





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

FEB | 7 2000

OFFICE OF
PREVENTION, PESTICIDES AND
TOXIC SUBSTANCES

Mr. William M. Mahlburg Nufarm, Inc. 1009-D West St. Maartens dr. St. Joseph, MO 64506

Dear Mr. Mahlburg:

Subject:

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Label Amendment Extending 2,4-D Use in Reduced or No-Tillage Soybeans

(Pre-plant Only)

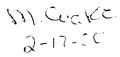
Weedone 638 Broadleaf Herbicide

EPA Reg. No. 71368-3

Your Application Dated October 23, 1999

The Agency is conditionally approving an amendment to the registration of the above-referenced product under the authority of section 3(c)(7)(B) of the Federal Insecticide, Fungicide Act (FIFRA). This amendment allows use of the subject product on reduced or no-tillage soybeans (pre-plant only) with a maximum permissible level for residues of the herbicide in or on soybeans of 0.1 ppm. This amendment will expire automatically on December 31, 2001. In addition, during the period that this amendment is effective, it will be subject to the conditions listed below:

- This acceptance is based on your certification that the submitted labeling on preplant soybean use is an exact copy of the labeling accepted by the Agency on March 15, 1996. Please note that the acceptance of this labeling pertains to the previously approved preplant soybean use only and does not signify the acceptance of any other labeling revisions. No other label revisions are being reviewed or considered with this action. You should also note that if you fail to satisfy the conditions imposed in this certification, EPA may issue a notice to cancel this amendment under FIFRA section 6(e).
- This conditional registration will expire automatically on December 31, 2001. Sale or distribution of the subject product bearing labeling for this use on reduced or no-tillage soybeans (pre-plant only) after December 31, 2001 will be illegal. The tolerance



authorizing residues of the subject product will also expire on December 31, 2001. After that date, sale or distribution of food in interstate commerce containing any residue of the subject product will be a violation of the Federal Food, Drug, and Cosmetic Act.

3) Finally, if and when a permanent tolerance is established, EPA will entertain an application to amend the registration of the subject product without any special limitations on the duration of the amendment.

A stamped copy of the labeling is enclosed for your records. Please submit one copy of your final printed labeling before you release the product for shipment.

Sincerely yours,

Joanne I. Miller Product Manager (23) Herbicide Branch Registration Division (7505C)

Enclosure

ACCEPTED with COMMENTS In EPA Letter Dated



FEB 17 2000 Weedone 638

Under the Federal Insosticide Fundicide, and Redemicide Act as amended, for the pesticide reguered under EPA Rep. No. 77, 36, 8 - 3

Broadleaf Herbicide

A SPECIAL FORMULATION CONTAINING 2,4-D ACID

*Total 2,4-Dichlorophenoxyacetic acid equivalent 30.8% by weight or 2.8 lbs. per gallon** **Isomer specific by AOAC Method No. 978.05

EPA REG. NO. 71368-3

EPA EST. NO. 71368-MO-1

DANGER - PELIGRO

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

See Below For Additional Precautionary Statements

CALC /

NET CONTENTS

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Chemical MTREC (80		Fire,	or	Exposure,	Cal

STATEMENT OF PRACTICAL TREATMENT

If In Eyes: Hold eyelid open and flush with a steady gentle stream of water for at least 15 minutes. Get medical attention, preferably an OPHTHALMOLOGIST.

If Swallowed: Give two or three glasses of water to drink. Do not induce vomiting. Do not induce vomiting or give anything by mouth to an unconscious person. Get medical attention.

If On Skin: Wash with plenty of soap and water, if available.

If Inhaled: Remove victim to fresh air. If not breathing, give artificial respiration. Administer oxygen if necessary. Get medical attention.

NOTE TO PHYSICIAN: No specific antidote is available. All treatments should be based on observed signs and symptoms of

distress in the patient. Overexposure to materials other than this product may have occurred.

