

524-534

2/2/2006

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

OFFICE OF
PREVENTION, PESTICIDES
TOXIC SUBSTANCES

AND

FEB 2 2006

Ms. Dawn Fee-White
Monsanto Company
1300 I (Eye) Street, N.W., Suite 450 East
Washington, DC 20005

Dear Ms Fee-White:

Subject: MON 44951 (Reformat and Revise Label)
EPA Registration No. 524-534
Application Dated November 18, 2005

The labeling referred to above, submitted in connection with registration under the Federal Insecticide, Fungicide, and Rodenticide Act, as amended is acceptable, provided you make the following changes before you release the product for shipment.

1. In your Limit of Warranty and Liability section, revise the third paragraph to read "**To the fullest extent permitted by law**, Buyer and all users are responsible for all loss or damage..."
2. In your Limit of Warranty and Liability section, revise the last sentence of the fourth paragraph to read "**TO THE FULLEST EXTENT PERMITTED BY LAW, IN NO EVENT SHALL THIS COMPANY OR ANY OTHER SELLER BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL, OR SPECIAL DAMAGES.**"

Submit a copy of your final printed labeling incorporating the above changes before you release the product for shipment. Amended labeling supercedes all previously accepted ones. A stamped copy of labeling is enclosed for your records.

Sincerely,

Checked Kuhlens for
James A. Tompkins
Product Manager 25
Herbicide Branch
Registration Division (7505C)

2 7 26

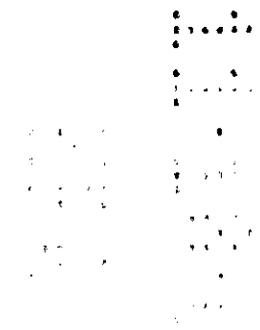
MASTER LABEL FOR EPA REG. NO. 524-534

REGISTERED BRAND NAMES:

MON 44951

Certainty® Turf Herbicide

Primary Label	2-22
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PRODUCT LOGO

[INSERT BRAND NAME] herbicide is a selective herbicide for control of annual and perennial grass and broadleaf weeds in highly managed turf sites.

Complete Directions For Use

EPA Reg. No. 524-534

[year code]

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" 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 OR REPACKAGING.

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1.0 INGREDIENTS

ACTIVE INGREDIENT:

Sulfosulfuron, 75.0%

OTHER INGREDIENTS: 25.0%

100.0%

[INSERT BRAND NAME] herbicide is formulated as a water dispersible granule (WDG).

This product is protected by U.S. Patent Nos. 5,017,212 and 5,534,482. No license granted under any non U.S. Patent(s).

2.0 IMPORTANT PHONE NUMBERS

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

1-800-332-3111.

- 2. 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 or clothing. Wash thoroughly with soap and water after handling

**ACCEPTED
with COMMENTS
In EPA Letter Dated:
FEB - 2 2006**

*Under the Federal Insecticide,
Fungicide, and Rodenticide Act,
as amended, for the pesticide
registered under EPA Reg. No.
524-534*

FIRST AID	
IF IN EYES	<ul style="list-style-type: none"> • Hold eye open and rinse slowly and gently with water for 15-20 minutes. • Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eyes. • Call a poison control center or physician for treatment advice.
<ul style="list-style-type: none"> • Have the product container or label with you when calling a poison control center or physician, or going for treatment. • In case of an emergency involving this product, Call Collect, day or night, (314) 694-4000. • This product is identified as [INSERT BRAND NAME], EPA Reg. No. 524-534. 	

Personal Protective Equipment (PPE)

Applicators and other handlers must wear: long-sleeved shirt and long pants and shoes plus socks.

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

[For WPS uses only, delete this paragraph when sub-label contains only non-WPS uses] When handlers use closed systems or enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240 (d) (4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

User Safety Recommendations

Users should:

- Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.

3.2 Environmental Hazards

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

This pesticide is highly toxic to non-target plants. Do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark. Drift and runoff may be hazardous to plants in neighboring areas. Do not contaminate water when cleaning equipment or disposing of equipment washwaters or rinsate.

The use of any pesticide in a manner that may kill or otherwise harm an endangered species or adversely modify their habitat is a violation of Federal Laws.

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.

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

Agricultural Use Requirements

[Agricultural Use Requirements box can be deleted if sub-label contains only non-WPS uses.]

