

70506-267

3/6/2014

1/15

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
WASHINGTON, D.C. 20460



OFFICE OF  
CHEMICAL SAFETY AND  
POLLUTION PREVENTION

MAR - 6 2014

United Phosphorous, Inc.  
c/o Ms. Leanne Pruett  
Pyxis Regulatory Consulting, Inc.  
4110 136<sup>th</sup> St. NW  
Gig Harbor, WA 98332

Subject: Amended label to add pollinator protection language  
Product Name: Hawk-I N/O 60WSP  
EPA Reg. No. 70506-267  
EPA Decision No. 487874  
Submission dated February 12, 2014; resubmission dated March 5, 2014

Dear Ms. Pruett:

The labeling referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide, and Rodenticide Act is acceptable. 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. See 40 CFR 156.10(a)(6).

Under 40 CFR 152.130(d), EPA may establish dates by which all product distributed or sold by the registrant must bear revised labeling. The following paragraphs set forth the schedule for ensuring that that your product bears revised labeling within a reasonable time period:

- Any product released for shipment after 2/28/14 must bear the new label.

If these conditions are not complied with, EPA will take appropriate action against this registration. If you have any questions please contact Julie Chao at 703-308-8735 or [chao.julie@epa.gov](mailto:chao.julie@epa.gov).

Regards,

A handwritten signature in black ink that reads "Venus Eagle".

Venus Eagle, Product Manager (01)  
Insecticide-Rodenticide Branch  
Registration Division (7505P)

2/15

Rev. [EPA Approval Date]

# Hawk-I™ N/O 60WSP

## Greenhouse and Nursery Insecticide

For foliar and systemic insect control on ornamental and vegetable plants in greenhouses, nurseries and interior plantscapes

**ACTIVE INGREDIENT:**

Imidacloprid: 1-[(6-Chloro-3-pyridinyl)methyl]-N-nitro-2-imidazolidinimine ..... 60.0%

**OTHER INGREDIENTS:** ..... 40.0%

**TOTAL:** ..... 100.0%

Keep water-soluble packets in this container and store in a cool dry place but not below freezing (32F).  
Do not remove packets from container except for immediate use.

### KEEP OUT OF REACH OF CHILDREN

### CAUTION

FIRST AID	
<b>If swallowed:</b>	<ul style="list-style-type: none"> <li>• Call a poison control center or doctor immediately for treatment advice.</li> <li>• Have person sip a glass of water if able to swallow.</li> <li>• Do not induce vomiting unless told to do so by the poison control center or doctor.</li> <li>• Do not 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 further treatment advice.</li> </ul>
<b>If on skin or clothing:</b>	<ul style="list-style-type: none"> <li>• Take off contaminated clothing.</li> <li>• Rinse skin immediately with plenty of water for 15-20 minutes.</li> <li>• Call a poison control center or doctor for treatment advice.</li> </ul>
<b>If in eyes:</b>	<ul style="list-style-type: none"> <li>• Hold eye open and rinse slowly and gently with water for 15-20 minutes.</li> <li>• Remove contact 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>
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. Contact the Rocky Mountain Poison Control Center at 1-866-673-6671 for emergency medical treatment information.	
NOTE TO PHYSICIAN	
No specific antidote is available. Treat the patient symptomatically.	

**FOR CHEMICAL EMERGENCY: Spill, leak, fire, exposure, or accident, call CHEMTREC at 1-800-424-9300**

**Net Weight:** \_\_\_\_\_ [oz.][lbs][grams]

United Phosphorus, Inc.  
630 Freedom Business Center, Suite 402  
King of Prussia, PA 19406  
1-800-438-6071

EPA Reg. No. 70506-267  
EPA Est. No.: \_\_\_\_\_

**ACCEPTED  
MAR - 6 2014**

**Under the Federal Insecticide, Fungicide,  
and Rodenticide Act, as amended, for the  
pesticide registered under:**

EPA. Reg. No: 70506-267

**PRECAUTIONARY STATEMENTS  
HAZARDS TO HUMANS AND DOMESTIC ANIMALS**

**CAUTION**

Harmful if swallowed, inhaled, or absorbed through skin. Causes eye irritation. Avoid contact with skin, eyes, or clothing. Avoid breathing dust or vapor.

