

**CONTAINER IS NOT SAFE FOR FOOD, FEED, OR DRINKING WATER.**

## **9.0 CONDITIONS OF SALE AND LIMITATION OF WARRANTY AND LIABILITY**

**NOTICE:** Read the entire Directions for Use and Conditions of Sale and Limitation of Warranty and Liability before buying or using this product. If the terms are not acceptable, return the product at once, unopened, and the purchase price will be refunded.

The Directions for Use of this product must be followed carefully. It is impossible to eliminate all risks inherently associated with the use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as manner of use or application, weather or crop conditions, presence of other materials or other influencing factors in the use of the product, which are beyond the control of SYNGENTA CROP PROTECTION, LLC or Seller. To the extent permitted by applicable law, Buyer and User agree to hold SYNGENTA and Seller harmless for any claims relating to such factors.

SYNGENTA warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes stated in the Directions for Use, subject to the inherent risks referred to above, when used in accordance with directions under normal use conditions. To the extent permitted by applicable law: (1) this warranty does not extend to the use of the product contrary to label instructions, or under conditions not reasonably foreseeable to or beyond the control of Seller or SYNGENTA, and (2) Buyer and User assume the risk of any such use. **TO THE EXTENT PERMITTED BY APPLICABLE LAW, SYNGENTA MAKES NO WARRANTIES OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR PURPOSE NOR ANY OTHER EXPRESS OR IMPLIED WARRANTY EXCEPT AS WARRANTED BY THIS LABEL.**

To the extent permitted by applicable law, in no event shall SYNGENTA be liable for any incidental, consequential or special damages resulting from the use or handling of this product. **TO THE EXTENT PERMITTED BY APPLICABLE LAW, THE EXCLUSIVE REMEDY OF THE USER OR BUYER, AND THE EXCLUSIVE LIABILITY OF SYNGENTA AND SELLER FOR ANY AND ALL CLAIMS, LOSSES, INJURIES OR DAMAGES (INCLUDING CLAIMS BASED ON BREACH OF WARRANTY, CONTRACT, NEGLIGENCE, TORT, STRICT LIABILITY OR OTHERWISE) RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, SHALL BE THE RETURN OF THE PURCHASE**

**PRICE OF THE PRODUCT OR, AT THE ELECTION OF SYNGENTA OR SELLER, THE REPLACEMENT OF THE PRODUCT.**

SYNGENTA and Seller offer this product, and Buyer and User accept it, subject to the foregoing Conditions of Sale and Limitation of Warranty and Liability, which may not be modified except by written agreement signed by a duly authorized representative of SYNGENTA.

## 10.0 APPENDIX

### 10.1 [Optional] Mefenoxam 2E Use Summary Table

**[Start of Optional Text]**

**IMPORTANT:** The table below is a summary of the Crop Use Directions for Mefenoxam 2E. However, it is important for the user to read and follow the complete instructions contained within this label.

Crop or Crop Group/Subgroup with examples	Maximum Single Application Rate (lb ai/A)	Maximum Annual Application Rate (lb ai/A/year)	Minimum Application Interval (days)	Pre-Harvest Interval (PHI, days)
Alfalfa	0.25	0.25	NA	60
Apple	2.0	4.0	90	NA
Artichoke	1.0	1.0	NA	200
Avocado	2.0	6.0	90	28
<b>Berry and Small Fruit:</b> <i>Bushberry, Crop Subgroup 13-07B</i> Blueberry, Highbush	1.8	3.6	90	0
<b>Berry and Small Fruit:</b> <i>Caneberry, Crop Subgroup 13-07A</i> Blackberry Raspberry	1.8	<b>Soil:</b> 3.6 <b>Foliar:</b> 0.2	90	45
<b>Berry and Small Fruit:</b> Cranberry	0.875	2.625	90	45
<b>Berry and Small Fruit:</b> <i>Small fruit vine climbing (except grape), Crop Subgroup 13-07E</i> Kiwifruit, fuzzy Gooseberry	0.35	1.75	30	7
<b>Berry and Small Fruit:</b> Strawberry Strawberry, field nursery	0.5	1.5 <b>except for</b> field nursery: 1.0	30	0
<b>Brassica Head and Stem Vegetables, Crop Group 5-16</b> Broccoli	<b>Soil:</b> 1.0 <b>Foliar:</b> 0.125	<b>Soil:</b> 1.0 <b>Foliar:</b> 0.50	<b>Soil:</b> NA <b>Foliar:</b> 14	7

Crop or Crop Group/Subgroup with examples	Maximum Single Application Rate (lb ai/A)	Maximum Annual Application Rate (lb ai/A/year)	Minimum Application Interval (days)	Pre-Harvest Interval (PHI, days)
Cauliflower				
<b>Brassica Leafy Greens, Crop Subgroup 4-16B</b> Mustard Greens	Soil: 1.0 Foliar: 0.125	Soil: 1.0 Foliar: 0.50	Soil: NA Foliar: 14	7
<b>Bulb Vegetables, Crop Group 3-07</b> Onion, bulb Onion, green	0.5	<b>For onions (bulb):</b> Soil: 1.0 Foliar: 0.5  <b>For onions (green):</b> Soil: 1.0 Foliar: 0.3	NA	NA
<b>Cacao</b>	0.01	0.04	21	30
<b>Citrus Fruit, Crop Group 10</b> Sweet Orange, Lemon	3.0	6.0	90	0
<b>Clover</b>	0.25	0.25	NA	90
<b>Cotton, Crop Subgroup 20C</b>	0.063 for 38-inch row centers (0.15 fl oz/1000 row ft)	0.125	NA	NA
<b>Cucurbit Vegetables, Crop Group 9</b> Cucumber, Muskmelon, and Summer Squash	1.0	Soil: 1.0 Foliar: 0.5	20 <i>unless</i> following transplant water application: 14	5
<b>Fruiting Vegetables, Crop Group 8-10</b>  Pepper, Tomato	0.5  <i>except for</i> Tomato: 1.0	Soil: 1.5 Foliar: 0.5	30 <i>unless</i> following transplant water application: 14  <i>except for</i> Tomato: 28	7
<b>Grapes</b>	1.8	Soil: 5.4 Foliar: 0.4	90	60
<b>Grass Forage, Fodder, and Hay, Crop Group 17</b> Bluegrass, Fescue	0.5	0.5	NA	60
<b>Herbs (fresh and dried), Crop Subgroup 19A</b> Basil, Chive	1.0	2.0	28	21
<b>Hops</b>	0.25	Soil: 0.25 Foliar: 0.5	Soil: NA Foliar: 14	45
<b>Leafy Vegetables: Leafy Greens, Crop Subgroup 4-16A</b> Head Lettuce	1.0	Soil: 1.0  <i>except for</i> Lettuce:	Soil: NA Foliar (lettuce only): 14	7