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 12 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
 - Chemical-resistant gloves, such as nitrile rubber, neoprene rubber or polyethylene.
- For more options, follow the instructions for Category A (dry and water-based formulations) on an EPA chemical resistant category selection chart.

Non-Agricultural Use Requirements

[Non-Agricultural Use Requirements box can be delete if sub-label contains only non-WPS uses.]

The requirements in this box apply to uses of this product that are NOT within the scope of the Worker Protection Standard (40 CFR Part 170) for agricultural pesticides. 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.

Optional statement for Non-WPS sub-label: 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: Store under cool, dry conditions (below 120°F). Do not store under moist conditions.

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.

See individual container label for DISPOSAL information.

CONTAINER DISPOSAL: Emptied container retains product residue. Observe all labeled safe guards until container is destroyed. Do not reuse container. Triple rinse container, then 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.

5.0 GENERAL INFORMATION

Product Description: This product is a postemergence, systemic herbicide with limited soil residual activity. It provides postemergence control of many annual and perennial sedges, grass and broadleaf weeds on highly managed turf, sod farms and native grass sites. It is a selective herbicide that can be used over-the-top of many perennial warm-season and selected cool-season turf grasses. Refer to the appropriate sections of this label for approved turf species.

Best results are obtained when target weeds are not disturbed by mowing for at least 2 days before and 2 days after application.

Time to Symptoms: This product is absorbed by both the roots and the foliage of plants and rapidly inhibits the growth of susceptible weeds. Susceptible weeds usually show yellowing or browning within 2 to 3 weeks. Warm, moist conditions following application will accelerate herbicidal activity. Cold, dry conditions will delay herbicidal activity. Weeds stressed by drought are less susceptible to this product.

Rainfastness: Heavy rainfall or irrigation within 2 hours after application may wash this product off of the foliage and a repeat application may be required for adequate control.

Annual Maximum Use Rate: The combined total of all treatments must not exceed 2.66 ounces of this product per acre per year.

IMPORTANT: Avoid contact of this product with the roots or foliage of susceptible non-target vegetation as injury may occur. This includes areas where this product may be washed or moved into contact with roots of desirable vegetation.

Susceptible plants may be injured if seeded or transplanted into treated areas unless otherwise directed in this label.

6.0 MIXING

Thoroughly clean equipment prior to mixing spray solution.

6.1 Mixing with Water

This product mixes readily with water. Mix spray solutions of this product as follows: Fill the spray tank with about three-fourths of the desired final volume. Add the recommended amount of this product. Complete the filling process while maintaining agitation. Use caution to avoid siphoning back into the carrier source. Use approved anti-back-siphoning devices where required by state or local regulations. Add nonionic surfactant near the end of the filling process.

6.2 Tank Mixing Procedure

For tank mixtures, add individual formulations to the spray tank in the following sequence: water, water soluble bags, dry flowables, emulsifiable concentrates, drift control additive, water soluble liquids, nonionic surfactants.

6.3 Surfactants and Adjuvants

Use a nonionic surfactant at 0.25 to 0.5 percent by volume (1 to 2 quarts per 100 gallons of spray solution). Use only nonionic surfactants that contain at least 90 percent active ingredient. **Do not use nonionic surfactants or other additives that alter the pH of the spray solution below pH 5. Do not use surfactants that contain d'Limonene.**

6.4 Colorants and Dyes

Colorants or marking dyes approved for uses listed on this label may be added to spray solutions of this product. Colorants or dyes may reduce performance of this product, especially at higher rates or dilution. Use colorants or dyes according to the manufacturer's recommendations.

7.0 APPLICATION EQUIPMENT AND TECHNIQUES

Apply spray solutions of this product with properly maintained and calibrated equipment capable of delivering desired volumes.

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

7.1 Spray Drift Management

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

Avoid applying at excessive speed or pressure. Care must be taken to prevent injury to desirable plants when applying this product. Do not allow this herbicide solution to mist, drift, or splash onto desirable non-target vegetation. 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 the generation of fine spray particles (mist) that are likely to drift beyond the application site.

7.2 Ground Broadcast Equipment

Apply this product uniformly with properly calibrated ground equipment in 10 to 50 gallons of water per acre. Select spray volumes that ensure thorough and uniform weed coverage. Use equipment that is capable of continuous agitation. Choose nozzles that provide optimum spray distribution and uniform coverage at a spray pressure appropriate for applying postemergence herbicides. Avoid streaking, skips, overlaps and spray drift during application.