**PERSONAL PROTECTIVE EQUIPMENT (PPE)**

**Applicators and other handlers must wear:**

- Long-sleeved shirt and long pants
- Chemical-resistant gloves made of any waterproof material such as barrier laminate, butyl rubber, nitrile rubber, neoprene rubber, natural rubber, polyethylene, polyvinylchloride (PVC) or viton
- Shoes plus socks

Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

**ENGINEERING CONTROLS STATEMENTS**

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.

**USER SAFETY RECOMMENDATIONS**

**Users should:**

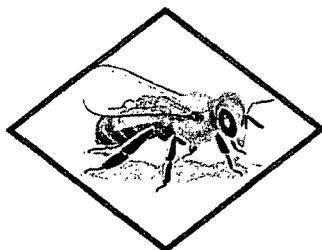
- Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

**ENVIRONMENTAL HAZARDS**

This product is highly toxic to aquatic invertebrates. Do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment washwaters.

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

**PROTECTION OF POLLINATORS**



**APPLICATION RESTRICTIONS EXIST FOR THIS PRODUCT BECAUSE OF RISK TO BEES AND OTHER INSECT POLLINATORS. FOLLOW APPLICATION RESTRICTIONS FOUND IN THE DIRECTIONS FOR USE TO PROTECT POLLINATORS.**



Look for the bee hazard icon in the Directions for Use for each application site for specific use restrictions and instructions to protect bees and other insect pollinators.

**This product can kill bees and other insect pollinators.**

Bees and other insect pollinators will forage on plants when they flower, shed pollen, or produce nectar.

Bees and other insect pollinators can be exposed to this pesticide from:

- Direct contact during foliar applications, or contact with residues on plant surfaces after foliar applications
- Ingestion of residues in nectar and pollen when the pesticide is applied as a seed treatment, soil, tree injection, as well as foliar applications.

When Using This Product Take Steps To:

- Minimize exposure of this product to bees and other insect pollinators when they are foraging on pollinator attractive plants around the application site.
- Minimize drift of this product on to beehives or to off-site pollinator attractive habitat. Drift of this product onto beehives or off-site to pollinator attractive habitat can result in bee kills.

Information on protecting bees and other insect pollinators may be found at the Pesticide Environmental Stewardship website at: <http://pesticidestewardship.org/PollinatorProtection/Pages/default.aspx>.

Pesticide incidents (for example, bee kills) should immediately be reported to the state/tribal lead agency. For contact information for your state, go to: [www.aapco.org/officials.html](http://www.aapco.org/officials.html). Pesticide incidents should also be reported to the National Pesticide Information Center at: [www.npic.orst.edu](http://www.npic.orst.edu) or directly to EPA at: [beekill@epa.gov](mailto:beekill@epa.gov).

This chemical demonstrates the properties and characteristics associated with chemicals detected in groundwater. The use of this chemical in areas where soils are permeable, particularly where the water table is shallow, may result in groundwater contamination.

#### PRODUCT INFORMATION

Hawk-I N/O 60WSP will control insects on ornamental and vegetable plants grown in nurseries, greenhouses and interior plantscapes. Hawk-I N/O 60WSP is a systemic insecticide applied as a soil treatment **only** and is translocated upward within the plant. For best results, Hawk-I N/O 60WSP must be applied where the roots of the target plants can absorb the active ingredient. After application, irrigate moderately but thoroughly being sure to avoid leaching and runoff from the container for at least three irrigations or 10 days whichever is longer.

#### Hawk-I N/O 60WSP Precautions and Restrictions:

- A foliar application of any chloronicotinyl insecticide for resistance management purposes following a Hawk-I N/O 60WSP soil application in the same crop is NOT recommended.
- Do NOT use Hawk-I N/O 60WSP packets in a tank mix with products that contain boron or release free chlorine; the PVA packet reacts with boron or free chlorine to produce a plastic that is not soluble in water. NOTE: Normal chlorinated water is acceptable for mixing.