Crop or Crop Group/Subgroup with examples	Maximum Single Application Rate (lb ai/A)	Maximum Annual Application Rate (lb ai/A/year)	Minimum Application Interval (days)	Pre-Harvest Interval (PHI, days)
Leaf Lettuce		<b>Soil:</b> 1.0 <b>Foliar:</b> 0.4		
<b>Spinach</b>	1.0	<b>Soil:</b> 1.0 at planting <i>followed by either:</i>  <b>Shanked:</b> 0.25  <b>or</b>  <b>Foliar:</b> 0.4	21	<b>3 <i>only if</i></b> soil application does not exceed 1.0 lb ai/A/year and foliar application does not exceed 0.25 lb ai/A/year  <b><i>otherwise:</i></b> 21
<b>Legume Vegetables, Crop Group 6-22</b>	0.5	0.5	NA	NA
<b>Succulent Shelled Beans, Crop Subgroup 6-22C</b>	<b>Soil:</b> 0.5 <b>Foliar:</b> 0.1	<b>Soil:</b> 0.5 <b>Foliar:</b> 0.4	14	3
<b>Succulent Shelled Peas, Crop Subgroup 6-22D</b>	<b>Soil:</b> 0.5 <b>Foliar:</b> 0.1	<b>Soil:</b> 0.5 <b>Foliar:</b> 0.4	14	3
<b>Peanut</b>	<b>Soil:</b> 0.125 <b>Foliar:</b> 0.5	<b>Soil:</b> 0.125 <b>Foliar:</b> 0.50	NA	NA
<b>Pineapple, Crown Dip</b>	0.50	0.50	NA	NA
<b>Root and Tuber Vegetables:</b> Carrot	0.65	<b>Total:</b> 1.4  <b>or</b>  <b>Soil:</b> 0.65 <b>Foliar:</b> 0.75	14	7
<b>Root and Tuber Vegetables:</b> Ginseng	0.375	<b>Soil:</b> 0.375 <b>Foliar:</b> 1.125	NA	NA
<b>Root and Tuber Vegetables:</b> Potato	<b>Soil:</b> 0.19 (based on a 36-inch row spacing) <b>Foliar:</b> 0.1	<b>Soil:</b> 0.34 <b>Foliar:</b> 0.40	14	14
<b>Root and Tuber Vegetables, Crop Group 1 (except Carrot, Ginseng, and Potato)</b> Sugar Beet, Radish	1.0	1.0	NA	NA
<b>Soybean</b>	0.625	0.625	NA	NA
<b>Celtuce</b>	1.0	1.0	NA	7

<b>Fennel</b>	1.0	1.0	NA	7
<b>Kohlrabi</b>	<b>Soil:</b> 1.0 <b>Foliar:</b> 0.125	<b>Soil:</b> 1.0 <b>Foliar:</b> 0.5	<b>Soil:</b> NA <b>Foliar:</b> 14	7
<b>Leaf Petiole Vegetables, Crop Subgroup 22B</b> Celery, Rhubarb, Udo	1.0	1.0	NA	NA
<b>Stalk and Stem Vegetables, Crop Subgroup 22A</b> Asparagus, Aloe Vera	0.5	1.0	30	1
<b>Stone Fruits, Crop Group 12</b> Sweet Cherry Peach Plum	2.0	6.0	60	0
<b>Tobacco</b>	1.5	1.5	14	NA
<b>Tree Nuts, Crop Group 14-12</b> Almond Pecan	2.0	6.0	60	30
<b>Tropical and Subtropical Fruit: Medium to Large Fruit, Smooth Peel</b> Mango Papaya	1.5	3.0	90	1
<b>Tropical and Subtropical Fruit: Medium to Large Fruit, Rough or Hairy Peel</b> Atemoya Sugar apple	1.5	3.0	90	30
<b>Wasabi</b>	0.75	4.5	7	7

[ End of Optional Text]

Ridomil Gold<sup>®</sup>, the ALLIANCE FRAME, the Syngenta Logo, and the PURPOSE ICON are trademarks of a Syngenta Group Company

Viton<sup>™</sup> is a trademark of The Chemours Company FC, LLC

©20XX Syngenta

For non-emergency (e.g., current product information), call Syngenta Crop Protection at 1-800-334-9481.
--

Manufactured for:  
Syngenta Crop Protection, LLC  
P.O. Box 18300  
Greensboro, North Carolina 27419-8300

Mefenoxam 2E 1145 MAS 0507 AMEND-B 1021-CL - JVB - 05/11/2023  
000100-01145.20211015B.MEFENOXAM-2E.AMEND.OCT2021-CL.pdf