


524-579

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 <p>U.S. ENVIRONMENTAL PROTECTION AGENCY Office of Pesticide Programs Registration Division (7505C) 1200 Pennsylvania Ave., N.W. Washington, D.C. 20460</p> <p><b>NOTICE OF PESTICIDE:</b> <input checked="" type="checkbox"/> Registration <input type="checkbox"/> Reregistration</p> <p>(under FIFRA, as amended)</p>	<p><b>EPA Reg. Number:</b> 524-579</p>	<p><b>Date of Issuance:</b> JUN 20 2007</p>
	<p><b>Term of Issuance:</b> Conditional</p>	
	<p><b>Name of Pesticide Product:</b> Roundup PROMAX</p>	
<p><b>Name and Address of Registrant (include ZIP Code):</b> Monsanto Company 1300 "I" Street, NW, Suite 450 East Washington, DC 20602</p>		
<p><b>Note:</b> Changes in labeling differing in substance from that accepted in connection with this registration must be submitted to and accepted by the Registration Division prior to use of the label in commerce. In any correspondence on this product always refer to the above EPA registration number.</p>		
<p>On the basis of information furnished by the registrant, the above named pesticide is hereby registered/reregistered under the Federal Insecticide, Fungicide and Rodenticide Act.</p> <p>Registration is in no way to be construed as an endorsement or recommendation of this product by the Agency. In order to protect health and the environment, the Administrator, on his motion, may at any time suspend or cancel the registration of a pesticide in accordance with the Act. The acceptance of any name in connection with the registration of a product under this Act is not to be construed as giving the registrant a right to exclusive use of the name or to its use if it has been covered by others.</p> <p>This product is conditionally registered in accordance with FIFRA section 3(c)(7)(A) provided that you:</p> <ol style="list-style-type: none"> <li>1. Submit and/or cite all data required for registration/reregistration of your product when the Agency requires all registrants of similar products to submit such data.</li> <li>2. Add the phase, "EPA Registration No. 524-579" to your label before you release the product for shipment.</li> </ol>		
<p><b>Signature of Approving Official:</b>  James A. Tompkins, Product Manager (25) Herbicide Branch, Registration Division (7505P)</p>	<p><b>Date:</b> 6/20/07</p>	

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3. Submit one (1) copy of the revised final printed label for the record before you release the product for shipment.

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

A stamped copy of the label is enclosed for your records.

Enclosure

**MASTER LABEL FOR EPA REG. NO. 524-NEW****Registered Brand Names:*****Roundup PROMAX*****Table of Contents for Master Label**

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**Note to Reviewer:**

The label language is a subset of the 12/4/06 approved 524-539 label. There have been minor editorial changes to correct or clarify language but no change in the meaning or use sites. The three additional weeds have been approved on the 524-475 registration and added to this label with the appropriate conversion from IPA salt to k-salt to ensure the full spectrum of control. The adjusted rates in the perennial weeds and woody brush tables were made to exactly match the approved rates in the crop section. No data are required.

**[INSERT BRAND NAME]**

Herbicide

The complete broad-spectrum postemergence professional herbicide for non-crop, industrial, turf and ornamental weed control.

**Complete Directions for Use**

EPA Reg. No. 524-NEW

AVOID CONTACT OF HERBICIDE WITH FOLIAGE, GREEN STEMS, EXPOSED NON-WOODY ROOTS OR FRUIT OF CROPS, DESIRABLE PLANTS AND TREES, BECAUSE SEVERE INJURY OR DESTRUCTION IS LIKELY TO RESULT.

Read the entire label before using this product.

Use only according to label instructions.

Not all products recommended on this label are registered for use in California. Check the registration status of each product in California before using.

Read the **LIMIT OF WARRANTY AND LIABILITY** statement at the end of the label before buying or using. If terms are not acceptable, return at once unopened.

THIS IS AN END-USE PRODUCT. MONSANTO DOES NOT INTEND AND HAS NOT REGISTERED IT FOR REFORMULATION. SEE INDIVIDUAL CONTAINER LABEL FOR REPACKAGING LIMITATIONS.

**Refillable Container Label Statement**

THIS IS AN END-USE PRODUCT. MONSANTO DOES NOT INTEND AND HAS NOT REGISTERED IT FOR REFORMULATION. IT IS INTENDED THAT REPACKAGING BE ONLY IN ACCORDANCE WITH A MONSANTO REPACKAGING OR TOLL REPACKAGING AGREEMENT.

**Non-Refillable Container Label Statement:**

THIS IS AN END-USE PRODUCT. MONSANTO DOES NOT INTEND AND HAS NOT REGISTERED IT FOR REFORMULATION OR REPACKAGING

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#### 1.0 INGREDIENTS

##### ACTIVE INGREDIENT:

\*Glyphosate, N-(phosphonomethyl)glycine, in the form of its potassium salt ..... 48.7%

OTHER INGREDIENTS: ..... 51.3%  
100.0%

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\*Contains 660 grams per liter or 5.5 pounds per U.S. gallon of the active ingredient glyphosate, in the form of its potassium salt. Equivalent to 540 grams per liter or 4.5 pounds per U.S. gallon of the acid, glyphosate.

This product is protected by U.S. Patent No's. 5,668,085 and 6,365,551. Other patents pending. No license granted under any non-U.S. patent(s).

**2.0 IMPORTANT PHONE NUMBERS**

FOR PRODUCT INFORMATION OR ASSISTANCE IN USING THIS PRODUCT, CALL TOLL-FREE,

1-800-332-3111.

IN CASE OF AN EMERGENCY INVOLVING THIS PRODUCT, OR FOR MEDICAL ASSISTANCE, CALL COLLECT, DAY OR NIGHT,

(314)-694-4000.

**3.0 PRECAUTIONARY STATEMENTS**

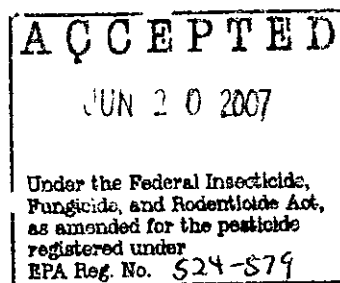
**3.1 Hazards to Humans and Domestic Animals**

Keep out of reach of children.

**CAUTION!**

CAUSES MODERATE EYE IRRITATION

Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist.



<b>FIRST AID:</b> Call a poison control center or doctor for treatment advice.	
<b>IF IN EYES</b>	<ul style="list-style-type: none"> <li>• Hold eye open and rinse slowly and gently with water for 15 to 20 minutes.</li> <li>• Remove contact lenses if present after the first 5 minutes then continue rinsing eye.</li> </ul>
<b>IF ON SKIN</b>	<ul style="list-style-type: none"> <li>• Take off contaminated clothing.</li> <li>• Rinse skin immediately with plenty of water for 15 to 20 minutes.</li> </ul>
<ul style="list-style-type: none"> <li>• Have the product container or label with you when calling a poison control center or doctor, or going for treatment.</li> <li>• You may also contact (314) 694-4000, collect day or night, for emergency medical treatment information.</li> <li>• This product is identified as [INSERT BRAND NAME], EPA Registration No. 524-NEW.</li> </ul>	

**DOMESTIC ANIMALS:** This product is considered to be relatively nontoxic to dogs and other domestic animals; however, ingestion of this product or large amounts of freshly sprayed vegetation may result in temporary gastrointestinal irritation (vomiting, diarrhea, colic, etc.). If such symptoms are observed, provide the animal with plenty of fluids to prevent dehydration. Call a veterinarian if symptoms persist for more than 24 hours.

**Personal Protective Equipment (PPE)**

Some of the materials that are chemical-resistant to this product are listed below. If you want more options, follow the instructions for Category A on an EPA chemical-resistance category selection chart.

**Applicators and other handlers must wear:** long-sleeved shirt and long pants, socks, shoes, and chemical-resistant gloves made of any waterproof material such as polyethylene or polyvinyl chloride.

*OR the following alternate PPE requirements may be substituted:*

**Mixers, Loaders, Other Handlers and Applicators, when handling this concentrated product or its application solutions of 30 percent concentration or greater, must wear:** long-sleeved shirt and long pants, shoes, socks and chemical-resistant gloves made of any waterproof material such as polyethylene or polyvinyl chloride.

**Applicators, when handling only spray solutions where concentration is 30 percent of this product or less, must wear:** long-sleeved shirt and long pants, shoes, and socks.

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

When handlers use closed systems, enclosed cabs, or aircraft in a manner that meets the requirements listed in 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.

### **3.2 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 cleaning equipment or disposing of equipment washwaters.

### **3.3 Physical or Chemical Hazards**

Spray solutions of this product should be mixed, stored and applied using only stainless steel, aluminum, fiberglass, plastic or plastic-lined steel containers.

**DO NOT MIX, STORE OR APPLY THIS PRODUCT OR SPRAY SOLUTIONS OF THIS PRODUCT IN GALVANIZED STEEL OR UNLINED STEEL (EXCEPT STAINLESS STEEL) CONTAINERS OR SPRAY TANKS.** This product or spray solutions of this product react with such containers and tanks to produce hydrogen gas which may form a highly combustible gas mixture. This gas mixture could flash or explode, causing serious personal injury, if ignited by open flame, spark, welder's torch, lighted cigarette or other ignition source.

### **DIRECTIONS FOR USE**

It is a violation of Federal law to use this product in any manner inconsistent with its labeling. This product can only be used in accordance with the Directions for Use on this label or in separately published Monsanto supplemental labeling. Supplemental labeling can be found on the Internet at [www.cdms.net](http://www.cdms.net) or [www.greenbook.net](http://www.greenbook.net), or obtained from your Authorized Monsanto Retailer or Monsanto Company Representative.

**The following paragraph is reserved and will only appear on final printed labeling for products under this registration if and when required by EPA:**

**ENDANGERED SPECIES PROTECTION REQUIREMENTS:** This product may have effects on federally listed threatened or endangered species or their critical habitat in some locations. When using this product, you must follow the measures contained in the Endangered Species Protection Bulletin for the county or parish in which you are applying the pesticide. To determine

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whether your county or parish has a Bulletin, and to obtain that Bulletin, consult <http://www.epa.gov/espp/>, or call 1-800-447-3813 no more than 6 months before using this product. Applicators must use Bulletins that are in effect in the month in which the pesticide will be applied. New Bulletins will generally be available from the above sources 6 months prior to their effective dates.

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 regulations.

#### 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) 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 4 hours.

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, shoes plus socks and chemical-resistant gloves made of any waterproof material.

#### 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 people and pets off treated areas until spray solution has dried.

#### 4.0 STORAGE AND DISPOSAL

Do not contaminate water, foodstuffs, feed or seed by storage or disposal.

**PESTICIDE STORAGE:** Keep container closed to prevent spills and contamination.

**PESTICIDE DISPOSAL:** Wastes resulting from the use of this product that cannot be used or chemically reprocessed should be disposed of in a landfill approved for pesticide disposal or in accordance with applicable Federal, state, or local procedures.

**CONTAINER DISPOSAL:** Emptied container retains vapor and product residue. Observe all labeled safeguards until container is cleaned, reconditioned, or destroyed.

[See container label for additional CONTAINER DISPOSAL instructions.]

#### [CONTAINER LABEL DISPOSAL STATEMENTS]

#### [FOR PLASTIC ONE-WAY CONTAINERS & BOTTLES]

Do not reuse container. Triple rinse the container, then puncture and place into a pesticide container recycling program, if available, or dispose of in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke



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[FOR ONE-WAY PLASTIC DRUMS]

Do not reuse container. Return container per the Monsanto container return program. If not returned, triple rinse the container, then puncture and place into a pesticide container recycling program, if available, or dispose of in a sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

[FOR METAL CONTAINERS (non-aerosol)]

Triple rinse the container (or equivalent), then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

[FOR REFILLABLE PORTABLE (MINI-BULK) CONTAINERS]

This container must only be refilled with pesticide product. **Do not reuse this container for any other purpose.**

Final disposal must be in compliance with State and local regulations. If not refilled, returned or recycled, triple rinse or pressure rinse, puncture and dispose of in a sanitary landfill or by incineration, or if allowed by State and local authorities, by burning. If burned, stay out of smoke.

Do not transport this container if it is damaged or leaking. If this container is damaged, leaking or obsolete, or to obtain information about recycling portable refillable containers, contact Monsanto Company at 1-800-ROUNDUP (1-800-768-6387).