**Insect Resistance:** Some insects are known to develop resistance to insecticides after repeated use. As with any insecticide, the use of this product should conform to resistance management strategies established for the use area. Consult your Cooperative Extension Service for resistance management strategies and recommended pest management practices for your area.

**Incorporation:** Applications of Hawk-I N/O 60WSP may be incorporated by cultivation, irrigation, rainfall, mechanical placement, soil injection, drenching and broadcast sprays.

**Woody Perennials:** Protection in woody perennials is slower than in herbaceous species and a delay of 2 or more weeks should be expected, with longer delays for larger plants. Because of this, applications to woody perennials should be made well in advance of expected insect activity.

**Bark Media:** Hawk-I N/O 60WSP treatments to media with 30 - 50% or more bark content may confer a shorter period of protection.

### DIRECTIONS FOR USE

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

See individual crops or use sites for specific pollinator application restrictions. If none exist under the specific crop or use-site, for outdoor foliar applications, follow these application directions for crops that are contracted to have pollinator services, or food/feed crops and commercially grown ornamentals that are attractive to pollinators, or non-agricultural use sites.



#### FOR CROPS UNDER CONTRACTED POLLINATION SERVICES

Do not apply this product while bees are foraging. Do not apply this product until flowering is complete and all petals have fallen unless the following condition has been met:

If an application must be made when managed bees are at the treatment site, the beekeeper providing the pollination services must be notified no less than 48-hours prior to the time of the planned application so that bees can be removed, covered or otherwise protected prior to spraying.



#### FOR FOOD/FEED CROPS AND COMMERCIALY GROWN ORNAMENTALS NOT UNDER CONTRACT FOR POLLINATION SERVICES BUT ARE ATTRACTIVE TO POLLINATORS

Do not apply this product while bees are foraging. Do not apply this product until flowering is complete and all petals have fallen unless one of the following conditions is met:

- The application is made to the target site after sunset
- The application is made to the target site when temperatures are below 55°F
- The application is made in accordance with a government-initiated public health response
- The application is made in accordance with an active state-administered apiary registry program where beekeepers are notified no less than 48-hours prior to the time of planned application so that the bees can be removed, covered or otherwise protected prior to spraying.
- The application is made due to an imminent threat of significant crop loss, and a documented determination consistent with an IPM plan or predetermined economic threshold is met. Every effort should be made to notify beekeepers no less than 48-hours prior to the time of the planned application so that the bees can be removed, covered or otherwise protected prior to spraying



#### NON-AGRICULTURAL USE SITES

Do not apply Hawk-I N/O 60WSP Insecticide while bees are foraging. Do not apply Hawk-I N/O 60WSP Insecticide to plants that are flowering. Only apply after all flower petals have fallen off.

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.

**AGRICULTURAL USE REQUIREMENTS**

Use this product only in accordance with its labeling and with the Worker Protection Standard(WPS), 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), and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted entry interval (REI) of 12 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 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, such as plants, soil, or water, is:

- Coveralls
- Chemical-resistant gloves made of any waterproof material such as barrier laminate, butyl rubber, neoprene rubber, natural rubber, polyethylene, polyvinylchloride (PVC) or viton
- Shoes plus socks

**NON-AGRICULTURAL USE REQUIREMENTS**

The requirements in this box apply to uses of this product that are NOT within the scope of the Worker Protection Standard for agricultural pesticides [40 CFR Part 170]. The WPS applies when this product is used to produce agricultural plants on farms, forests, nurseries, or greenhouses.

Keep children and pets off treated area until dry.

**APPLICATION THROUGH IRRIGATION SYSTEMS (CHEMIGATION)**

Hawk-I N/O 60WSP may be applied at rates specified on this label either alone or in tank mixture with other pesticides and chemicals registered for application through irrigation systems. The normal dilution ratio is 1:10 to 1:200, depending on the system. Always meter the product into the irrigation water during the first part of the irrigation cycle. The product may be mixed separately prior to injection. Agitation may be necessary if the mixture is allowed to stand more than 24 hours.