7.3 Backpack and Hand-Held Equipment

Backpack, hand-held and other similar-type sprayers may be used to apply this product. Apply to foliage of vegetation to be controlled on a spray-to-wet basis. Do not spray to the point of runoff. Spray coverage should be uniform and complete.

Measuring Scoop Instructions (included in product packaging)

All applications should be made at 2 gallons of spray solution per 1000 square feet, which is considered a "spray-to-wet" application.

Using the **LARGE SCOOP** provided, refer to the following table for the appropriate Mix Volume (gallons of water) required to achieve the Desired Rate of application per acre.

Desired Rate (ounces of product / acre)	Number of Scoops (large scoop)	Mix Volume (gallons of water)	Spray Rate (gallons/1000 ft ²)
1.25	1	2.0	2
1.00	1	2.5	2
0.75	1	3.3	2
0.50	1	5.0	2
0.25	1	10.0	2
Ensure that product is measured as a level scoop and is not rounded			

Using the **SMALL SCOOP** provided, refer to the following table for the Number of Scoops of product required to achieve the Desired Rate of application per acre when mixed in 2 gallons of water.

Desired Rate (ounces of product / acre)	Number of Scoops (small scoop)	Mix Volume (gallons of water)	Spray Rate (gallons/1000 ft ²)
0.25	1	2.0	2
0.50	2	2.0	2
0.75	3	2.0	2
1.00	4	2.0	2
1.25	5	2.0	2
Ensure that product is measured as a level scoop and is not rounded			

Add 2 teaspoons (1/3 fluid ounce) of non-ionic surfactant per gallon of water.

7.4 Equipment Cleaning

Thoroughly clean application equipment immediately after using this product with a 1-percent solution of ammonia (1 quart of ammonia for every 25 gallons of rinse water). Use a sufficient volume of cleaning solution to thoroughly rinse all surfaces and to flush all hoses. Repeat the cleaning procedure with the ammonia solution. Complete the cleaning procedure by rinsing thoroughly with clean water.

If visible residue is present in the spray tank, a 1-percent solution of ammonia plus 0.25 percent nonionic surfactant (0.25 quart per 25 gallons of water) is recommended for adequate cleaning.

8.0 SITE AND USE RECOMMENDATIONS

This product may be used for general weed control on highly managed ornamental turf and native grasses. This product may be applied to residential and commercial turf sites, including athletic fields, cemeteries, golf course fairways, golf course roughs, golf course tees, and other golf course areas, parks, public turf areas, school grounds, sod and turfgrass seed farms, and other highly managed turfgrass sites. **Do not apply to golf course putting greens or within 4 feet of the greens.**

This product may be applied at recommended rates as a post-directed spray around any established woody ornamental species in landscaped areas. For transplanted woody ornamentals, allow three months after transplanting before applying this product. Note: Avoid contact of this product with leaves of desirable plants as foliar injury, discoloration or loss of the plant may result.

8.1 Warm-Season Turfgrasses

This product generally has been shown to be safe for use on the warm-season turfgrasses listed below.

- Bermudagrass (common or hybrid)
- Zoysiagrass
- Centipedegrass
- St. Augustinegrass
- Kikuyugrass
- Seashore paspalum

Use of this product may result in temporary chlorosis and/or stunting of the desirable turf. St. Augustinegrass and seashore paspalum may be more sensitive to this product than other grasses depending on environmental conditions, cultivar differences and other influential factors. For St. Augustinegrass and seashore paspalum, test this product on a

small area prior to wide-scale use to determine if this product is suitable for your management and cultural practices.

8.1.1 Sedge Control in Warm-Season Turfgrasses

For the selective control of sedges (including purple nutsedge, yellow nutsedge, *Kyllinga* spp., annual sedges) in warm-season turfgrasses, apply this product at 1.33 ounces per acre. A sequential application of 1.33 ounces per acre may be made 4 or more weeks after the initial treatment, if needed.

8.1.2 Tall Fescue Control in Bermudagrass Turf

For the selective control of tall fescue in common or hybrid bermudagrass turf, apply a single application of this product at 2.0 ounces per acre. Or, for enhanced control, sequential applications of this product may be made at 1.33 ounces per acre followed by a second application of 1.33 ounces per acre 4 or more weeks after the initial treatment.