**Users:** When this container is empty, replace the cap and seal all openings that have been made during usage, and return the container to the point of purchase, or to an alternate location designated by the manufacturer at the time of purchase of this product. If not returned, triple rinse or pressure rinse the empty container and offer it for recycling, if available.

**Refillers:** Do not reuse this min-bulk container except for refill in accordance with a valid Monsanto Agreement for Repackaging and Toll Repackaging. Prior to refilling, inspect carefully for damage such as cracks, punctures, abrasions, worn-out threads and closure devices. Check for leaks after refilling and before transporting.

[FOR REFILLABLE STATIONARY BULK CONTAINERS]

This container must only be refilled with pesticide product. **Do not reuse this container for any other purpose.**

Prior to refilling, inspect carefully for damage such as cracks, punctures, abrasions, worn-out threads and closure devices.

Final disposal must be in compliance with State and local regulations. If not refilled, triple rinse or pressure rinse this container and offer for recycling or reconditioning, if possible. If burned, stay out of smoke.

## 5.0 GENERAL INFORMATION

### (How this product works)

**Product Description:** This product is a postemergence, systemic herbicide with no soil residual activity. It gives broad-spectrum control of many annual weeds, perennial weeds, woody brush and trees. It is formulated as a water-soluble liquid containing surfactant and no additional surfactant is needed or recommended.

**Time to Symptoms:** This product moves through the plant from the point of foliage contact to and into the root system. Visible effects are a gradual wilting and yellowing of the plant, which advances to complete browning of aboveground growth and deterioration of underground plant

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parts. Effects are visible on most annual weeds within 2 to 4 days, but on most perennial weeds, effects may not be visible for 7 days or more. Extremely cool or cloudy weather following treatment may slow activity of this product and delay development of visual symptoms.

**Stage of Weeds:** Annual weeds are easiest to control when they are small. Best control of most perennial weeds is obtained when treatment is made at late growth stages approaching maturity.

**Mode of Action in Plants:** The active ingredient in this product inhibits an enzyme found only in plants and microorganisms that is essential to the formation of specific amino acids.

**Cultural Considerations:** Reduced control may result when applications are made to annual or perennial weeds that have been mowed, grazed or cut, and have not been allowed to regrow to the recommended stage for treatment.

**Rainfastness:** Heavy rainfall soon after application may wash this product off of the foliage and a repeat application may be required for adequate control.

**No Soil Activity:** Weeds must be emerged at the time of application to be controlled by this product. Weeds germinating from seed after application will not be controlled. Unemerged plants arising from unattached underground rhizomes or rootstocks of perennials will not be affected by this herbicide and will continue to grow.

**Maximum Application Rates:** The maximum application or use rates stated throughout this label are given in units of volume (fluid ounces or quarts) of this product per acre. However, the maximum allowed application rates apply to this product combined with the use of any and all other herbicides containing the active ingredient glyphosate, whether applied separately or as tank mixtures, on a basis of total pounds of glyphosate (acid equivalents) per acre. If more than one glyphosate-containing product is applied to the same site within the same year, you must ensure that the total use of glyphosate (pounds acid equivalents) does not exceed the maximum allowed. See the "INGREDIENTS" section of this label for necessary product information.

#### ATTENTION

AVOID CONTACT OF HERBICIDE WITH FOLIAGE, GREEN STEMS, EXPOSED NON-WOODY ROOTS OR FRUIT OF CROPS, DESIRABLE PLANTS AND TREES, BECAUSE SEVERE INJURY OR DESTRUCTION MAY RESULT.

AVOID DRIFT. EXTREME CARE MUST BE USED WHEN APPLYING THIS PRODUCT TO PREVENT INJURY TO DESIRABLE PLANTS AND CROPS.

Do not allow the herbicide solution to mist, drip, drift or splash onto desirable vegetation since minute quantities of this product can cause severe damage or destruction to the crop, plants or other areas on which treatment was not intended. The likelihood of injury occurring from the use of this product increases when winds are gusty, as wind velocity increases, when wind direction is constantly changing or when there are other meteorological conditions that favor spray drift. When spraying, avoid combinations of pressure and nozzle type that will result in splatter or fine particles (mist) that are likely to drift. AVOID APPLYING AT EXCESSIVE SPEED OR PRESSURE.

**NOTE:** Use of this product in any manner not consistent with this label may result in injury to persons, animals or crops, or other have unintended consequences.

#### 5.1 Weed Resistance Management

GROUP	9	HERBICIDE
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Glyphosate, the active ingredient in this product, is a Group 9 herbicide based on the mode of action classification system of the Weed Science Society of America. Any weed population may contain plants naturally resistant to Group 9 herbicides. Weed species resistant to Group 9

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herbicides may be effectively managed utilizing another herbicide from a different Group or using other cultural or mechanical practices.

To minimize the occurrence of glyphosate-resistant biotypes observe the following general weed management recommendations:

- Scout your application site before and after herbicides applications.
- Control weeds early when they are relatively small.
- Incorporate other herbicides and cultural or mechanical practices as part of your weed control system where appropriate.
- Utilize the recommended label rate for the most difficult weed in the site. Avoid tank-mixtures with other herbicides that reduce this product's efficacy (through antagonism) or tank mixture recommendations which encourage rates of this product below the label recommendations.
- Control weed escapes and prevent weeds from setting seeds.
- Clean equipment before moving from site to site to minimize spread of weed seed.
- Use new commercial seed as free of weed seed as possible.
- Report any incidence of repeated non-performance of this product on a particular weed to your Monsanto representative, local retailer, or county extension agent.

## 5.2 Management Recommendations for Glyphosate Resistant Weed Biotypes

**NOTE:** Appropriate testing is critical in order to confirm weed resistance to glyphosate. Contact your Monsanto representative to determine if resistance has been confirmed to any particular weed biotype in your area. Control recommendations for biotypes confirmed as resistant to glyphosate are made available on separately published supplemental labeling or fact sheets for this product and may be obtained from your local retailer or Monsanto representative.

Since the occurrence of new glyphosate resistant weeds cannot be determined until after product use and scientific confirmation, Monsanto Company is not responsible for any losses that may result from the failure of this product to control glyphosate-resistant weed biotypes.

The following good weed management practices are recommended to reduce the spread of confirmed glyphosate resistant biotypes:

- If a naturally occurring resistant biotype is present at your site, this product may be tank-mixed or applied sequentially with an appropriately labeled herbicide with a different mode of action to achieve control.
- Cultural and mechanical control practices may also be used as appropriate.
- Scout treated sites after herbicide applications and control escapes of resistant biotypes before they set seed.
- Thoroughly clean equipment before leaving sites known to contain resistant biotypes.

## 6.0 MIXING

Spray solutions of this product should be mixed, stored and applied using only clean stainless steel, aluminum, fiberglass, plastic or plastic-lined steel containers. Clean sprayer parts immediately after using this product by thoroughly flushing with water.

Use caution to avoid siphoning back into the carrier source. Use approved anti-back-siphoning devices where required by State or local regulations.

### 6.1 Mixing with Water

**NOTE:** PRODUCT PERFORMANCE MAY BE SIGNIFICANTLY REDUCED IF WATER CONTAINING SOIL SEDIMENT IS USED AS CARRIER. DO NOT MIX THIS PRODUCT WITH WATER FROM PONDS AND DITCHES THAT IS VISIBLY MUDDY OR MURKY.

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This product mixes readily with water. Mix spray solutions of this product as follows: Begin filling the mixing tank or spray tank with clean water. Add the recommended amount of this product near the end of the filling process and mix gently. During mixing and application, foaming of the spray solution may occur. To prevent or minimize foaming, mix gently, terminate by-pass and return lines at the bottom of the tank and, if necessary, use an anti-foam or defoaming agent.

**6.2 Tank Mixing**

This product does not provide residual weed control. This product may be tank-mixed with other herbicides to provide residual weed control, a broader weed control spectrum or an alternate mode of action. Read and carefully observe the cautionary statements and all other information appearing on the labels of all herbicides used. Use according to the most restrictive label directions for each product in the mixture.

When this label recommends a tank mixture with a generic active ingredient such as diuron, atrazine, 2,4-D, or dicamba the user is responsible for ensuring that the specific application being made is included on the label of the specific product being used in the tank mixture. Refer to all individual product labels, supplemental labeling and fact sheets for all products in the tank mixture, and observe all precautions and limitations on the label, including application timing restrictions, soil restrictions and use according to the most restrictive precautionary statements for each product in the tank mixture.

Always predetermine the compatibility of all tank-mix products together in the carrier by mixing small proportional quantities in advance.

Buyer and all users are responsible for all loss or damage in connection with the use or handling of mixtures of this product with herbicides or other materials that are not expressly recommended in this label. Mixing this product with herbicides or other materials not recommended on this label may result in reduced performance.

**6.3 Tank-Mixing Procedure**

When tank mixing, read and carefully observe label directions, cautionary statements and all information on the labels of all products used. Add the tank-mix product to the tank as directed by the label. Maintain agitation and add the recommended amount of this product.

Maintain good agitation at all times until the contents of the tank are sprayed. If the spray mixture is allowed to settle, thorough agitation may be required to resuspend the mixture before spraying is resumed.

Keep by-pass line on or near the bottom of the tank to minimize foaming. Screen size in nozzle or line strainers should be no finer than 50-mesh.

Always predetermine the compatibility of labeled tank mixtures of this product with water carrier by mixing small proportional quantities in advance. Ensure that the specific tank mixture product is registered for application at the desired site.

Refer to the "Tank Mixing" and **GENERAL INFORMATION** sections for additional precautions.

**6.4 Mixing for Hand-Held Sprayers**

Prepare the desired spray volume by mixing the amount of this product indicated in the following table in water:

Desired Volume	Amount of [INSERT BRAND NAME]					
	0.4%	0.7%	1%	1.5%	4%	7%
1 gal	0.5 oz	1 oz	1.3 oz	2 oz	5 oz	9 oz

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25 gal	0.8 pt	0.7 qt	1 qt	1.5 qt	4 qt	7 qt
100 gal	1.6 qt	2.8 qt	1 gal	1.5 gal	4 gal	7 gal

2 tablespoons = 1 fluid ounce

For use in backpack, knapsack or pump-up sprayers, it is recommended that the appropriate amount of this product be mixed with water in a larger container and then filling sprayer with the mixed solution.

### 6.5 Colorants or Dyes

Colorants or marking dyes may be added to spray solutions of this product; however, they can reduce product performance, especially at lower rates or dilution. Use colorants or dyes according to the manufacturer's recommendations.

### 7.0 APPLICATION EQUIPMENT AND TECHNIQUES

Do not apply this product through any type of irrigation system.

APPLY SPRAY SOLUTIONS IN PROPERLY MAINTAINED AND CALIBRATED EQUIPMENT CAPABLE OF DELIVERING DESIRED VOLUMES.

#### 7.1 Aerial Equipment

DO NOT APPLY THIS PRODUCT USING AERIAL SPRAY EQUIPMENT EXCEPT UNDER CONDITIONS AS SPECIFIED WITHIN THIS LABEL.

FOR AERIAL APPLICATION IN CALIFORNIA, REFER TO THE FEDERAL SUPPLEMENTAL LABEL FOR AERIAL APPLICATIONS IN THAT STATE FOR SPECIFIC INSTRUCTIONS, RESTRICTIONS AND REQUIREMENTS.

AVOID DRIFT. DO NOT APPLY WHEN WINDS ARE GUSTY OR UNDER ANY OTHER CONDITION WHICH FAVORS DRIFT. DRIFT MAY CAUSE DAMAGE TO ANY VEGETATION CONTACTED TO WHICH TREATMENT IS NOT INTENDED. TO PREVENT INJURY TO ADJACENT DESIRABLE VEGETATION, APPROPRIATE BUFFER ZONES MUST BE MAINTAINED.

Avoid direct application to any body of water.

Use the recommended rates of this herbicide in 3 to 25 gallons of water per acre unless otherwise specified on this label, or in separate supplemental labeling or fact sheets published by Monsanto for this product.

Coarse sprays are less likely to drift; therefore, do not use nozzles or nozzle configurations that dispense spray as fine spray droplets. Do not angle nozzles forward into the airstream and do not increase spray volume by increasing nozzle pressure. Drift control additives may be used. When a drift control additive is used, read and carefully observe the cautionary statements and all other information appearing on the additive label.

Ensure uniform application. To avoid streaked, uneven or overlapped application, use appropriate marking devices.