- 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.
- Apply Hawk-I N/O 60WSP only through micro-irrigation (individual spaghetti tube), drip irrigation, overhead irrigation, and ebb and flood or hand-held or motorized calibrated irrigation equipment. **Do not apply this product through any other type of irrigation system.** Crop injury or lack of effectiveness can result from non-uniform distribution of treated water.
- Be sure to remove scale, pesticide residue and other foreign matter from the tank and entire irrigation system prior to application.
- A person knowledgeable of the chemigation system and responsible for its operation, or a person who is under the supervision of the responsible person, shall shut the system down and make necessary adjustments should the need arise.
- If you have any questions about calibration, you should contact State Extension Service specialists, equipment manufacturers or other experts.

**SAFETY DEVICES FOR IRRIGATION SYSTEMS CONNECTED TO PUBLIC WATER SUPPLIES:**

If the source of water for your irrigation system is a public water supply, follow the instructions below.

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, backflow preventer (RPZ) or the functional equivalent in the water supply line upstream from the point of pesticide introduction. As an option to the RPZ, water from the public water system should 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 pump, such as 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.

**SAFETY DEVICES FOR IRRIGATION SYSTEMS NOT CONNECTED TO A PUBLIC WATER SUPPLY:**

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 the pesticide distribution is adversely affected.
6. Systems must use a metering pump such as 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.

**MIXING INSTRUCTIONS**

Within each foil pouch is a clear, water-soluble inner packet containing Hawk-I N/O 60WSP. To prepare the mixture, remove the outer foil pouch and drop the required number of unopened clear water soluble packets, as determined under "Irrigation, Drench and Soil Injection Applications", into the spray tank while filling with water to the desired level. Operate the agitator while mixing. Depending on the amount of agitation and the water temperature, the packets should be completely dissolved within a few minutes of being added to the water, with cooler water temperatures increasing the time needed for the inner packet to dissolve completely.

**Mixing Precautions and Restrictions:**

- Do NOT allow packets to become wet prior to adding to the tank.
- Do NOT handle the clean inner packets with wet hands or wet gloves.



APPLICATION INSTRUCTIONS			
Application Site	Rate	Pests Controlled	Application Instructions
Grassy areas of Field & Forest Nurseries	1 Packet per 2900-3850 sq. ft.	Larvae of: Annual bluegrass weevil Asiatic garden beetle Billbugs Black turfgrass ataeenius Cutworms (suppression only) European chafer Green June beetle Japanese beetle Northern masked chafer Oriental beetle <i>Phyllophaga</i> spp. Southern masked chafer	Make application prior to egg hatch of grubs, billbugs, and annual bluegrass-weevil for optimum control.  Apply prior to the hatching of the first instar nymphs for chinchbug suppression.  Apply prior to or during the peak egg hatch for mole cricket control.  When adults or large nymphs are present and actively tunneling, Hawk-I N/O 60WSP should be accompanied by a curative insecticide. Follow label instructions for other insecticides when tank mixing.
	1 Packet per 2900 sq. ft.	Chinch bugs (suppression only) Mole crickets	Consult your local turf, state Agricultural Experiment Station, or State Extension Service Specialist for more specific information regarding timing of application.

**APPLICATIONS FOR USE ON OR IN ORNAMENTALS**

For foliar and systemic insect control in and around field-grown nursery and containers stock, indoor and outdoor ornamentals (including both greenhouse and interior plantscapes) and ornamentals grown in flats, benches or beds.

**Restrictions:**

- Applications must NOT exceed a total of 10.7 oz (0.4 lb of active ingredient) per acre per year
- Do not apply this product, by any application method, to linden, basswood or other *Tilia* species in the State of Oregon.
- For broadcast applications, do not use less than 2 gallons of water per 1000 sq. ft. of treatment area



- Follow application restrictions on page [x] (note to reviewer – page number will be added to commercial label) to protect bees and other insect pollinators.