8.1.3 Dallisgrass Suppression in Bermudagrass Golf Course Fairways, Roughs, and Tees

The following application includes the use of MSMA. MSMA can cause injury to common and hybrid bermudagrass turf. Test the following tank mix recommendation on a small area prior to wide-scale use to determine if this application is suitable for your bermudagrass management objectives.

For suppression of dallisgrass in bermudagrass turf, apply this product beginning in late May or early June when dallisgrass is actively growing, at 1.25 ounces of product per acre in a tank mixture with MSMA at 2 pounds active ingredient per acre and 0.25%, by volume, non-ionic surfactant. Reapply this same tank mixture 2 to 4 weeks after initial application.

8.1.4 Buttonweed Suppression in Bermudagrass Golf Course Fairways, Roughs, and Tees

For suppression of buttonweed in bermudagrass turf, apply this product at 1.25 ounces per acre. This application will provide suppression or partial control of buttonweed for 4 to 6 weeks.

For enhanced buttonweed control, tank-mix this product with a broadleaf herbicide labeled for buttonweed control in bermudagrass. Consult label of tank mix product for use directions and precautions.

8.1.5 Annual Bluegrass (*Poa annua*) and Other Weed Control in Non-Overseeded Bermudagrass Turf (Actively Growing, Dormant or at Green-Up)

For selective control of annual bluegrass (*Poa annua*), or to control or partially control other annual and perennial weeds listed in Section 9.0, WEEDS CONTROLLED, in highly managed bermudagrass sites, apply this product at 0.67 to 1.33 ounces per acre. Use the higher rate of this product for control in areas of established, dense weed infestation.

Best results are obtained when weeds are in the early stage of growth and are not disturbed by mowing.

Fall applications for *Poa annua* control can begin as early as September 1.

IN DORMANT BERMUDAGRASS ONLY, tank mixtures of this product with Roundup PRO® or QuikPRO® herbicides may be used to increase the spectrum of vegetation controlled. When tank mixing, read and carefully follow the label directions, precautionary statements and all other label information on Roundup PRO or QuikPRO herbicides. Refer to the Roundup PRO or QuikPRO product labels for approved application rates. Always apply tank mixtures according to the most restrictive precautionary statements of the products being used.

8.1.6 Annual Bluegrass (*Poa annua*) Control Prior to Overseeding Bermudagrass Turf with Perennial Ryegrass

Apply this product at 2.0 ounces per acre to control *Poa annua* prior to overseeding bermudagrass turf with perennial ryegrass. Begin applications after *Poa annua* germination and 7 to 10 days prior to overseeding.

Use on golf course fairways, roughs, approaches, and tees.

For additional growth regulation of bermudagrass to aid in perennial ryegrass overseed establishment, this product may be applied as a tank mix with Roundup PRO herbicide at 2 to 4 fluid ounces per acre.

OPTIONAL STATEMENT: Do not use this product for this application in Arizona, California, or Nevada.

8.1.7 Removal of Overseeded Perennial Ryegrass (Transition Aid)

For removal of overseeded perennial ryegrass in highly managed bermudagrass sites at or around the time of bermudagrass green-up or when bermudagrass is actively growing, apply this product at 1.33 ounces per acre. A second application of 1.33 ounces per acre may be made 14 to 21 days after initial treatment, if needed.

Spring applications for perennial ryegrass control should begin up to 4 weeks before perennial ryegrass removal is desired.

8.1.8 General Weed Control in Warm-Season Turfgrasses

For control of other weeds listed in Section 9.0, WEEDS CONTROLLED, in warm-season turfgrasses, apply this product at 1.25 ounces per acre. A second application of 1.25 ounces per acre may be made 4 or more weeks after the initial treatment, if needed.

8.2 Cool-Season Turfgrasses

[OPTIONAL STATEMENT] Recommendations made in this section are for use ONLY on golf courses, sod farms and turfgrass seed farms.

This product generally has been shown to be safe for use on the cool-season turfgrasses listed below.

- Kentucky bluegrass
- Perennial ryegrass
- Fine fescues
- Creeping bentgrass

Use of this product may result in temporary chlorosis and/or stunting of the desirable turf. Perennial ryegrass, fine fescues and creeping bentgrass are more sensitive to this product depending on environmental conditions, cultivar differences and other influential factors. If turf discoloration occurs, skip or delay additional applications to allow turf to recover to a desirable quality. Test this product on a small area prior to wide-scale use to determine if this product is suitable for your management and cultural practices.