**Aircraft Maintenance;** Thoroughly wash aircraft, especially landing gear, after each day of spraying to remove residues of this product accumulated during spraying or from spills. PROLONGED EXPOSURE OF THIS PRODUCT TO UNCOATED STEEL SURFACES MAY RESULT IN CORROSION AND POSSIBLE FAILURE OF THE PART. LANDING GEAR IS MOST SUSCEPTIBLE. Maintaining an organic coating (paint) that meets aerospace specification MIL-C-38413 may prevent corrosion.

### SPRAY DRIFT MANAGEMENT

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**AVOID DRIFT. EXTREME CARE MUST BE USED WHEN APPLYING THIS PRODUCT TO PREVENT INJURY TO DESIRABLE PLANTS AND CROPS.**

Do not allow the herbicide solution to mist, drip, drift or splash onto desirable vegetation since minute quantities of this product can cause severe damage or destruction to the crop, plants or other areas on which treatment was not intended.

Avoiding spray drift at the application site is the responsibility of the applicator. The interaction of many equipment- and weather-related factors determines the potential for spray drift. The applicator and the grower are responsible for considering all these factors when making decisions.

### **AERIAL SPRAY DRIFT MANAGEMENT**

The following drift management requirements must be followed to avoid off-target drift movement from aerial application.

1. The distance of the outermost nozzles on the boom must not exceed 3/4 the length of the wingspan or rotor.
2. Nozzles must always point backward, parallel with the air stream and never be pointed downwards more than 45 degrees. Where states have more stringent regulations, they should be observed.

#### **Importance of Droplet Size**

The most effective way to reduce drift potential is to apply large droplets. The best drift management strategy is to apply the largest droplets that provide sufficient coverage and control. Applying larger droplets reduces drift potential, but will not prevent drift if applications are made improperly, or under unfavorable environmental conditions (see the "Wind", "Temperature and Humidity", and "Temperature Inversion" sections of this label).

#### **Controlling Droplet Size**

- **Volume:** Use high flow rate nozzles to apply the highest practical spray volume. Nozzles with the higher rated flows produce larger droplets.
- **Pressure:** Use the lower spray pressures recommended for the nozzle. Higher pressure reduces droplet size and does not improve canopy penetration. When higher flow rates are needed, use higher flow rate nozzles instead of increasing pressure.
- **Number of nozzles:** Use the minimum number of nozzles that provide uniform coverage.
- **Nozzle orientation:** Orienting nozzles so that the spray is released backwards, parallel to the air stream, will produce larger droplets than other orientations. Significant deflection from the horizontal will reduce droplet size and increase drift potential.
- **Nozzle type:** Use a nozzle type that is designed for the intended application. With most nozzle types, narrower spray angles produce larger droplets. Consider using low-drift nozzles. Solid stream nozzles oriented straight back produce larger droplets than other nozzle types.
- **Boom length:** For some use patterns, reducing the effective boom length to less than 3/4 of the wingspan or rotor length may further reduce drift without reducing swath width.
- **Application height:** Applications should not be made at a height greater than 10 feet above the top of the largest plants unless a greater height is required for aircraft safety. Making applications at the lowest height that is safe reduces the exposure of the droplets to evaporation and wind.

#### **Swath Adjustment**

When applications are made with a crosswind, the swath will be displaced downwind. Therefore, on the up and downwind edges of the field, the applicator must compensate for this displacement

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by adjusting the path of the aircraft upwind. Swath adjustment distance should increase, with increasing drift potential (higher wind speed, smaller droplets, etc.).

#### **Wind**

Drift potential is lowest between wind speeds of 2 to 10 miles per hour. However, many factors, including droplet size and equipment type determine drift potential at any given speed. Application should be avoided below 2 miles per hour due to variable wind direction and high inversion potential. **NOTE:** Local terrain can influence wind patterns. Every applicator should be familiar with local wind patterns and how they affect drift.

#### **Temperature and Humidity**

When making applications in low relative humidity, set up equipment to produce larger droplets to compensate for evaporation. Droplet evaporation is most severe when conditions are both hot and dry.

#### **Temperature Inversions**

Applications should not be made during a temperature inversion because drift potential is high. Temperature inversions restrict vertical air mixing, which causes small, suspended droplets to remain in a concentrated cloud. This cloud can move in unpredictable directions due to the light variable winds common during inversions. Temperature inversions are characterized by increasing temperatures with altitude and are common on nights with limited cloud cover and light to no wind. They begin to form as the sunsets and often continue into the morning. Their presence can be indicated by ground fog; however, if fog is not present, the movement of smoke from a ground source or an aircraft smoke generator can also identify temperature inversions. 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.

#### **Sensitive Areas**

Apply this product when the potential for drift to adjacent sensitive areas (e.g., residential areas, bodies of water, known habitat for threatened or endangered species, non-target crops) is minimal (e.g., when wind is blowing away from the sensitive areas).

#### **7.2 Ground Broadcast Equipment**

Apply the recommended rates of this product in 3 to 40 gallons of water per acre as a broadcast spray unless otherwise specified on this label, or in separate supplemental labeling or fact sheets published by Monsanto for this product. As density of weeds increases, spray volume should be increased within the recommended range to ensure complete coverage. Carefully select proper nozzles to avoid spraying a fine mist. For best results with ground application equipment, use flat-fan nozzles. Check spray pattern for uniform distribution of spray droplets.

#### **7.3 Hand-Held or Backpack Equipment**

Apply to foliage of vegetation to be controlled. For applications made on a spray-to-wet basis, spray coverage should be uniform and complete. Use coarse sprays only.

For low-volume directed spray applications, spray coverage should be uniform with at least 50 percent of the foliage contacted. Coverage of the top one-half of the plant is important for best results. To ensure adequate spray coverage, spray both sides of large or tall woody brush and trees, when foliage is thick and dense, or where there are multiple sprouts.

#### **7.4 Selective Equipment**

This product may be diluted in water and applied through shielded applicators, hooded sprayers, wiper applicators or sponge bars to weeds listed on this label growing in any non-crop site specified on this label.

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**AVOID CONTACT OF HERBICIDE WITH DESIRABLE VEGETATION, AS SERIOUS INJURY OR DEATH OF THE DESIRABLE VEGETATION IS LIKELY TO OCCUR.**

Application equipment used above desired vegetation should be adjusted so that the lowest spray stream or wiper contact point is at least 2 inches above the desirable vegetation. Droplets, mist, foam or splatter of the herbicide solution settling on desirable vegetation is likely to result in discoloration, stunting or destruction.

Better results may be obtained when more of the weed is exposed to the herbicide solution. Weeds not contacted by the herbicide solution will not be affected. This may occur in dense clumps, severe infestations or when the height of the weeds varies so that not all weeds are contacted. In these instances, repeat treatment may be necessary.

#### **Shielded and Hooded Applicators**

A shielded or hooded applicator directs the herbicide solution onto weeds, while shielding desirable vegetation from the herbicide. Use nozzles that provide uniform coverage within the treated area. Keep shields on these sprayers adjusted to protect desirable vegetation. **EXTREME CARE MUST BE EXERCISED TO AVOID CONTACT OF HERBICIDE WITH DESIRABLE VEGETATION.**

#### **Wiper Applicators**

Wiper applicators are devices that physically wipe the appropriate amounts of this product directly onto the weed. Equipment must be designed, maintained and operated to prevent the herbicide solution from contacting desirable vegetations.

Application equipment used over the top of desirable vegetation should be adjusted so that the wiper contact point is at least 2 inches above the desirable vegetation. Better results may be obtained when more of the weed is exposed to the herbicide solution. Weeds should be a minimum of 6 inches above the desirable vegetation. Adjust the height of the applicator to ensure adequate contact with weeds. Weeds not contacted by the herbicide solution will not be affected. Poor contact may occur when weeds are growing in dense clumps, in severe weed infestations or when weed height varies dramatically. In these instances, repeat treatments may be necessary.

Operate this equipment at ground speeds no greater than 5 miles per hour. Performance may be improved by reducing speed in areas of heavy weed infestations to provide adequate wiper saturation with the herbicide solution. Better results may be obtained when two applications are made in opposite directions.

Droplets, mist, foam or splatter of the herbicide solution settling onto desirable vegetation may result in discoloration, stunting or destruction. Avoid leakage or dripping onto desirable vegetation. Keep wiping surfaces clean. Be aware that on sloping ground the herbicide solution may migrate, causing dripping on the lower end and drying of the wicks on the upper end of the wiper applicator.

Do not use wiper applicators when weeds are wet.

Mix only the amount of this product to be used during a 1-day period, as reduced product performance may result from the use of solutions held in storage. Clean wiper parts immediately after using this product by thoroughly flushing with water.

**For Rope or Sponge Wick Applicators**—Solutions ranging from 25 to 70 percent of this product in water may be used.

**For Panel Applicators and pressure-feed systems**—Solutions ranging from 25 to 100 percent of this product in water may be used.

When applied as recommended, this product **CONTROLS** the following weeds:

Corn, volunteer

Sicklepod



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Panicum, Texas	Spanishneedles
Rye, common	Starbur, bristly
Shattercane	

When applied as recommended, this product SUPPRESSES the following weeds:

Beggarweed, Florida	Ragweed, common
Bermudagrass	Ragweed, giant
Dogbane, hemp	Smutgrass
Dogfennel	Sunflower
Guineagrass	Thistle, Canada
Johnsongrass	Thistle, musk
Milkweed	Vaseygrass
Nightshade, silverleaf	Velvetleaf
Pigweed, redroot	

### 7.5 Injection Systems

This product may be used in aerial or ground injection spray systems. It may be used as a liquid concentrate or diluted prior to injecting into the spray stream. Do not mix this product with the undiluted concentrate of other products when using injection systems unless specifically recommended.

### 7.6 CDA Equipment

The rate of this product applied per acre by controlled droplet application (CDA) equipment must not be less than the amount recommended in this label when applied by conventional broadcast equipment. For vehicle-mounted CDA equipment, apply 2 to 15 gallons of water per acre.

CDA equipment produces a spray pattern that is not easily visible. Extreme care must be exercised to avoid spray or drift contacting the foliage or any other green tissue of desirable vegetation, as damage or destruction is likely to result.

### 8.0 SITE AND USE RECOMMENDATIONS

This product may be used in areas such as airports, apartment complexes, Christmas tree farms, commercial sites, Conservation Reserve Program (CRP) area, ditch banks, driveways, dry ditches, dry canals, fencerows, golf courses, greenhouses, industrial sites, landscape areas, lumber yards, manufacturing sites, municipal sites, natural areas, office complexes, ornamentals, parks, parking areas, pastures, petroleum tank farms and pumping installations, plant nurseries, public areas, srailroads, rangeland, recreation areas, residential areas, rights-of-way, roadsides, schools, shadehouses, sod or turf seed farms, sports complexes, storage areas, substations, turfgrass areas, utility sites, warehouse areas and wildlife management areas.

Unless otherwise specified, applications may be made to control any weeds listed in the **WEEDS CONTROLLED** section of this label.

### 8.1 Cut Stump

Cut stump treatments may be made on any site listed on this label. This product will control many types of woody brush and tree species, some of which are listed below. Apply this product using suitable equipment to ensure coverage of the entire cambium. Cut trees or resprouts close to the soil surface. Apply a 50- to 100- percent solution of this product to the freshly cut surface **immediately after cutting**. Delays in application may result in reduced performance. For best results, applications should be made during periods of active growth and full leaf expansion.

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Alder	Reed, giant
Eucalyptus	Saltcedar
Madrone	Sweetgum
Oak	Tan oak
Pepper, Brazilian	Willow
Pine, Austrian	

DO NOT MAKE CUT STUMP APPLICATIONS WHEN THE ROOTS OF DESIRABLE WOODY BRUSH OR TREES MAY BE GRAFTED TO THE ROOTS OF THE CUT STUMP. Some sprouts, stems, or trees may share the same root system. Adjacent trees having a similar age, height and spacing may signal shared roots. Whether grafted or shared, injury is likely to occur to non-treated stems/trees when one or more trees sharing common roots are treated.

## 8.2 Forestry Site Preparation

This product is recommended for the control or partial control of woody brush, trees and herbaceous weeds in forestry. This product is also recommended for use in preparing or establishing wildlife openings within these sites and maintaining logging roads.

This product is recommended for use in site preparation prior to planting any tree species, including Christmas trees, eucalyptus, hybrid tree cultivars and silvicultural nursery sites.