APPLICATION INSTRUCTIONS			
Application Site	Rate	Pests Controlled	Application Instructions
Trees (including non-bearing fruit and nut) Shrubs Evergreens Flowers Foliage plants Ground covers Interior plantscapes Vegetable plants*	1 Packet per 100 gallons water	Adelgids Aphids Japanese beetles (adults) Lacebugs Leaf beetles (including elm and viburnum leaf beetles) Leafhoppers (including glassy-winged sharpshooter) Leafminers Mealybugs Sawfly larvae Thrips (suppression) Whiteflies	For foliar application, begin treatments prior to the establishment of high pest populations and reapply on an as needed basis.  A Hawk-I N/O 60WSP foliar application is not recommended following a soil application in the same crop for resistance management purposes.
	1 Packet per 2900 - 3850 sq. ft.	White grub larvae (such as Japanese beetle, chafers, <i>Phyllophaga</i> spp., Asiatic garden beetle, Oriental beetle)	Broadcast Applications: Mix the required amount of Hawk-I N/O 60WSP in sufficient water to uniformly and accurately cover the area being treated. Do not use less than 2 gallons of water per 1000 sq. ft. of treatment area. Irrigate thoroughly to incorporate the product into the upper soil profile. Incorporate application into the soil before planting or apply after plants are established. For applications made to established plants, optimum control is attained if area is irrigated thoroughly after application. Apply prior to bloom or after all the petals have fallen off.
*Only for use on vegetable plants intended for resale including: Broccoli, Chinese broccoli, Broccoli raab, Brussels sprouts, Cabbage, Chinese Cabbage, Cauliflower, Collards, Eggplant, Ground cherry, Kale, Kohlrabi, Lettuce, Mustard greens, Pépinos, Peppers, Potatoes, Rape greens, Sorghum, Sugarbeets, Tomatillo, and Tomato.			

**IRRIGATION, DRENCH, AND SOIL INJECTION APPLICATIONS**

Hawk-I N/O 60WSP may be applied to ornamental and vegetable plants in greenhouses, nurseries and interior plantscapes using soil drenches, micro-irrigation, drip irrigation, overhead irrigation, ebb and flood irrigation, or hand-held or motorized calibrated irrigation equipment.

**Restrictions:**

- Do not graze treated areas or use clippings from treated areas for feed or forage.
- Do not apply to soils that are water logged or saturated, which will not allow the penetration of the insecticide into the root zone of the plants.
- Do not allow leachate runoff for the first 10 days after application, in order to retain the product and facilitate full plant uptake of the active ingredient.
- Do not apply more than 10.7 oz (0.4lb of active ingredient) per acre per year.
- On plants with a production cycle of less than one year, application is not to exceed a frequency of more than once each 16 weeks for a particular plant. On stock plants and woody crops with a production cycle of greater than one year, application may not exceed once a year.
- Do not apply this product, by any application method, to linden, basswood or other *Tilia* species in the State of Oregon.

**Food Crops:**

Treated areas may be replanted with any crop specified on an imidacloprid label, or with any crop for which a tolerance exists for the active ingredient.

11/15

A 12-month plant-back interval must be observed for crops not listed on an imidacloprid label or for crops for which no tolerances for the active ingredient have been established.