8.2.1 Weed Control in Established Creeping Bentgrass

Use of this product may result in temporary chlorosis and/or stunting of creeping bentgrass turf. Cool temperatures, heavy moisture levels and high soil clay content will enhance chlorosis or stunting. If turf discoloration or excessive thinning occurs, skip or delay additional applications to allow turf to recover to a desirable quality.

Sodding or overseeding may be needed to cover open areas and maintain overall turf quality. Creeping bentgrass can be slit-seeded into treated areas beginning 14 days after the last application of this product.

8.2.1.1 Roughstalk Bluegrass (*Poa trivialis*) Control in Established Creeping Bentgrass Golf Course Fairways, Roughs, Approaches and Tees

For suppression of *Poa trivialis* in established creeping bentgrass turf, apply 0.25 ounce of this product per acre. For enhanced control, up to two sequential applications of 0.25 ounce of this product per acre at 14- to 21-day intervals may be made. Make all applications between June 1 and September 15.

For severe *Poa trivialis* infestations, apply a single application of 1.0 ounce per acre of this product in late summer, 21 to 28 days prior to overseeding creeping bentgrass in a renovation approach. Slit-seed open areas to manage turf back into desirable quality.

8.2.2 Weed Control in Established Kentucky Bluegrass

Weed control recommendations in this section are for use ONLY on pure stands of Kentucky bluegrass. For weed control in mixed stands of cool-season turfgrasses, refer to Section 8.2.3 of this label.

Some chlorosis or stunting of the desirable turf may occur following application.

8.2.2.1 Sedge Control in Kentucky Bluegrass

For control of purple or yellow nutsedge in established Kentucky bluegrass turf, apply a single application of up to 2.0 ounces of this product per acre after nutsedge has reached the 3- to 8-leaf stage of growth. Or, for enhanced control, apply this product at up to 1.25 ounces per acre, followed by a second application of up to 1.25 ounces per acre 4 or more weeks after the initial treatment.

8.2.2.2 Roughstalk Bluegrass (*Poa trivialis*) Control in Kentucky Bluegrass

For control of *Poa trivialis* in established Kentucky bluegrass turf, apply a single application of up to 2.0 ounces of this product per acre. Or, for enhanced control, apply this product at up to 1.25 ounce per acre followed by a second application of up to 1.25 ounces per acre 14 to 21 days after the initial treatment.

As *Poa trivialis* is controlled, open turf spaces may occur. Sodding or overseeding may be needed to cover open areas and maintain overall turf quality. Kentucky bluegrass can be slit-seeded into treated areas beginning 14 days after the last application of this product.

8.2.2.3 Tall Fescue Control in Kentucky Bluegrass

For control of tall fescue in established Kentucky bluegrass turf, apply a single application of 2.0 ounces of this product per acre. For enhanced tall fescue control, apply this

product at up to 1.25 ounces per acre, followed by a sequential application of up to 1.25 ounces per acre 21 to 28 days after the initial treatment. Applications should be made when tall fescue is actively growing.

8.2.2.4 Creeping Bentgrass Control in Kentucky Bluegrass

For suppression of creeping bentgrass in established Kentucky bluegrass turf, apply a single application of 2.0 ounces of this product per acre. For enhanced control, apply up to 1.25 ounces of this product per acre, followed by a sequential application of up to 1.25 ounces per acre 14 to 21 days after the initial application.

Treat creeping bentgrass in late fall or early winter when air temperatures drop consistently below 50 degrees F. Time of application based on air temperature can be measured using Growing Degree Days (GDD). $GDD = \text{average maximum air temperature} + \text{average minimum air temperature} \div 2 - 50$. Start applications when the GDD is at 0 to 10. Temporary chlorosis and/or stunting of the desirable turf may occur following application and up until the following spring. As creeping bentgrass infestations are controlled, open turf spaces may occur. Regrowth of creeping bentgrass may occur. To minimize bentgrass regrowth and to maintain overall turf quality, sodding or overseeding of open areas may be needed. Kentucky bluegrass can be sodded or slit-seeded into treated areas beginning 14 days after the last application of this product, or as early as possible the following spring.