Use higher rates of this product within the recommended range for control or partial control of woody brush, trees and hard-to-control perennial herbaceous weeds. For best results, apply to actively growing woody brush and trees after full leaf expansion and before fall color and leaf drop. Increase rates within the recommended range for control of perennial herbaceous weeds any time after emergence and before seedheads, flowers or berries appear.

Use the lower rates of this product within the recommended range for control of annual herbaceous weeds and actively growing perennial herbaceous weeds after seedheads, flowers or berries appear. Apply to the foliage of actively growing annual herbaceous weeds any time after emergence.

**TANK MIXTURES:** Tank mixtures of this product may be used to increase the spectrum of vegetation controlled. When tank mixing, read and carefully observe the label claims, cautionary statements and all information on the labels of all products used. Use according to the most restrictive precautionary statements for each product in the mixture.

**NOTE:** For forestry site preparation, make sure the tank-mix product is approved for use prior to planting the desired species. Observe planting interval restrictions.

Any recommended rate of this product may be used in a tank mix with the following products for forestry site preparation.

Arsenal Applicators Concentrate

Chopper

Escort or Escort XP

Garlon 3A

Garlon 4A

Landmark XP

Oust or Oust XP

Westar

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For control of herbaceous weeds, use the lower recommended tank mixture rates. For control of dense stands or tough-to-control woody brush and trees, use the higher recommended rates.

Do not apply this product as an over-the-top broadcast spray for forestry conifer or hardwood release unless otherwise specified on this label, or in separate supplemental labeling or fact sheets published by Monsanto for this product.

### 8.3 General Non-crop Areas and Industrial Sites

#### General Weed Control, Trim-and-Edge, Bare Ground

This product may be used in general non-crop areas. It may be applied with any application equipment described in this label. This product may be used to trim-and-edge around objects in non-crop sites, for spot treatment of unwanted vegetation and to eliminate unwanted weeds growing in established shrub beds or ornamental plantings. This product may be used prior to planting an area to ornamentals, flowers, turfgrass (sod or seed), or prior to laying asphalt or beginning construction projects.

Repeated applications of this product may be used, as weeds emerge, to maintain bare ground.

TANK MIXTURES: This product may be tank mixed with the following products, provided that the specific product is labeled for application at the use site. Refer to the individual product labels for approved non-crop sites and application rates.

Arsenal™	atrazine <sup>1</sup>	Certainty
Barricade™ 65WG	Crossbow L	dicamba <sup>1</sup>
diuron <sup>1</sup>	Endurance™	Escort™ or Escort XP
Gallery 75DF	Garlon™ 3A	Garlon 4
Goal 2XL	Karmex™ DF	Krovar™ I DF
Landmark II MP	Landmark MP	Landmark XP
Milestone	Oust	Oust XP
Outrider	Pendulum™ 3.3 EC	Pendulum WDG
pendimethalin <sup>1</sup>	Plateau™	Poast
Princep™ DF	Princep™ 4L	Ronstar™ 50WP
Sahara™	simazine <sup>1</sup>	Surflan™ AS
Surflan WDG	Telar™	Transline
Vanquish™	Velpar DF	Velpar L
2,4-D <sup>1</sup>		

<sup>1</sup> Tank mixtures with products containing this single active ingredient may be made provided the specific product is labeled for application at the use site.

This product plus dicamba tank mixtures may not be applied by air in California.

When applied as a tank mixture for bare ground, this product provides control of the emerged annual weeds and control or partial control of emerged perennial weeds, woody brush and trees.

For control or partial control of the following perennial weeds, apply 22 to 44 fluid ounces of this product plus 2 to 4 ounces of Oust or Oust XP per acre.

Bahiagrass	Johnsongrass
Bermudagrass	Poorjoe
Broomsedge	Quackgrass
Dallisgrass	Vaseygrass
Dock, curly	Vervain, blue
Dogfennel	

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Fescue, tall

#### **Chemical Mowing - Perennials**

This product will suppress perennial grasses listed in this section to serve as a substitute for mowing. Use 5 fluid ounces of this product per acre when treating tall fescue, fine fescue, orchardgrass, quackgrass or reed canarygrass covers. Use 4 fluid ounces of this product per acre when treating Kentucky bluegrass. Apply treatments in 10 to 40 gallons of spray solution per acre.

Use only in areas where some temporary injury or discoloration of perennial grasses can be tolerated.

#### **Chemical Mowing – Annuals**

For growth suppression of some annual grasses, such as annual ryegrass, wild barley and wild oats growing in coarse turf on roadsides or other industrial areas, apply 3 to 4 fluid ounces of this product in 10 to 40 gallons of spray solution per acre. Applications should be made when annual grasses are actively growing and before the seedheads are in the boot stage of development. Treatments may cause injury to the desired grasses.

#### **Dormant Turfgrass**

This product may be used to control or suppress many winter annual weeds and tall fescue for effective release of dormant bermudagrass and bahiagrass turf. Treat only when turf is dormant and prior to spring green-up.

Apply 5 to 44 fluid ounces of this product per acre. Apply the recommended rates in 10 to 40 gallons of water per acre. Use only in areas where bermudagrass or bahiagrass are desirable ground covers and where some temporary injury or discoloration can be tolerated.

Treatments in excess of 11 fluid ounces per acre may result in injury or delayed green-up in highly maintained areas, such as golf courses and lawns. DO NOT apply tank mixtures of this product plus Oust in highly maintained turfgrass areas.

#### **Actively Growing Bermudagrass**

This product may be used to control or partially control many annual and perennial weeds for effective release of actively growing bermudagrass. DO NOT apply more than 11 fluid ounces of this product per acre in highly maintained turfgrass areas. DO NOT apply tank mixtures of this product plus Oust or Oust XP in highly maintained turfgrass areas. Use only in areas where some temporary injury or discoloration can be tolerated.

#### **Turfgrass Renovation, Seed or Sod Production**

This product controls most existing vegetation prior to renovating turfgrass areas or establishing turfgrass grown for seed or sod. For maximum control of existing vegetation, delay planting or sodding to determine if any regrowth from escaped underground plant parts occurs. Where repeat treatments are necessary, sufficient regrowth must be attained prior to application. For warm-season grasses such as bermudagrass, summer or fall applications provide the best control. Where existing vegetation is growing under mowed turfgrass management, apply this product after omitting at least one regular mowing to allow sufficient growth for good interception of the spray.

Desirable turfgrasses may be planted following the above procedures.

Hand-held equipment may be used for spot treatment of unwanted vegetation growing in existing turfgrass. Broadcast or hand-held equipment may be used to control sod remnants or other unwanted vegetation after sod is harvested.

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**PRECAUTIONS, RESTRICTIONS:** Do not disturb soil or underground plant parts before treatment. Tillage or renovation techniques such as vertical mowing, coring or slicing should be delayed for 7 days after application to allow translocation into underground plant parts. If application rates total 2 quarts per acre or less, no waiting period between treatment and feeding or livestock grazing is required. If the rate is greater than 2 quarts per acre, remove livestock before application and wait 8 weeks after application before grazing or harvesting.

#### **8.4 Habitat Management**

##### **Habitat Restoration and Management**

This product may be used to control exotic and other undesirable vegetation in habitat management and natural areas, including rangeland and wildlife refuges. Applications can be made to allow recovery of native plant species, prior to planting desirable native species, and for similar broad-spectrum vegetation control requirements. Spot treatments can be made to selectively remove unwanted plants for habitat management and enhancement.

##### **Wildlife Food Plots**

This product may be used as a site preparation treatment prior to planting wildlife food plots. Any wildlife food species may be planted after applying this product, or native species may be allowed to repopulate the area. If tillage is needed to prepare a seedbed, wait 7 days after application before tillage to allow translocation into underground plant parts.

#### **8.5 Hollow Stem Injection**

This product may be applied through hand-held injection devices that deliver recommended amounts of this product into targeted hollow-stem plants growing in any non-crop site specified on this label.

For control of the following hollow-stem plants, follow the use instructions below:

##### **Japanese Knotweed, *Polygonum cuspidatum***

Inject 5 mL per stem of this product between second and third internode.

##### **Bohemian Knotweed, *Polygonum bohemicum***

Inject 5 mL per stem of this product between the second and third internode.

##### **Giant Hogweed, *Hercleum mantegazzianum***

Inject one leaf cane per plant 12 inches above the root crown with 5 mL of a 5% v/v solution of this product.

##### **Poison Hemlock, *Conium maculatum***

Inject one leaf cane per plant 10 to 12 inches above the root crown with 5 mL of a 5% v/v solution of this product.

##### **Field horsetail, *Equisetum arvense***

Inject one segment above the root crown with 0.5 mL per stem of this product. Use a small syringe that calibrates to this rate.

##### **Canada Thistle, *Cirsium arvense***

Cut 8 to 9 of the tallest plants at bud stage in a clump with clippers. Use a cavity needle that is pushed into the stem center and then slowly removed as 0.5 mL per stem of this product is injected into the stem.

**Note:** The combined total for all treatments must not exceed 7 quarts of this product per acre. At 5 mL per stem, 7 quarts should treat approximately 1300 stems per acre.

#### **8.6 Injection and Frill (Woody Brush and Trees)**

This product may be used to control woody brush and trees by injection or frill applications. Apply this product using suitable equipment that must penetrate into the living tissue. Apply the

equivalent of 1 mL of this product per each 2 to 3 inches of trunk diameter at breast height (DBH). This is best achieved by applying a 50- to 100-percent concentration of this product either to a continuous frill around the tree or as cuts evenly spaced around the tree below all branches. As tree diameter increases in size, better results are achieved by applying diluted material to a continuous frill or more closely spaced cuttings. Avoid application techniques that allow run-off to occur from frilled or cut areas in species that exude sap freely. In species such as this, make the frill or cuts at an oblique angle to produce a cupping effect and use a 100-percent concentration of this product. For best results, application should be made during periods of active growth and after full leaf expansion. This product will control many species, some of which are listed below:

<u>Control</u>	<u>Partial Control</u>
Oak	Black gum
Poplar	Dogwood
Sweetgum	Hickory
Sycamore	Maple, red

### 8.7 Non-Food Tree, Shrub, or Vine Production Sites

This product may be used for general weed control prior to the planting of and around established ornamentals, or any woody tree, shrub or vine species, including arborvitae, azalea, boxwood, crabapple, eucalyptus, euonymus, fir, Douglas fir, jojoba, hollies, lilac, magnolia, maple, oak, poplar, privet, pine, spruce and yew, growing in plant nurseries, on Christmas tree farms, or on other non-food tree production sites.

UNLESS OTHERWISE DIRECTED, THIS PRODUCT IS NOT RECOMMENDED FOR USE AS AN OVER-THE-TOP BROADCAST SPRAY IN ORNAMENTALS AND CHRISTMAS TREES. Care must be taken to avoid contact of spray, drift or mist with foliage or green bark of desirable ornamental species.

This product may also be used to control weeds growing in and around greenhouses and shadehouses. Desirable vegetation must not be present during application and air circulation fans must be turned off until after the application has dried.

TYPES OF APPLICATION: Site Preparation, Post-directed, Trim-and-edge, Wiper Application

#### Site Preparation

This product may be used prior to planting any tree, shrub or vine, including Christmas tree species, in a nursery or production setting.

#### Post-Directed, Trim-and-Edge

This product may be used as a post-directed spray around established woody ornamental species, or to trim and edge around trees, buildings, sidewalks, roads, potted plants and other objects in a production setting.

Desirable plants may be protected from the spray solution by using shields or coverings made of cardboard or other impermeable material.

#### Wiper Application

This product may be used through wick or other suitable wiper applicators to control or partially control undesirable vegetation around established trees, shrubs or vines. See the **SELECTIVE EQUIPMENT** section of this label for further information about the proper use of wiper applicators.

### 8.8 Parks, Recreational and Residential Areas

All of the instructions in the **General Non-Crop Areas and Industrial Sites** section may be made in park and recreational areas.

This product may be used in parks, recreational and residential areas. It may be applied with any application s equipment described in this label. This product may be used to trim-and-edge around trees, fences, paths, around buildings, sidewalks and other objects in these areas. This product may be used for spot treatment of unwanted vegetation. This product may be used to eliminate unwanted weeds growing in established shrub beds or ornamental plantings. This product may be used prior to planting an area to ornamentals, flowers, turfgrass (sod or seed), or prior to laying asphalt or beginning construction projects.

### 8.9 Railroads

All of the instructions in the **General Non-Crop Areas and Industrial Sites** section may be made to railroads.