RATES AND INSTRUCTIONS FOR IRRIGATION AND DRENCH APPLICATIONS					
Application Site		Rate		Application Instructions	Pests Controlled
Plants in Containers	Herbaceous Species including Vegetables <sup>5</sup> (one or two plants per pot)	Container Size (inches)	# of pots treated with one (1) packet	Evenly distribute one (1) packet of Hawk-I N/O 60WSP in the stated number of pots, using sufficient water volume to wet potting medium without loss of liquid through leaching. Irrigate moderately after application. To avoid loss of active ingredient due to leaching, do NOT allow leaching or runoff to occur for 10 days after application.	Adelgids Aphids Armored Scale (suppression) Fungus gnat (larvae only) <sup>1</sup> Japanese beetles (adults) Lacebugs Leaf beetles (including elm and viburnum leaf beetles) Leafhoppers (including glassy-winged sharpshooter) Mealybugs Psyllids Root mealybugs <sup>2</sup> Root weevil complex (such as Black Vine Weevil, Apopka Weevil, Citrus Root Weevil) Soft scale Thrips (suppression) <sup>4</sup> White Grub Larvae (Such as Japanese beetle, Masked Chafers, European Chafer, Oriental Beetle, Asiatic Garden Beetle) Whiteflies
	Woody Perennial Species or Herbaceous Species including Vegetables <sup>5</sup> (three or more plants per pot)	2 3 4 5 6 7 8 9 10 11 12	3000 2000 1500 1200 1000 850 750 675 600 550 500		
Ornamental and Vegetable <sup>5</sup> plants grown in flats, benches, or beds		One packet per 3000 sq. ft. in sufficient water to uniformly and accurately cover the area being treated. Do NOT use less than 2 gallons of mixture per 1000 sq. ft.		Apply as a broadcast treatment and incorporate into the medium before planting or apply after plants are established. If application is made to established plants, optimum control will be attained if area is lightly irrigated after application. Apply prior to bloom or after all petals have fallen off. Do NOT allow leaching or runoff to occur for 10 days after application.	
Containerized Plants		Container Size (gallons)	# of pots treated with one (1) packet	For optimum control, make applications prior to egg hatch of the target pest. Apply in sufficient water to wet the potting medium. Irrigate moderately after application to move the active ingredient into the root zone.	
Field and Forest Nurseries		One (1) packet per 1000 ft of row or 3000 sq. ft. in a minimum spray volume of 2 gallons per 1000 square feet. In areas of turf, apply as a broadcast application using one (1) packet per 3000 sq. ft. in a minimum spray volume of 2 gallons per 1000 square feet.		Vegetation in the area to be treated should be mowed to a height of 3 inches or less prior to application. Mowing to the lowest possible height will ensure greater consistency of control. Apply May through July as a uniform band on either side of row using a band six (6) inches wider than the actual root ball diameter to be dug. Do not allow bands in adjacent rows to overlap. For optimum control, treatment should be followed by rainfall or irrigation.	White grub larvae (such as Japanese beetle, Masked chafers, European chafer, Oriental beetle, Asiatic garden beetle)

RATES AND INSTRUCTIONS FOR IRRIGATION AND DRENCH APPLICATIONS			
Application Site	Rate	Application Instructions	Pests Controlled
<sup>1</sup> Fungus Gnat larvae in the soil will be controlled by drench or incorporation; Hawk-I N/O 60WSP does not control adult Fungus Gnats. Other foliar insect control is achieved translocating the active ingredient up into the plant via the root system. <sup>2</sup> To control root mealybug, a thorough drenching of the containerized media is necessary. Use a rate of one (1) packet in 150 gallons of water and be sure to obtain complete coverage while minimizing the amount of leachate. <sup>3</sup> For control of citrus root weevil on non-bearing citrus nursery stock ONLY. <sup>4</sup> Thrips on foliage only are suppressed, not in buds and flowers. <sup>5</sup> <b>For use on vegetables plants intended for resale only</b> including: Broccoli, Chinese Broccoli, Broccoli Raab, Brussels Sprouts, Cabbage, Chinese Cabbage Cauliflower, Collards, Eggplant, Ground Cherry, Kale, Kohlrabi, Lettuce, Mustard Greens, Pepinos, Peppers, Potatoes, Rape Greens, Sorghum, Sugarbeets, Tomatillo and Tomato.			