8.2.2.5 General Weed Control in Kentucky Bluegrass

For control of other weeds listed in Section 9.0, WEEDS CONTROLLED, in established Kentucky bluegrass turf, apply a single application of this product at up to 2.0 ounces per acre. Or, for enhanced control, apply up to 1.25 ounces of this product per acre, followed by a sequential application of up to 1.25 ounces per acre 4 or more weeks after the initial treatment.

8.2.3 Weed Control in Established Mixed Stands of Cool-Season Turfgrasses

This product is recommended for use on established stands of the cool-season turfgrasses listed below.

- Kentucky bluegrass
- Perennial ryegrass
- Fine fescues

Some chlorosis or stunting of the desirable turf may occur following application.

Over application and/or poor application technique may result in severe turf injury, thinning or loss of mixed grass stands.

8.2.3.1 Sedge Suppression In Mixed Stands of Cool-Season Turfgrasses

For suppression of purple or yellow nutsedge in established mixed stands of cool-season turfgrasses, apply 0.5 ounce of this product per acre after nutsedge has reached the 3- to 8-leaf stage of growth. A sequential application of 0.5 ounce per acre may be made 4 or more weeks after the initial treatment, if needed.

8.2.3.2 Roughstalk Bluegrass (*Poa trivialis*) Suppression in Mixed Stands of Cool-Season Turfgrasses

For suppression of *Poa trivialis* in mixed stands of cool-season turfgrasses, apply a single application of up to 0.5 ounce of this product per acre. A sequential application of up to 0.5 ounce of this product per acre may be made 14 to 21 days after the initial application, if needed.

As *Poa trivialis* is controlled, open turf spaces may occur. Regrowth of *Poa trivialis* may also occur. To cover open areas, to minimize regrowth, and to maintain overall turf quality, sodding or overseeding of open areas may be needed. Kentucky bluegrass, perennial ryegrass or fine fescues can be sodded or slit-seeded into treated areas beginning 14 days after the last application of this product.

8.3 Native Grasses

This product generally has been shown to be safe for use on the warm-season native grasses listed below.

- Big bluestem
- Little bluestem
- Bushy bluestem
- Blue oats grama
- Buffalograss
- Indiangrass
- Lovegrass
- Swichgrass

Use of this product may result in temporary chlorosis and/or stunting of the desirable native grasses. If discoloration or excessive thinning of the desirable grasses occurs, skip or delay additional applications to allow the native grasses to recover to a desirable quality. Test this product on a small area prior to wide-scale use to determine if this product is suitable for your management and cultural practices.

8.3.1 Sedge and Johnsongrass Control in Native Grasses

For the selective control of sedges (including purple nutsedge, yellow nutsedge, *Kyllinga* spp., annual sedges) and johnsongrass, apply this product at 1.33 ounces per acre. A second application of 1.33 ounces per acre may be made 4 or more weeks after the initial treatment, if needed.

8.3.2 Tall Fescue Control in Native Grasses

For the selective control of tall fescue, apply a single application of this product at up to 2.0 ounces per acre. Or, for enhanced control, apply this product at up to 1.33 ounces per acre followed by a second application of up to 1.33 ounces per acre 4 or more weeks after the initial treatment.

8.3.3 General Weed Control in Native Grasses

For control of other weeds listed in Section 9.0, WEEDS CONTROLLED, in the perennial native grasses listed in Section 8.3, apply this product at 1.25 ounces per acre. A second application of 1.25 ounces per acre may be made 4 or more weeks after the initial treatment, if needed.