#### Bare ground, Ballast and Shoulders, Crossings, Spot Treatment

This product may be used to maintain bare ground on railroad ballast and shoulders. Repeat applications of this product may be used, as weeds emerge, to maintain bare ground. This product may be used to control tall-growing weeds to improve line-of-sight at railroad crossings and reduce the need for mowing along rights-of-way. For crossing applications, up to 80 gallons of spray solution per acre may be used.

**TANK MIXURES:** This product may be tank mixed with the following products for ballast, shoulder, spot, bare ground and crossing treatments provided the specific product used is registered for use on these sites. Refer to the individual product labels for approved sites and application rates:

Arsenal	atrazine <sup>1</sup>
dicamba <sup>1</sup>	diuron <sup>1</sup>
Escort	Escort XP
Garlon 3A	Garlon 4
Hyvar™ X	Hyvar X-L
Krovar I DF	Oust
Oust XP	Outrider
Sahara DG	simazine <sup>1</sup>
Spike™ 80DF	Telar DF
Transline	Vanquish
Velpar DF	Velpar L
2,4-D	

<sup>1</sup> Tank mixtures with products containing this single generic active ingredient may be made provided the specific product is registered for this use.

#### Brush Control

This product may be used to control woody brush and trees on railroad rights-of-way. Apply 2.5 to 7 quarts of this product per acre as a broadcast spray, using boom-type or boomless nozzles. Up to 80 gallons of spray solution per acre may be used. Apply a 0.7- to 1.5-percent solution of this product when using high-volume spray-to-wet applications. Apply a 4- to 7-percent solution of this product when using low volume directed sprays for spot treatment.

**TANK MIXTURES:** This product may be mixed with the following products for ballast, shoulder, spot, bare ground and crossing treatments as well as for enhanced control of woody brush and trees, provided the specific product used is labeled for use on these sites. Refer to the individual product labels for approved sites and application rates:

Arsenal	atrazine <sup>1</sup>
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dicamba <sup>1</sup>	diuron <sup>1</sup>
Escort	Escor XP
Garlon 3A	Garlon 4
Hyvar X	Hyvar X-L

Sahara DG	simazine <sup>1</sup>
Spike 80 DF	
Transline	Vanquish
Velpar DF	Velpar L
	2,4-D <sup>1</sup>

<sup>1</sup> Tank mixtures with products containing this single generic active ingredient may be made provided the specific product is labeled for application at the use site.

**Bermudagrass Release**

This product may be used to control or partially control many annual and perennial weeds for effective release of actively growing bermudagrass. Apply 11 to 32 fluid ounces of this product in up to 80 gallons of spray solution per acre. Use the lower rate when treating annual weeds below 6 inches in height (or runner length). Use the higher rate as weeds increase in size or as they approach flower or seedhead formation. These rates will also provide partial control of the following perennial species:

Bahiagrass	Johnsongrass
Bluestem, silver	Trumpetcreeper
Fescue, tall	Vaseygrass

This product may be tank-mixed with Oust or Oust XP. If tank-mixed, use no more than 11 to 32 fluid ounces of this product with 1 to 2 ounces of Oust or Oust XP per acre. Use the lower rates of each product to control annual weeds less than 6 inches in height (or runner length) that are listed in this label and the Oust label. Use the higher rates as annual weeds increase in size and approach the flower or seedhead stages. These rates will also provide partial control of the following perennial weeds:

Bahiagrass	Fescue, tall
Blackberry	Johnsongrass
Bluestem, silver	Poorjoe
Broomsedge	Raspberry
Dallisgrass	Trumpetcreeper
Dewberry	Vaseygrass
Dock, curly	Vervain, blue
Dogfennel	

Use only on well-established bermudagrass. Bermudagrass injury may result from the treatment, but regrowth will occur under moist conditions. Repeat applications in the same season are not recommended, since severe injury may occur.

**8.10 Roadsides**

All of the applications in the **General Non-Crop Areas and Industrial Sites** section may be made on roadsides.

**Shoulder Treatments**



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This product may be used on road shoulders. It may be applied with boom sprayers, shielded boom sprayers, high-volume off-center nozzles, hand-held equipment, and similar equipment.

#### **Guardrails and Other Obstacles to Mowing**

This product may be used to control weeds growing under guardrails and around signposts and other objects along the roadside.

#### **Spot Treatment**

This product may be used as a spot treatment to control unwanted vegetation growing along roadsides.

**TANK MIXTURES:** This product may be tank-mixed with the following products, for shoulder, guardrail, spot and bare ground treatments provided that the specific product used is labeled for use on these sites. Refer to the individual product labels for approved sites and application rates:

atrazine <sup>1</sup>	Oust
Clarity	Outrider
Crossbow L	Pendulum 3.3 EC
dicamba <sup>1</sup>	Pendulum WDG
diuron <sup>1</sup>	Plateau
Endurance	Princep DF
Escort	Princep 4L
Escort XP	Ronstar 50WP
Gallery 75 DF	Sahara
Krovar I DF	simazine
Landmark II MP	Surflan
Landmark MP	Telar
Landmark XP	Vanquish
	2,4-D

<sup>1</sup> Tank mixtures with products containing this single generic active ingredient may be made provided the specific product is labeled for application at the use site.

#### **Release of Bermudagrass or Bahiagrass**

##### **Dormant Applications**

This product may be used to control or partially control many winter annual weeds and tall fescue for effective release of dormant bermudagrass or bahiagrass. Treat only when turf is dormant and prior to spring green-up. This product may also be tank-mixed with Outrider, Oust or Oust XP for residual control. Tank mixtures of this product with Oust or Oust XP may delay green-up.

For best results on winter annuals, treat when plants are in an early growth stage (below 6 inches in height) after most have germinated. For best results on tall fescue, treat when fescue is at or beyond the 4- to 6-leaf stage.

Apply 5 to 44 fluid ounces of this product in a tank mix with 0.75 to 1.33 ounces of Outrider herbicide per acre. Read and follow all label directions for Outrider herbicide.

Apply 6 to 44 fluid ounces of this product per acre alone or in a tank mixture with 0.25 to 1 ounce per acre of Oust or Oust XP. Apply the recommended rates in 10 to 40 gallons of water per acre. Use only in areas where bermudagrass or bahiagrass are desirable ground covers and where some temporary injury or discoloration can be tolerated. To avoid delays in green-up and minimize injury, add no more than 1 ounce of Oust or Oust XP per acre on bermudagrass and no more than 0.5 ounce of Oust or Oust XP per acre on bahiagrass and avoid treatments when these grasses are in a semi-dormant condition.

**Actively Growing Bermudagrass**

This product may be used to control or partially control many annual and perennial weeds for effective release of actively growing bermudagrass. Apply 11 to 32 fluid ounces of this product in 10 to 40 gallons of spray solution per acre. Use the lower rate when treating annual weeds below 6 inches in height (or runner length). Use the higher rate as weeds increase in size or as they approach flower or seedhead formation. These rates will also provide partial control of the following perennial species:

Bahiagrass	Johnsongrass
Bluestem, silver	Trumpetcreeper
Fescue, tall	Vaseygrass

This product may be tank-mixed with Outrider herbicide for control or partial control of Johnsongrass and other weeds listed on the Outrider label. Use 5 to 22 fluid ounces of this product with 0.75 to 1.33 ounces of Outrider per acre. Use the higher rates of both products for control of perennial weeds or annual weeds greater than 6 inches in height.

This product may be tank-mixed with Oust or Oust XP. If tank-mixed, use no more than 11 to 22 fluid ounces of this product with 1 to 2 ounces of Oust or Oust XP per acre. Use the lower rates of each product to control annual weeds less than 6 inches in height (or runner length) that are listed in this label and the Oust Oust XP label. Use the higher rates as annual weeds increase in size and approach the flower or seedhead stages. These rates will also provide partial control of the following perennial weeds:

Bahiagrass	Fescue, tall
Bluestem, silver	Johnsongrass
Broomsedge	Poorjoe
Dallisgrass	Trumpetcreeper
Dock, curly	Vaseygrass
Dogfennel	Vervain, blue

Use only on well-established bermudagrass. Bermudagrass injury may result from the treatment, but regrowth will occur under moist conditions. Repeat applications of the tank mix in the same season are not recommended, since severe injury may occur.

**Actively Growing Bahiagrass**

For suppression of vegetative growth and seedhead inhibition of bahiagrass for approximately 45 days, apply 4 fluid ounces of this product in 10 to 40 gallons of water per acre. Apply 1 to 2 weeks after full green-up or after mowing to a uniform height of 3 to 4 inches. This application must be made prior to seedhead emergence.

For suppression up to 120 days, apply 3 fluid ounces of this product per acre, followed by an application of 1.5 to 3 fluid ounces per acre about 45 days later. Make no more than 2 applications per year.

This product may be used for control or partial control of Johnsongrass and other weeds listed on the Outrider herbicide label. Apply 4 fluid ounces of this product with 0.75 to 2.0 ounces of Outrider per acre. Use the higher rates for control of perennial weeds and annual weeds greater than 6 inches in height. Use only on well established bahiagrass.

A tank mixture of this product plus Oust or Oust XP may be used. Apply 4 fluid ounces of this product plus 0.25 ounce of Oust or Oust XP per acre 1 to 2 weeks following an initial spring mowing. Make only one application per year.

### 8.11 Rangelands

This product will control or suppress many annual weeds growing in perennial cool and warm-season grass rangelands, pastures, and industrial sites. Preventing weed seed production is critical to the successful control of annual grassy weeds invading these perennial grass sites. Follow-up applications in sequential years should eliminate most of the viable seeds. Grazing of treated areas should be delayed to encourage growth of desirable perennials. Allowing desirable perennials to flower and reseed in the treated area will encourage successful transition.

**Bromus:** This product may be used to control or suppress downy brome (*Bromus tectorum*), Japanese brome (*Bromus japonicus*), soft chess (*Bromus mollis*), cheatgrass (*Bromus secalinus*), cereal rye and jointed goatgrass found in rangelands pastures and industrial sites. Apply 5 to 11 fluid ounces of this product per acre on a broadcast basis.

For best results, treatment should coincide with early seedhead emergence of the most mature plants. Delaying the application until this growth stage will maximize the emergence of other weedy grass flushes. Applications should be made to the same site each year until seed banks are depleted and the desirable perennial grasses can become reestablished on the site.

**Medusahead:** To control or suppress medusahead, apply 11 fluid ounces of this product per acre at the 3-leaf stage when plants are actively growing. Delaying applications beyond this stage will result in reduced or unacceptable control. Repeat applications in subsequent years may be necessary to eliminate the seedbank before reestablishing desirable perennial grasses. Applications may be made in the fall or spring.

Applications may be made using ground or aerial equipment. Aerial applications for these uses may be made using fixed wing or helicopter equipment. For aerial applications, apply in 2 to 10 gallons of water per acre. For applications using ground equipment, apply in 10 to 20 gallons of water per acre.

#### Spot Treatment, Wiper Application

This product may be applied in rangeland, pastures or industrial sties as a spot treatment, or over the top of desirable grasses using wiper applicators to control tall weeds. Applications may be repeated in the same area at 30-day intervals.

For spot treatments or wiper application methods using rates of 2 quarts of this product per acre or less, the entire site or any portion of it may be treated. When spot treatments or wiper applications are made using rates above 2 quarts of this product per acres, no more than 10 percent of the total site may be treated at any one time. To achieve maximum performance, remove domestic livestock before application and wait 7 days after application before grazing livestock or harvesting for feed.

### 8.12 Utility Sites

This product is recommended for use along electrical power, pipeline and telephone rights-of-way, and in other sites associated with these rights-of-way, such as substations, roadsides, railroads or similar rights-of-way that run in conjunction with utilities.

This product may be used in utility sties and substations for bare ground, trim-and-edge around objects, spot treatment of unwanted vegetation and to eliminate unwanted weeds growing in established shrub beds or ornamental plantings. This product may be used prior to planting a utility site to ornamentals, flowers, turfgrass (sod or seed), or beginning construction projects.

Repeated applications of this product may be used, as weeds emerge, to maintain bare ground.

This product is also recommended for use in preparing or establishing wildlife openings within these sites, maintaining access roads and for side trimming along utility rights-of-way.

For control of herbaceous weeds, use the lower recommended tank mixture rates. For control of dense stands or tough-to-control woody brush and trees, use the higher recommended rates.