RATES AND INSTRUCTIONS FOR SOIL INJECTION AND DRENCH APPLICATIONS FOR NURSERY, GREENHOUSE AND INTERIORESCAPE PLANTS			
Application Site	Rate	Application Instructions	Pests Controlled
<p>Trees</p> <p>NOTE: Application to trees already heavily infested may not prevent the eventual loss of the trees due to existing pest damage and tree stress.</p>	<p>1 Packet (20 grams) per 8 to 16 inches of cumulative trunk diameter</p>	<p><b>SOIL INJECTION – No Soil Injection Application allowed in Nassau or Suffolk counties of New York.</b></p> <p>GRID SYSTEM: Holes should be spaced on 2.5 ft centers, in a grid pattern, extending to the drip line of the tree.</p> <p>CIRCLE SYSTEM: Apply in holes evenly spaced in circles, (use more than one circle dependent upon the size of the tree) beneath the drip line of the tree extending in from that line.</p> <p>BASAL SYSTEM: Space injection holes evenly around the base of the tree trunk no more than 6 to 12 inches out from the base.</p> <p>Mix required dosage in sufficient water to inject an equal amount of solution in each hole. Maintain a low pressure and use sufficient solution for distribution of the liquid into the treatment zone. For optimum control, keep the treated area moist for 7 to 10 days. Do not use less than 4 holes per tree.</p> <p><b>SOIL DRENCH:</b> Remove plastic or any other barrier that will stop solution from reaching the root zone. Uniformly apply around the base of the tree, direct to the root zone as a drench in no less than 10 gallons of water per 1000 square feet.</p>	<p>Adelgids</p> <p>Aphids</p> <p>Armored Scale†</p> <p>Black vine weevil larvae</p> <p>Eucalyptus Longhorned Borers</p> <p>Flatheaded Borers (including bronze birch and alder borers)</p> <p>Japanese Beetles (adults)</p> <p>Lacebugs</p> <p>Leaf Beetles (including elm and viburnum leaf beetles)</p> <p>Leafhoppers (including glassy-winged sharpshooter)</p> <p>Leafminers</p> <p>Mealybugs</p> <p>Pine Tip Moth larvae</p> <p>Psyllids</p> <p>Royal Palm Bugs</p> <p>Sawfly larvae</p> <p>Soft Scales</p> <p>Thrips†</p> <p>White grub larvae</p> <p>Whiteflies</p>
<p>Shrubs</p>	<p>1 packet (20 grams) per 8 to 16 feet of cumulative shrub height</p>	<p><b>SOIL INJECTION – No Soil Injection Application allowed in Nassau or Suffolk counties of New York.</b></p> <p>Mix required dosage in sufficient water to inject an equal amount of solution in each hole. Using a minimum of 4 holes per shrub, apply to individual plants maintaining a low pressure and use sufficient solution for distribution of the liquid into the treatment zone.</p> <p>Keep the treated area moist for 7 to 10 days.</p>	<p>Pine Tip Moth larvae</p> <p>Psyllids</p> <p>Royal Palm Bugs</p> <p>Sawfly larvae</p> <p>Soft Scales</p> <p>Thrips†</p> <p>White grub larvae</p> <p>Whiteflies</p>

RATES AND INSTRUCTIONS FOR SOIL INJECTION AND DRENCH APPLICATIONS FOR NURSERY, GREENHOUSE AND INTERIORSCAPE PLANTS			
Application Site	Rate	Application Instructions	Pests Controlled
		SOIL DRENCH: Remove plastic or any other barrier that will stop solution from reaching the root zone. Uniformly apply around the base of the tree, direct to the root zone as a drench in no less than 10 gallons of water per 1000 square feet.	
Flowers and Ground Cover	1 packet (20 grams) per 3000 sq. ft.	Apply as a broadcast treatment and incorporate into the soil before planting or apply after plants are established. If application is made to established plants, optimum control will be attained if area is irrigated thoroughly after application. Apply prior to bloom or after all the petals have fallen off.	
† Suppression of these species only.			

### EBB AND FLOOD APPLICATIONS

Hawk-I N/O 60WSP insecticide may be applied through Ebb and Flood applications. To assure accurate uptake it is recommended that prior to treatment, a minimum of 10 plants be brought up to a known field capacity and allowed to dry out for one or two days. Re-wet these plants to determine how much water on average each plant will absorb to return it to field capacity.

**Restrictions:**

- Do not apply more than 10.7 oz (0.4lb of active ingredient) per acre per year.
- Do not apply this product, by any application method, to linden, basswood or other *Tilia* species in the State of Oregon.