9.0 WEEDS CONTROLLED [Optional Section]

Barley, little

Hordeum pusillum

Barley, volunteer

Hordeum vulgare

Bedstraw; catchweed

Galium aparine

Beggarweed, Florida¹

Desmodium tortuosum

Bentgrass, creeping

Agrostis stolonifera

Bluegrass, annual

Poa annua

Bluegrass, roughstalk

Poa trivialis

Bluegrass, bulbous

Poa bulbosa

Burweed, lawn

Soliva pterosperna

Buttercup

Ranunculus arvensis

Buttonweed¹

Diodia virginiana

Chamber bitter*Phyllanthus urinaria***Chamomile, mayweed***Anthemus cotula***Chickweed, common***Stellaria media***Clover, white***Trifolium repens***Crowfootgrass***Dactyloctenium aegyptium***Dallisgrass¹***Paspalum dilatatum***Dandelion***Taraxacum officinale***Dichondra, Carolina***Dichondra carolinensis***Fescue, tall***Festuca arundinacea***Garlic, wild***Allium vineale***Geranium, Carolina***Geranium carolinianum***Henbit¹***Lamium amplexicaule***Ivy, ground***Glechoma hederacea***Johnsongrass***Sorghum halepense***Kyllinga, false green***Kyllinga gracilima***Kyllinga, fragrant***Kyllinga sesquiflorus***Kyllinga, green***Kyllinga brevifolia***Mustard, tumble***Sisymbrium altissimum***Mustard, wild***Sinapis arvensis***Nutsedge, purple***Cyperus rotundus***Nutsedge, yellow***Cyperus esculentus***Pennycress, field**

Thlaspi arvense
Pennywort, lawn¹
Hydrocotyle sibthorpioides
Quackgrass¹
Elytrigia repens
Ryegrass, perennial
Lolium perenne
Sedge, globe
Cyperus croceus
Sedges, annual
Cyperus spp.
Shepherd's-purse
Capsella bursa-pastoris
Violet, wild
Viola pratensis
Woodsorrell, yellow
Oxalis stricta

¹ Suppression or partial control only

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 pamphlet ("Directions") when used in accordance with those Directions under the conditions described therein. 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.

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Call Collect, day or night, (314) 694-4000.

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Formulated in the United States Using Active Ingredient Made in Japan.

Changes reflected on 000524-00534-20051118.pdf

- Section 4.0** Removed Container Disposal information for foil pouch packaging since we will no longer be offering this product in foil packaging.
- Section 5.0** **Product Description:** added reference to the use of this product on selected cool-season turf grasses.
 Removed the statement "Do not use on feed or food crops." The absence of uses on feed and food crops on the label is itself enough of a statement to the fact that these uses are not allowed with this product.
 Moved section on avoiding drift to its own subsection under Section 7.0, APPLICATION EQUIPMENT AND TECHNIQUES—Section 7.1, Spray Drift Management.
- Section 6.3** **Surfactants and Adjuvants:** Added statement specifically about not using surfactants that contain d'Limonene because of compatibility issues experienced in the field.
- Section 7.3** **Backpack and Hand-Held Equipment (formerly Section 7.2)**
 All mixing instructions for hand-held application equipment have been moved to this section and deleted elsewhere in the label.
 Instructions have been added for using a dual measuring scoop, with a large scoop on one end and a small scoop on the other, which will be included in the product packaging to assist the user in preparing backpack and hand-held equipment spray solutions.
 A table has been added indicating spray volume dilutions needed for one large, level scoop to prepare spray solutions that, when applied at 2 gallons per 1000 square feet, will deliver between 0.25 and 1.25 ounces of product per acre,
 A table has been added to the label indicating the number of small, level scoops of product needed to prepare 2 gallons of spray solution that, when applied to 1000 square feet, will deliver between 0.25 and 1.25 ounces of product per acre.
- Section 8.0** **SITE AND USE RECOMMENDATIONS** has been modified and reformatted extensively.
- Section 8.1** **Warm-Season Turfgrasses** with eight (8) subsections (8.1.1 through 8.1.8) for recommendations for specific weeds and turf situations.
 Added seashore paspalum turf as a warm-season turf grass approved for use with this product.
- Section 8.1.1** **Sedge Control in Warm-Season Turfgrasses (formerly Section 8.1).**
- Section 8.1.2** **Tall Fescue Control in Bermudagrass Turf (formerly Section 8.2)**
 Changed the sequential application interval from "4 to 10 weeks" to "4 or more weeks" after the initial treatment, if needed.
- Section 8.1.3** **Dallisgrass Suppression in Bermudagrass Golf Course Fairways, Roughs, and Tees.**

Dallisgrass (*Paspalum dilatatum*) added to Section 9.0, WEEDS CONTROLLED, footnoted to indicate suppression or partial control only

Section 8.1.4 Buttonweed Suppression in Bermudagrass Golf Course Fairways, Rounghs, and Tees.

Buttonweed (*Diodia virginiana*) added to Section 9.0, WEEDS CONTROLLED, footnoted to indicate suppression or partial control only.