**TANK MIXTURES:** This product may be tank mixed with the following products for use in utility sites, provided that the specific product used is labeled for use on these sites. Refer to the individual product labels for approved sites and application rates.

Arsenal	atrazine <sup>1</sup>
Barricade 65WG	dicamba <sup>1</sup>
diuron <sup>1</sup>	Endurance
Escort	Escort XP
Garlon 3A <sup>2</sup>	Garlon 4 <sup>3</sup>
Krenite	Krovar I DF
Oust	Oust XP
Outrider	pendimethalin <sup>1</sup>
Plateau	
Ronstar 50WP	Sahara
simazine <sup>1</sup>	Surflan AS
Surflan WDG	Telar DF
Transline	Vanquish
Velpar DF	Velpar L
2,4-D	

<sup>1</sup> Tank mixtures with product containing this generic active ingredient may be made provided the specific product is labeled for application at the use site.

<sup>2</sup> Ensure that Garlon 3A is thoroughly mixed with water according to label directions before adding this product. Have spray mixture agitating at the time this product is added to avoid spray incompatibility problems.

<sup>3</sup> For side trimming treatments, it is recommended that this product be used alone or in a tank mixture with Garlon 4.

### **8.13 Conservation Reserve Program (CRP)**

This product may be used for renovation (rotating out of CRP), site preparation, postemergence weed control in dormant CRP grasses, or wiper application on CRP land.

#### **Renovation (Rotating out of CRP), Site Preparation**

This product may be used to prepare CRP land for crop production. Refer to Federal, State or local use guides for CRP renovation recommendations.

#### **Postemergence Weed Control in Dormant CRP Grasses, Wiper Application**

Apply this product to suppress competitive growth and seed production of undesirable vegetation on CRP land. Applications may be made using wiper applicators to control tall weeds, or as a broadcast or spot treatment to dormant CRP grasses. For selective applications with broadcast spray equipment, apply 5 to 8 fluid ounces of this product per acre in early spring before desirable CRP grasses, such as crested and tall wheatgrass, break dormancy and initiate green growth. Late fall applications can be made after desirable perennial grasses have reached dormancy.

Some stunting of CRP perennial grasses will occur if broadcast applications are made when plants are not dormant. No waiting period is required between application and grazing or harvesting for feed. Do not apply more than 2 quarts per acre per year onto CRP land.

### **8.14 Grass Seed or Sod Production**

This product may be used in grass seed and sod production for preplant, at-planting, preemergence, removal of established stands, renovation, site preparation, shielded spraying, wiper application, spot treatment, and creating rows in annual ryegrass.

**Preplant, At-Planting, Preemergence, Removal of Established Stands, Renovation, Site Preparation**

This product controls most existing vegetation for purposes of renovating turf or forage grass seed areas or for establishing turfgrass grown for sod. It may also be used to destroy remaining undesired grass vegetation when production fields are converted to alternate species or crops. Make applications before, during, or after planting, or for renovation purposes. Applications must be made prior to crop emergence in order to avoid crop injury. For maximum control of existing vegetation, delay planting to determine if any regrowth from escaped underground plant parts occurs. Where existing vegetation is growing under mowed turfgrass management, apply this product after omitting at least one regular mowing to allow sufficient growth for good interception of the herbicide spray. Where repeat treatments are necessary, sufficient regrowth must be attained prior to application. For warm-season grasses, such as bermudagrass, summer or fall applications provide best control. Broadcast equipment may be used to control sod remnants or other unwanted vegetation after sod is harvested. Application rates up to 3.3 quarts per acre may be used to totally remove established stands of tough to kill grass species.

Do not disturb soil or underground plant parts before treatment. Tillage or renovation techniques such as vertical mowing, coring or slicing should be delayed for 7 days after application to allow proper translocation into underground plant parts. If application rates total 2 quarts per acre or less, no waiting period between treatment and feeding or livestock grazing is required. If the rate is greater than 2 quarts per acre, remove domestic livestock before application and wait 8 weeks after application before grazing or harvesting.

**Shielded Sprayers**

Apply 22 to 64 fluid ounces of this product in 10 to 20 gallons of water per acre to control weeds between grass seed rows. Uniform planting in straight rows aids in shielded sprayer applications. Best results are obtained when the grass seed plants are small enough to easily pass by the protective shields.

Contact of this product in any manner with desirable vegetation may result in discoloration, stunting or destruction. Such damage shall be the sole responsibility of the applicator.

**Wiper Application**

This product may be applied over the top of desirable grasses using wiper applicators for the control of tall weeds.

Contact of this product in any manner with desirable vegetation may result in discoloration, stunting or destruction. Such damage shall be the sole responsibility of the applicator.

**Spot Treatment**

Apply a 1-percent solution of this product using hand-held spray equipment to control weeds within established vegetation prior to heading of grasses grown for seed. Hand-held equipment may be used to control sod remnants or other unwanted vegetation after sod is harvested.

The grass sprayed in the treated area will be killed. Take care not to spray or allow spray to drift outside the target area in order to avoid unwanted grass injury or destruction.

**Creating Rows in Annual Ryegrass**

Apply 11 to 22 fluid ounces of this product per acre. Best results are obtained when applications are made before the ryegrass reaches 6 inches in height. Use the higher rate within the recommended range when ryegrass is greater than 6 inches in height.

Set nozzle heights to allow the establishment of the desired row spacing. Use of low-pressure nozzles, or drop nozzles designed to target the application over a narrow band are recommended.

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Take care not to spray or allow spray to drift outside target area in order to avoid unwanted grass destruction.

**Grower assumes all responsibility for losses resulting from misapplication of this product.**

#### **8.15 Pastures**

This product may be applied to any pasture grass (other than food crops in the *Gramineae* family), including bahiagrass, bermudagrass, bluegrass, brome, fescue, guineagrass, kikuyugrass, orchardgrass, pangola grass, ryegrass, timothy, and wheatgrass. Application can be made as a spot treatment, wiper application, preplant, preemergence, pasture renovation, or postemergent broadcast.

#### **Preplant, Preemergence, Pasture Renovation**

This product may be applied for weed control prior to planting or emergence of forage grasses. This product may also be applied to control perennial pasture species listed on this label prior to replanting.

If application rates total 2 quarts per acre or less, no waiting period between treatment and feeding or livestock grazing is required. If the rate is greater than 2 quarts per acre, remove domestic livestock before application and wait 8 weeks after application before grazing or harvesting.

#### **Spot Treatment, Wiper Application**

This product may be applied in pastures as a spot treatment, or over the top of desirable grasses using wiper applicators to control tall weeds. Applications may be repeated in the same area at 30-day intervals.

For spot treatments or wiper application methods using rates of 2 quarts of this product per acre or less, the entire field or any portion of it may be treated. When spot treatments or wiper application are made using rates above 2 quarts of this product per acre, no more than 10 percent of the total pasture may be treated at any one time. To achieve maximum performance, remove domestic livestock before application and wait 7 days after application before grazing livestock or harvesting for feed.

#### **Postemergent Weed Control (Broadcast Treatments)**

This product may be applied to pastures to suppress competitive growth and seed production of annual weeds and undesirable vegetation in pastures. For selective applications with broadcast spray equipment, apply 8 to 11 fluid ounces of this product per acre in early spring before desirable perennial grasses break dormancy and initiate green growth. Late fall applications can be made after desirable perennial grasses have reached dormancy.

Some stunting of perennial grasses will occur if broadcast applications are made when plants are not dormant. Use of higher application rates will cause stand reductions. No waiting period is required between application and grazing or harvesting for feed. Do not apply more than 2 quarts of this product per acre per year onto pasture grasses except for renovation uses as described previously in this section.

#### **9.0 WEEDS CONTROLLED**

Always use the higher rate of this product per acre within the recommended range when weed growth is heavy or dense or weeds are growing in an undisturbed (noncultivated) area.

Reduced results may occur when treating weeds heavily covered with dust. For weeds that have been mowed, grazed or cut, allow regrowth to occur prior to treatment.

Refer to the following label sections for recommended rates for the control of annual and perennial weeds and woody brush and trees. For difficult to control perennial weeds and woody

brush and trees, where plants are growing under stressed conditions, or where infestations are dense, this product may be used at 4 to 7 quarts per acre for enhanced results.

### 9.1 Annual Weeds

Use 22 fluid ounces of this product per acre if weeds are less than 6 inches in height or runner length and 1.0 to 2.7 quarts of this product per acre if weeds are over 6 inches in height or runner length or when weeds are growing under stressed conditions. Use the higher rate for tough-to-control species regardless of the weed size at application. Treat tough-to-control weeds early when they are relatively small. This product may be tank mixed provided the tank-mix product is labeled for application at the target site. Refer to the individual product labels for approved sites and application rates.

For spray-to-wet applications, apply a 0.4-percent solution of this product to weeds less than 6 inches in height or runner length. For annual weeds over 6 inches tall, or for smaller weeds growing under stressed conditions, use a 0.7- to 1.5-percent solution. Use the higher rate for tough-to-control species or for weeds over 24 inches tall. Apply prior to seedhead formation in grass or bud formation in broadleaf weeds.

For low volume directed spray applications, use a 4- to 7-percent solution of this product. Spray coverage should be uniform with at least 50 percent of the foliage contacted. Coverage of the top one half of the plant is important for best results. To ensure adequate spray coverage, spray both sides of large or tall weeds when foliage is thick and dense or where there are multiple spouts.

#### Weed Species

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Anoda, spurred  
 Barley  
 Barnyardgrass  
 Bassia, fivehook  
 Bittercress  
 Black nightshade  
 Bluegrass, annual  
 Bluegrass, bulbous  
 Brome, downy  
 Brome, Japanese  
 Browntop panicum  
 Buttercup  
 Carolina foxtail  
 Carolina geranium  
 Castor bean  
 Cheatgrass  
 Cheeseweed (*Malva parviflora*)  
 Chervil  
 Chickweed  
 Cocklebur  
 Copperleaf, hophornbeam  
 Corn  
 Corn speedwell  
 Crabgrass  
 Dwarf dandelion  
 Eastern manna grass  
 Eclipta  
 Fall panicum  
 Falsedandelion  
 Falseflax, smallseed  
 Fiddleneck

Field pennycress  
Filaree  
Fleabane, annual  
Fleabane, hairy (*Conyza bonariensis*)  
Fleabane, rough  
Florida pusley  
Foxtail  
Goatgrass, jointed  
Goosegrass  
Grain sorghum (milo)  
Groundsel, common  
Hemp sesbania  
Henbit  
Horseweed/Marestail (*Conyza canadensis*)  
Itchgrass  
Johnsongrass, seedling  
Junglerice  
Knotweed  
Kochia  
Lamb's-quarters  
Little barley  
London rocket  
Mayweed  
Medusahead  
Morningglory (*Ipomoea spp*)  
Mustard, blue  
Mustard, tansy  
Mustard, tumble  
Mustard, wild  
Oats  
Pigweed  
Plains/Tickseed coreopsis  
Prickly lettuce  
Puncturevine  
Purslane, common  
Ragweed, common  
Ragweed, giant  
Red rice  
Russian thistle  
Rye  
Ryegrass  
Sandbur, field  
Shattercane  
Shepherd's-purse  
Sicklepod  
Signalgrass, broadleaf  
Smartweed, ladythumb  
Smartweed, Pennsylvania  
Sowthistle, annual  
Spanishneedles  
Speedwell, purslane  
Sprangletop  
Spurge, annual  
Spurge, prostrate



Spurge, spotted  
 Spurry, umbrella  
 Starthistle, yellow  
 Stinkgrass  
 Sunflower  
 Teaweed/Prickly sida  
 Texas panicum  
 Velvetleaf  
 Virginia copperleaf  
 Virginia pepperweed  
 Wheat  
 Wild oats  
 Witchgrass  
 Woolly cupgrass  
 Yellow rocket

## 9.2 Perennial Weeds

Best results are obtained when perennial weeds are treated after they reach the reproductive stage of growth (seedhead initiation in grasses and bud formation in broadleaves). For non-flowering plants, best results are obtained when the plants reach a mature stage of growth. In many situations, treatments are required prior to these growth stages. Under these conditions, use the higher application rate within the recommended range.

Ensure thorough coverage when using spray-to-wet treatments with hand-held equipment. For best results, use a 1.5-percent solution on harder-to-control perennials such as bermudagrass, dock, field bindweed, hemp dogbane, milkweed and Canada thistle.