RATES AND INSTRUCTIONS FOR EBB AND FLOOD APPLICATIONS						
Application Site		Rate		Application Instructions	Pests Controlled	
Plants in Containers	Herbaceous species including vegetable plants <sup>5</sup> (one or two plants per pot)	Container Size (inches)	# of pots treated with one (1) packet	To minimize the return back to the storage tank, keeping pot sizes uniform use the volume absorbed per plant (see test above) multiplied by the number of pots being treated. Add to this volume a required minimum to flood your smallest treatment area. Re-use the returned volume with subsequent irrigation or nutrients on the same plants.	Adelgids Aphids Armored scales (suppression) Fungus Gnats (larvae only) <sup>1</sup> Japanese Beetles (adults) Lacebugs Leaf beetles (including elm and viburnum leaf beetles) Leafhoppers (including glassy-winged sharpshooter) Leafminers Mealybugs Psyllids Root mealybugs <sup>2</sup> Root Weevil Complex: (such as Apopka Weevil, Black Vine Weevil, Citrus Root Weevil) <sup>3</sup> Soft Scales Thrips (suppression) <sup>4</sup> Whiteflies White Grub larvae (such as Japanese Beetle, Masked Chafers, European Chafer, Oriental Beetle, Asiatic Garden Beetle)	
		2	3000			
		3	2000			
		4	1500			
		5	1200			
		6	1000			
		7	850			
		8	750			
		9	675			
		10	600			
	Woody perennials, herbaceous species including vegetable plants <sup>5</sup> (3 or more per pot)	Container Size (inches)	# of pots treated with one (1) packet			
		2	2000			
		3	1350			
		4	1000			
		5	800			
		6	650			
		7	550			
		8	500			
		9	450			
		10	400			
<sup>1</sup> Fungus Gnat larvae in the soil will be controlled by drench or incorporation; Hawk-I N/O 60WSP does not control adult Fungus Gnats. Other foliar insect control is achieved translocating the active ingredient up into the plant via the root system. <sup>2</sup> To control root mealybug, a thorough drenching of the containerized media is necessary. Use a rate of one (1) packet in 150 gallons of water and be sure to obtain complete coverage while minimizing the amount of leachate. <sup>3</sup> For control of citrus root weevil on non-bearing citrus nursery stock ONLY. <sup>4</sup> Thrips on foliage only are suppressed, not in buds and flowers. <sup>5</sup> <b>For use on vegetables plants intended for resale only</b> including: Broccoli, Chinese Broccoli, Broccoli Raab, Brussels Sprouts, Cabbage, Chinese Cabbage, Cauliflower, Collards, Eggplant, Ground Cherry, Kale, Kohlrabi, Lettuce, Mustard Greens, Pepinos, Peppers, Potatoes, Rape Greens, Sorghum, Sugarbeets, Tomatillo and Tomato.						

### STORAGE AND DISPOSAL

Do not contaminate water, food, or feed by storage and disposal.

**PESTICIDE STORAGE:** Store in a cool, dry place and in such a manner as to prevent cross contamination with other pesticides, fertilizers, food, and feed. Store in original container and out of the reach of children, preferably in a locked storage area.

**PESTICIDE DISPOSAL:** Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

**CONTAINER HANDLING:** Nonrefillable Container. Do not reuse or refill this container. Offer for recycling, if available. Once all water-soluble packets are used according to label instructions, dispose of empty container in a sanitary landfill, by incineration or, if allowed by State and local authorities; by burning. If burned, stay out of smoke.

**IMPORTANT INFORMATION**  
**READ BEFORE USING PRODUCT**

**CONDITION 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 reflect the opinion of experts based on field use and tests, and 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 United Phosphorus, Inc. or Seller. Handling, storage, and use of the product by Buyer or User are beyond the control of United Phosphorus, Inc. and Seller. To the extent consistent with applicable law, all such risks shall be assumed by Buyer and User, and Buyer and User agree to hold United Phosphorus, Inc. and Seller harmless for any claims relating to such factors.

**TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, UNITED PHOSPHORUS, INC. AND SELLER MAKE NO WARRANTIES OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR PURPOSE NOR ANY OTHER EXPRESS OR IMPLIED WARRANTY EXCEPT AS STATED ON THIS LABEL.**

To the extent consistent with applicable law, United Phosphorus Inc. or Seller shall not be liable for any incidental, consequential or special damages resulting from the use or handling of this product. **THE EXCLUSIVE REMEDY OF THE USER OR BUYER, AND THE EXCLUSIVE LIABILITY OF UNITED PHOSPHORUS, INC. 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 UNITED PHOSPHORUS, INC. OR SELLER, THE REPLACEMENT OF THE PRODUCT.**

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

Hawk-I is a trademark of United Phosphorus, Inc.

Rev. [EPA Approval Date]