Section 8.1.5 Annual Bluegrass (*Poa annua*) and Other Weed Control in Non-Overseeded Bermudagrass Turf (Actively Growing, Dormant or at Green-Up) (formerly Section 8.3).

Section 8.1.6 Annual Bluegrass (*Poa annua*) Control Prior to Overseeding Bermudagrass Turf with Perennial Ryegrass (formerly Section 8.4).

Increased rate recommendation from "1.33 to 2.0 ounces per acre" to "2.0 ounces per acre."

Added tank mix recommendation, "For additional growth regulation of Bermudagrass to aid perennial ryegrass overseed establishment, 2.0 ounces of this product per acre may be applied as a tank mix with 2 to 4 fluid ounces of Roundup PRO herbicide."

Defined the southwestern U.S. as "Arizona, California, or Nevada" in the optional statement restricting this use in the southwestern U.S.

Section 8.1.7 Removal of Overseeded Perennial Ryegrass (Transition Aid) (formerly Section 8.6)

Section 8.1.8 General Weed Control in Warm-Season Turfgrasses

Section 8.2 Cool Season Turfgrasses, with a listing of recommended turfgrasses and precautions.

Section 8.2.1 Weed Control in Established Creeping Bentgrass

Section 8.2.1.1 Roughstalk Bluegrass (*Poa trivialis*) Control in Established Creeping Bentgrass Fairways, Rounghs, Approaches and Tees (formerly section 8.7).

Increased the rate for severe *Poa trivialis* infestations from a single application of "0.5 ounce per acre" to a single application of "1.0 ounce of this product per acre."

Section 8.2.2 Weed Control in Established Kentucky Bluegrass (formerly Section 8.8)

Section divided into five (5) subsections (8.2.2.1 through 8.2.2.5) that address control of specific weeds in Kentucky bluegrass.

Section 8.2.2.1 Sedge Control in Kentucky Bluegrass

Section 8.2.2.2 Roughstalk Bluegrass (*Poa trivialis*) Control in Kentucky Bluegrass

Section 8.2.2.3 Tall Fescue Control in Kentucky Bluegrass

Section 8.2.2.4 Creeping Bentgrass Control in Kentucky Bluegrass

Section 8.2.2.5 General Weed Control in Kentucky Bluegrass

Section 8.2.3 Weed Control in Established Mixed Stands of Cool-Season Turfgrasses,
with recommended cool-season turfgrasses listed and precautions stated.

Section divided into two (2) subsections (8.2.3.1 and 8.2.3.2) that address control of specific weeds in Kentucky Bluegrass

Section 8.2.3.1 Sedge Suppression in Mixed Stands of Cool-Season Turfgrasses

Section 8.2.3.2 Roughstalk Bluegrass (*Poa trivialis*) Suppression in Mixed Stands of Cool-Season Turfgrasses

Section 8.3 Native Grasses (formerly Section 8.9).

Section divided into three (3) subsections (8.3.1 through 8.3.3) that address control of specific weeds in native grasses.

Section 8.3.1 Sedges and Johnsongrass Control in Native Grasses

Changed the sequential application interval from "4 to 10 weeks" to "4 or more weeks" after the initial treatment, if needed.

Section 8.3.2 Tall Fescue Control in Native Grasses (formerly Section 8.9.2).

Section 8.3.3 General Weed Control in Native Grasses.

Section 9.0 WEEDS CONTROLLED

The following 12 weed species have been added to the label:

- Barley, little [*Hordeum pusillum*]
- Beggarweed, Florida¹ [*Desmodium tortuosum*]
- Burweed, lawn [*Soliva pterosperma*]
- Buttonweed¹ [*Diodia virginiana*]
- Chamber bitter [*Phyllanthus urinaria*]
- Dallisgrass¹ [*Paspalum dilatatum*]
- Dichondra, Carolina [*Dichondra carolinensis*]
- Geranium, Carolina [*Geranium carolinianum*]
- Ivy, ground [*Glechoma hederacea*]
- Pennywort, lawn [*Hydrocotyle sibthorpioides*]
- Violet, wild [*Viola pratincola*]
- Woodsorrell, yellow [*Oxalis stricta*]

Florida beggarweed, buttonweed and dallisgrass, and henbit and quackgrass are only suppressed or partially controlled by this product, as indicated by the footnote attached to the name, and the following qualifier added at the end of the list of weeds:

¹ Suppression or partial control only