For low volume directed spray applications, use a 4- to 7-percent solution of this product. Spray coverage should be uniform with at least 50 percent of the foliage contacted. Coverage of the top one half of the plant is important for best results. To ensure adequate spray coverage, spray both sides of large or tall weeds when foliage is thick and dense or where there are multiple sprouts.

Allow 7 or more days after application before tillage.

Weed Species	Rate (QT/A)	Hand-Held % Solution
Alfalfa*	1 - 1.5	1.5
Alligatorweed*	3.0	1
Anise (fennel)	1.3 - 2.7	1 - 1.5
Bahiagrass	2 - 3.3	1.5
Beachgrass, European ( <i>Ammophila arenaria</i> )	--	3.5
Bentgrass*	1	1.5
Bermudagrass	3.3	1.5
Bermudagrass, water (knotgrass)	1	1.5
Bindweed, field	2.7 - 3.3	1.5
Bluegrass, Kentucky	1.5	1.5
Blueweed, Texas	2.7 - 3.3	1.5
Brackenfern	2 - 3.0	1
Bromegrass, smooth	1.5	1.5
Bursage, woolly-leaf	--	1.5
Canarygrass, reed	1.5 - 2	1.5
Cattail	2 - 3.3	1.5

Clover, red, white	2 - 3.3	1.5
Cogongrass	2 - 3.3	1.5
Dallisgrass	2 - 3.3	1.5
Dandelion	2 - 3.3	1.5
Dock, curly	2 - 3.3	1.5
Dogbane, hemp	2.5	1.5
Fescue (except tall)	3.0	1.5
Fescue, tall	2	1.5
German ivy	1.3 - 2.7	1 - 1.5
Guineagrass	2	1
Horsenettle	2 - 3.3	1.5
Horseradish	3.0	1.5
Icelandic plant	1.3	1.5 - 2
Jerusalem artichoke	2 - 3.3	1.5
Johnsongrass	1.3 - 2	1
Kikuyugrass	1.5 - 2	1.5
Knapweed	3.0	1.5
Lantana	--	1
Lespedeza	2 - 3.3	1.5
Milkweed, common	2	1.5
Muhly, wirestem	1.5	1.5
Mullein, common	2 - 3.3	1.5
Napiergrass	2 - 3.3	1.5
Nightshade, silverleaf	1.5	1.5
Nutsedge, purple, yellow	2	1 - 1.5
Orchardgrass	1.5	1.5
Pampasgrass	2 - 3.3	1 - 1.5
Paragrass	2 - 3.3	1.5
Pepperweed, perennial	2.7	1.5
Phragmites*	2 - 3.3	1 - 1.5
Poison hemlock	1.3 - 2.7	1 - 1.5
Pokeweed, common	1	1.5
Quackgrass	1.3 - 2	1.5
Redvine*	1.5	1.5
Reed, giant	2.7 - 3.3	1.5
Ryegrass, perennial	1.5 - 2	1
Smartweed, swamp	2 - 3.3	1.5
Sowthistle, perennial	1.5 - 2.0	1.5
Spurge, leafy*	--	1.5
Starthistle, yellow	1.5	1.5
Sweet potato, wild*	--	1.5
Thistle, artichoke	1.3 - 2	1 - 1.5
Thistle, Canada	1.5 - 2	1.5
Timothy	1.5 - 2	1.5
Torpedograss*	2.7 - 3.3	1.5
Trumpet creeper*	1.5 - 2	1.5

Vaseygrass	2 - 3.3	1.5
Velvetgrass	2 - 3.3	1.5
Wheatgrass, western	1.5 - 2	1.5

\* Partial control

### 9.3 Woody Brush and Trees

Apply this product after full leaf expansion, unless otherwise directed on this label, or in separate supplemental labeling or fact sheets published by Monsanto Company for this product. Use the higher rate for larger plants and/or dense areas of growth. On vines, use the higher rate for plants that have reached the woody stage of growth. Best results are obtained when application is made in late summer or fall after fruit formation.

In arid areas, best results are obtained when applications are made in the spring to early summer when brush species are at high moisture content and are flowering.

For best results when using hand-held equipment, use a 1.5-percent solution on harder-to-control woody brush and trees.

For low volume directed-spray applications, apply a 4- to 7-percent solution of this product. Spray coverage should be uniform with at least 50-percent of the foliage contacted. Coverage of the top one-half of the plant is important for best results. To ensure adequate spray coverage spray both sides of large or tall woody brush and trees, when foliage is thick and dense, or where there are multiple spouts.

Symptoms may not appear prior to frost or senescence with fall treatments.

Allow 7 or more days after application before tillage, mowing or removal. Repeat treatments may be necessary to control plants regenerating from underground parts or seed. Some autumn colors on undesirable deciduous species are acceptable provided no major leaf drop has occurred. Reduced performance may result if fall treatments are made following a frost.

Weed Species	Broadcast Rate (QT/A)	Hand-Held Spray-to-Wet % Solution
Alder	2 - 3.0	1
Ash*	1.5 - 3.3	1 - 1.5
Aspen, quaking	1.5 - 2	1
Bearclover (Bearmat)*	1.5 - 3.3	1 - 1.5
Beech*	1.5 - 3.3	1 - 1.5
Birch	1.5 - 2.0	1
Blackberry	2 - 3.0	1
Blackgum	1.5 - 3.3	1 - 1.5
Bracken	1.5 - 3.3	1 - 1.5
Broom; French, Scotch	1.3 - 3.3	1 - 1.5
Buckwheat, California*	1.3 - 2.5	1 - 1.5
Cascara*	1.5 - 3.3	1 - 1.5
Catsclaw*	—	1
Ceanothus*	1.5 - 3.3	1 - 1.5
Chamise*	1.3 - 3.3	1
Cherry; bitter, black, pin	1.5 - 2	1
Coyote brush	2 - 2.7	1 - 1.5
Deerweed	1.3 - 3.3	1

Dogwood*	1.5 - 3.3	1 - 1.5
Elderberry	1.5 - 2.0	1
Elm*	1.5 - 3.3	1 - 1.5
Eucalyptus	--	1.5
Gorse*	1.5 - 3.3	1 - 1.5
Hasardia*	1.3 - 2.5	1 - 1.5
Hawthorn	1.5 - 2	1
Hazel	1.5 - 2.0	1
Hickory*	1.5 - 3.3	1 - 1.5
Honeysuckle	2 - 3.0	1
Hornbeam, American*	1.5 - 3.3	1 - 1.5
Kudzu	2.5 - 3.0	1.5
Locust, black*	1.5 - 2.5	1 - 1.5
Madrone resprouts*	--	1.5
Manzanita*	1.5 - 3.3	1 - 1.5
Maple, red	1.5 - 3.0	1
Maple, sugar	--	1
Monkey flower*	1.3 - 2.7	1 - 1.5
Oak; black, white*	1.5 - 3.0	1 - 1.5
Oak, post	2 - 3.0	1
Oak; northern, pin	1.3 - 2.7	1
Oak, Scrub*	1.3 - 2.7	1
Oak; southern red	1.5 - 2	1
Peppertree, Brazilian (Florida holly)*	1.3 - 3.3	1 - 1.5
Persimmon*	1.5 - 3.3	1 - 1.5
Pine	1.5 - 3.3	1 - 1.5
Poison ivy	2.5 - 3.3	1.5
Poison oak	2.5 - 3.3	1.5
Poplar, yellow*	1.5 - 3.3	1 - 1.5
Redbud, eastern	1.5 - 3.3	1 - 1.5
Rose, multiflora	1.5	1
Russian olive*	1.5 - 3.3	1 - 1.5
Sage, black	1.3 - 2.7	1
Sage, white*	1.5 - 2.7	1 - 1.5
Sage brush, California	1.3 - 2.7	1
Salmonberry	1.5 - 2.0	1
Saltcedar*	1.5 - 3.3	1 - 1.5
Sassafras*	1.5 - 3.3	1 - 1.5
Sourwood*	1.5 - 3.3	1 - 1.5
Sumac; laurel, poison, smooth, sugarbush, winged*	1.5 - 3.0	1 - 1.5
Sweetgum	1.5 - 2	1
Swordfern*	1.5 - 3.3	1 - 1.5
Tallowtree, Chinese	--	1
Tan oak resprouts*	--	1.5
Thimbleberry	1.5	1

Tobacco, tree*	1.5 - 2.5	1 - 1.5
Toyon*	--	1.5
Trumpet creeper	1.5 - 2	1
Vine maple*	1.5 - 3.3	1 - 1.5
Virginia creeper	1.5 - 3.3	1 - 1.5
Waxmyrtle, southern*	1.5 - 3.3	1 - 1.5
Willow	2 - 3.0	1
Yerbasenta*	--	1.5

\* Partial control

#### 10.0 LIMIT OF WARRANTY AND LIABILITY

Monsanto Company warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes set forth in the Complete Directions for Use label booklet ("Directions") when used in accordance with those Directions under the conditions described therein. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, NO OTHER EXPRESS WARRANTY OR IMPLIED WARRANTY OF FITNESS FOR PARTICULAR PURPOSE OR MERCHANTABILITY IS MADE. This warranty is also subject to the conditions and limitations stated herein.

To the extent consistent with applicable law, buyer and all users shall promptly notify this Company of any claims whether based in contract, negligence, strict liability, other tort or otherwise.

To the fullest extent permitted by law, buyer and all users are responsible for all loss or damage from use or handling which results from conditions beyond the control of this Company to the extent consistent with applicable law, including, but not limited to, incompatibility with products other than those set forth in the Directions, application to or contact with desirable vegetation, failure of this product to control weed biotypes which develop resistance to glyphosate, unusual weather, weather conditions which are outside the range considered normal at the application site and for the time period when the product is applied, as well as weather conditions which are outside the application ranges set forth in the Directions, application in any manner not explicitly set forth in the Directions, moisture conditions outside the moisture range specified in the Directions, or the presence of products other than those set forth in the Directions in or on the soil, crop or treated vegetation.

This Company does not warrant any product reformulated or repackaged from this product except in accordance with this Company's stewardship requirements and with express written permission from this Company.

TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, THE EXCLUSIVE REMEDY OF THE USER OR BUYER, AND THE LIMIT OF THE LIABILITY OF THIS COMPANY OR ANY OTHER SELLER FOR ANY AND ALL LOSSES, INJURIES OR DAMAGES RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT (INCLUDING CLAIMS BASED IN CONTRACT, NEGLIGENCE, STRICT LIABILITY, OTHER TORT OR OTHERWISE) SHALL BE THE PURCHASE PRICE PAID BY THE USER OR BUYER FOR THE QUANTITY OF THIS PRODUCT INVOLVED, OR, AT THE ELECTION OF THIS COMPANY OR ANY OTHER SELLER, THE REPLACEMENT OF SUCH QUANTITY, OR, IF NOT ACQUIRED BY PURCHASE, REPLACEMENT OF SUCH QUANTITY. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, IN NO EVENT SHALL THIS COMPANY OR ANY OTHER SELLER BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL OR SPECIAL DAMAGES.

Upon opening and using this product, buyer and all users are deemed to have accepted the terms of this LIMIT OF WARRANTY AND LIABILITY which may not be varied by any verbal or written agreement. If terms are not acceptable, return at once unopened.

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**[INSERT BRAND NAME]**, Outrider, Monsanto and Vine symbol are trademarks of Monsanto Technology LLC.

All other trademarks are the property of their respective owners.

This product is protected by U.S. Patent No's. 5,668,085 and 6,365,441. Other patents pending. No license granted under any non-U.S. patent(s).

EPA Reg. No. 524-NEW

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In case of an emergency involving this product, or for medical assistance,  
Call Collect, day or night, (314) 694-4000.

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ST. LOUIS, MISSOURI, 63167 USA

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## SUPPLEMENTAL LABELING

READ THE ENTIRE LABEL FOR [INSERT BRAND NAME] BEFORE PROCEEDING WITH THE USE DIRECTIONS CONTAINED IN THIS SUPPLEMENTAL LABELING.

When using [INSERT BRAND NAME] as permitted according to this supplemental labeling, read and follow all applicable directions, restrictions, and precautions on the label booklet provided with the pesticide container and on this supplemental labeling. This supplemental labeling must be in the possession of the user at the time of pesticide application.

**[INSERT BRAND NAME]**

Herbicide

EPA Reg. No. 524-539

Keep out of reach of children.

**CAUTION!**

In case of an emergency involving this product, Call Collect, day or night, 314-694-4000.

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[INSERT BRAND NAME] is a registered trademark of Monsanto Technology LLC.

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### DIRECTIONS FOR USE

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

This labeling must be in the possession of the user at the time of herbicide application.

AVOID CONTACT OF HERBICIDE WITH FOLIAGE, GREEN STEMS, EXPOSED NON-WOODY ROOTS OR FRUIT OF CROPS, DESIRABLE PLANTS AND TREES, BECAUSE SEVERE INJURY OR DESTRUCTION MAY RESULT.

See "GENERAL INFORMATION" and "MIXING" sections of the label booklet for [INSERT BRAND NAME] for essential product performance information.

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[INSERT SPECIFIC DIRECTIONS FOR USE FROM FOLLOWING SECTIONS HERE]

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Read the "Limit of Warranty and Liability" in the label booklet for [INSERT BRAND NAME] before using. These terms apply to this supplemental labeling and if these terms are not acceptable, return the product unopened at once.

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**A. LIMITATIONS ON AERIAL APPLICATION IN CALIFORNIA ONLY,  
INCLUDING FRESNO COUNTY, CALIFORNIA**

**DIRECTIONS FOR USE**

All labeled treatments may be made by aerial equipment where appropriate, provided that the applicator complies with the precautions and restrictions specified on this supplemental labeling and in the product label booklet. Refer to Aerial Equipment in the "APPLICATION EQUIPMENT AND TECHNIQUES" section of the product label for additional information. Refer to the individual use site section of the product label, or to other supplemental labeling or technical fact sheets published separately for this product by Monsanto, for specific use instructions.

**AVOID DRIFT—DO NOT APPLY WHEN WINDS ARE GUSTY OR UNDER ANY OTHER CONDITION WHICH FAVORS DRIFT. DRIFT MAY CAUSE DAMAGE TO ANY VEGETATION CONTACTED TO WHICH TREATMENT IS NOT INTENDED. TO PREVENT INJURY TO ADJACENT DESIRABLE VEGETATION, APPROPRIATE BUFFER ZONES MUST BE MAINTAINED.**

Use the following guidelines when aerial applications are made near crops or desirable perennial vegetation after bud break and before total leaf drop, and/or near other desirable vegetation or annual crops.

1. Do not apply within 100 feet of all desirable vegetation or crop(s).
2. If wind up to 5 miles per hour is blowing toward desirable vegetation or crop(s), do not apply within 500 feet of the desirable vegetation or crop(s).
3. Winds blowing from 5 to 10 miles per hour toward desirable vegetation or crop(s) may require buffer zones in excess of 500 feet.
4. Do not apply when winds are in excess of 10 miles per hour or when inversion conditions exist.

When applied as recommended under the conditions described, this product controls annual and perennial weeds listed in the label booklet.

When tank-mixing this product with 2,4-D, only 2,4-D amine formulations may be used for aerial application in California. Tank mixtures with 2,4-D amine formulations may be applied by air in California for fallow and reduced tillage systems, and for alfalfa and pasture renovation applications only.

This product, when tank-mixed with dicamba, may not be applied by air in California.

**ADDITIONAL INFORMATION FOR FRESNO COUNTY, CALIFORNIA**

The following information applies only from February 15 through March 31 within the following boundaries of Fresno County, California:

- North: Fresno County line
- South: Fresno County line
- East: State Highway 99
- West: Fresno County line

Always read and follow the label directions and precautionary statements for all products used in the aerial application

Observe the following directions to minimize off-site movement during aerial application of this product. Minimization of off-site movement is the responsibility of the grower, Pest Control Advisor and aerial applicator.



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**Written Recommendations**

A written recommendation MUST be submitted by or on behalf of the applicator to the Fresno County Agricultural Commissioner 24 hours prior to the application. This written recommendation MUST state the proximity of surrounding crops, and that conditions of each manufacturer's product label and this label have been satisfied.

**Aerial Applicator Training and Equipment**

Aerial application of this product is limited to pilots who have successfully completed a Fresno County Agricultural Commissioner and California Department of Pesticide Regulation approved training program for aerial application of herbicides. All aircraft must be inspected, critiqued in flight and certified at a Fresno County Agricultural Commissioner approved fly-in. Test and calibrate spray equipment at intervals sufficient to insure that proper rates of herbicides and adjuvants are being applied during commercial use. Applicator must document such calibrations and testing. Demonstration of performance at Fresno County Agricultural Commissioner approved fly-ins constitutes such documentation, or other written records showing calculations and measurements of flight and spray parameters acceptable to the Fresno County Agricultural Commissioner.

**Applications at Night**—Do not apply this product by air earlier than 30 minutes prior to sunrise and/or later than 30 minutes after sunset without prior permission from the Fresno County Agricultural Commissioner.

To report known or suspected misuse of this product, call 1-800-332-3111.

For additional information on the proper aerial application of this product, call 916-784-1718.

**B. FOR USE FOR SELECTIVE WEED CONTROL ON [INSERT BRAND NAME] TOLERANT PURE GOLD® TALL FESCUE AND AURORA GOLD® FINE FESCUE SELECTIONS**

**DIRECTIONS FOR USE**

**[INSERT BRAND NAME] Tolerant Tall Fescue Selections For Seed Production**

Use this product on [INSERT BRAND NAME] tolerant tall and fine fescue grown for seed production only.

This product may be applied at rates of 3 to 11 fluid ounces per acre as a postemergence spray on [INSERT BRAND NAME] tolerant tall fescue selections. See the label booklet for application instructions, rate recommendations, weeds controlled and proper growth stage of weeds.

When applied postemergence, this product will control or suppress the following weeds: annual bluegrass mustards, downy brome, cheatgrass, chickweed, pennycress, fleabane, shepherd's-purse, sowthistle, wild oat, dandelion, quackgrass, and Canada thistle. See the [INSERT BRAND NAME] label booklet for a complete list of weeds controlled or suppressed.

**NOTE:** The recommended rate for this use will limit the level of control of certain species of weeds.

**NOTE:** Some crop discoloration and yellowing may occur at higher rates of application with [INSERT BRAND NAME] tolerant tall and fine fescue selections. Reduction in stand of these selections may occur under stress conditions.

**Timing Of Applications**

Applications can be made 6 weeks after germination and to established crops after growth resumes in the Fall until onset of dormancy and in the Spring after dormancy break until 60 days prior to harvest.

Avoid spraying during or within two weeks after periods when air temperatures fall below 25°F.

Remove domestic livestock from the seed production field prior to application. Wait 60 days after making this application before grazing or harvesting the treated area.

**NOTE:** Only two applications per crop growth cycle may be made to any one site. If two applications are required, only one Fall and one Spring application may be made during one 12 month cycle.

<b>C. [INSERT BRAND NAME] HERBICIDE AND TANK MIXTURE RATE RECOMMENDATIONS FOR NON-CROP AREAS</b>
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#### DIRECTIONS FOR USE

Do not allow spray mixtures of this herbicide to mist, drip, drift or splash onto desirable vegetation since injury or destruction may occur. Do not apply when wind or other conditions favor drift.

See the "WEEDS CONTROLLED" section of the [INSERT BRAND NAME] label booklet for rate recommendations. For difficult to control species, where dense stands occur, or where conditions for control are not ideal, 4 to 7 quarts per acre of this product may be used for improved results.

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#### TANK MIXTURES

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This product provides control of the emerged weeds listed in the label booklet. When applied as a tank mixture, the following herbicides will provide preemergence and/or postemergence control of the weeds listed in the individual product labels.

The following list of products may be tank mixed with this product, provided that the specific product is registered for application to the target site. Any recommended rate of this product may be used in a tank mixture with these products. Refer to these product labels for approved sites and application rates.

Tank-Mix Product(s)	Rate per Acre
Arsenal™	0.5 to 4 pints
2,4-D	0.5 to 1 pound
Garlon™ 3A	1 to 6 pints
Garlon 4	1 to 6 pints
diuron	4 to 8 pounds
diuron + 2,4-D	4 to 8 pounds + 0.5 to 1 pound
diuron + Garlon 3A	4 to 10 pounds + 1 to 2 pints
diuron + Garlon 4	4 to 10 pounds + 1 to 2 pints
Hyvar™ X	4 to 8 pounds
Hyvar X + 2,4-D	4 to 8 pounds + 0.5 to 1 pound
Hyvar X + Garlon 3A	4 to 8 pounds + 1 to 2 pints
Hyvar X + Garlon 4	4 to 8 pounds + 1 to 2 pints
Krovar™ I DF	4 to 6 pounds
Krovar I DF + 2,4-D	4 to 6 pounds + 0.5 to 1 pound
Krovar I DF + Garlon 3A	4 to 6 pounds + 1 to 2 pints
Krovar I DF + Garlon 4	4 to 6 pounds + 1 to 2 pints

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Oust™	2 to 6 ounces
Oust + 2,4-D	2 to 6 ounces + 0.5 to 1 pound
Oust + Garlon 3A	2 to 6 ounces + 1 to 2 pints
Oust + Garlon 4	2 to 6 ounces + 1 to 2 pints
Spike™ 80W	2 to 5 pounds
Spike 80W + 2,4-D	2 to 5 pounds + 0.5 to 1 pound
Spike 80W + Garlon 3A	2 to 5 pounds + 1 to 2 pints
Spike 80W + Garlon 4	2 to 5 pounds + 1 to 2 pints

\*Arsenal is not approved for use in the state of California.

Refer to the individual product labels for specific non-crop sites, rates, carrier volumes and precautionary statements.

Read and carefully observe the label claims, cautionary statements, recommended use rates and all other information on the labels of all products used in these tank mixtures. Use according to the most restrictive label directions for each product in the mixture.

Maintain good agitation at all times during the mixing process. Ensure that the tank-mix products are well mixed with the spray solution before adding this product.

Mix only the quantity of spray solution that can be used during the same day. Tank mixtures allowed to stand overnight may result in reduced weed control.

Maintain good agitation at all times until the contents of the tank are sprayed. If the spray mixture is allowed to settle, thorough agitation is required to resuspend the mixture before spraying is resumed.

When used in combination as recommended by Monsanto Company, the liability of Monsanto shall in no manner extend to any damage, loss or injury not solely and directly caused by the inclusion of the Monsanto product in such combination use.

#### D. TANK MIXTURES FOR IMPROVED CONTROL OF BENTGRASS (*Agrostis spp.*)

##### DIRECTIONS FOR USE

[INSERT BRAND NAME] herbicide may be tank mixed with the products listed below for improved control of bentgrass (*Agrostis spp.*). When tank mixing, read and carefully observe label directions, cautionary statements and all information on the labels of each product used. Refer to each individual product label for approved use sites.

ENVOY®	FUSILADE® II
FUSION®	VANTAGE®

Dry ammonium sulfate, at 1 to 2 percent by weight, may be added to the spray solution for the above applications. The equivalent rate of ammonium sulfate in a liquid formulation may also be used. Ensure that ammonium sulfate is completely dissolved in the spray tank before adding herbicides. Thoroughly rinse the spray system with clean water after use to reduce corrosion.

##### Broadcast Treatment

- Apply 1.6 to 2.2 quarts per acre of this product plus 34 fluid ounces per acre of **Envoy** in 20 to 40 gallons per acre of spray solution.
- Apply 1.6 to 2.2 quarts per acre of this product plus 24 fluid ounces per acre of **Fusilade II** in 20 to 40 gallons per acre of spray solution.

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- Apply 1.6 to 2.2 quarts per acre of this product plus 60 fluid ounces per acre of **Vantage** in 20 to 40 gallons per acre of spray solution.
- Apply 1.6 to 2.2 quarts per acre of this product plus 9 fluid ounces per acre of **Fusion** in 20 to 40 gallons per acre of spray solution.

Re-treatment may be needed in the event of incomplete control.

**Spot Treatment**

- Mix 1.5 fluid ounces of this product with 1.3 fluid ounces of **Envoy** in one gallon of water and spray-to-wet.
- Mix 1.5 fluid ounces of this product with 0.75 fluid ounces of **Fusilade II** in one gallon of water and spray-to-wet.
- Mix 1.5 fluid ounces of this product with 3 fluid ounces of **Vantage** in one gallon of water and spray-to-wet.
- Mix 1.5 fluid ounces of this product with 0.25 fluid ounces of **Fusion** in one gallon of water and spray-to-wet.

**ATTENTION: AVOID DRIFT. EXTREME CARE MUST BE USED WHEN APPLYING THIS PRODUCT TO PREVENT INJURY TO DESIRABLE PLANTS AND CROPS**