This product contains petroleum distillates. If large amounts, greater than 1 mg/kg body weight have been ingested, the stomach should be evacuated by gastric intubation with the aid of a cuffed endotracheai tube to prevent aspiration of petroleum distillates. After removal of stomach contents, wash stomach by instilling 30 to 50 grams of activated charcoal in 3 to 4 ounces of water through the stomach tuce and again remove stomach contents. Avoid oily laxatives.

PRECAUTIONARY STATEMENTS HAZARDS TO HUMANS AND DOMESTIC ANIMALS DANGER

Causes irreversible eye damage. Harmful if swallowed or absorbed through the skin. Avoid breathing spray mist. Do not get in eyes, on skin or on clothing.

Personal Protective Equipment (PPE): Some materials that are chemical-resistant to this product are listed below. If you want more options, follow the instructions for category E on an EPA chemical resistance category selection chart.

Applicators and other handlers must wear: long-sleeved shirt and long pants, chemical resistant gloves such as barrier laminate or butyl rubber or nitrile rubber or viton, shoes plus socks and protective eve wear.

Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry. After each day of use, clothing or PPE must not be reused until it has been cleaned.

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

For containers over 1 gallon but less than 5 gallons, mixers and loaders who do not use mechanical system (probe and pump) to transfer the contents of this container must wear coveralls or chemical-resistant apron in addition to the other required PPE.

For containers of 5 gallons or more, a mechanical transfer system (probe and pump) must be used for transferring the contents of the container. If the contents of a non-refillable pesticide containers are emptied, the probe must be rinsed before removal. If the mechanical system is used in a manner that meets the requiremental listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d) (4)] the handler PPE requirements may be reduced or modified as specified in the WPS.

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USER SAFETY RECOMMENDATIONS

Users should:

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

ENVIRONMENTAL HAZARDS

This product is toxic to fish. Drift or runoff may adversely affect fish and non-target plants. Do not apply directly to water or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment washwaters.

Do not contaminate water used for irrigation or domestic purposes. Do not apply when weather conditions favor drift from treated areas. Avoid spray drift to susceptible plants such as cotton, beans, peas, ornamentals, and most vegetables, as injury may occur. Coarse sprays are less likely to drift. Under very high temperature, vapors from this product may injure susceptible plants in the immediate vicinity.

MIXING AND LOADING: Most cases of ground water contamination involving phenoxy herbicides such 2,4-D have been associated with mixing/loading and disposal sites. Caution should be exercised when handling 2,4-D pesticides at such sites to prevent contamination of ground water supplies. Use of closed systems for mixing or transferring this pesticide will reduce the probability of spills. Placement of the mixing/loading equipment on an impervious pad to contain spills will help prevent ground water contamination.

DIRECTIONS FOR USE

It is a violation of Federal Law to use this product in a manner inconsistent with its labeling. Read entire label before using this product. Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the agency responsible for pesticide regulation.

AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 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 entry into treated areas during the restricted entry interval (REI) of 48 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, chemical-resistant gloves such as barrier laminate or butyl rubber or nitrile rubber or viton, shoes plus socks and protective eye wear.

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 (WPS) 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.

For omamental turf uses (golf courses, cemeteries, parks and other turf grass areas), do not enter treatment areas until sprays have dried. Do not allow people (other than applicator) or pets on treatment area during application.

STORAGE AND DISPOSAL

STORAGE: Do not contaminate water, food or feed by storage or disposal. Store in original container in a dry secured storage area. Keep container tightly closed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide, spray mixture or rinsate is a violation of Federal law and may contaminate ground water. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency or the Hazardous Waste representative at the nearest EPA Regional office for guidance.

CONTAINER DISPOSAL: Triple rinse or equivalent. Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

GENERAL CAUTIONS AND RESTRICTIONS

Do not apply WEEDONE® 638 Broadleaf Herbicide through any type of irrigation system. Do not use in or near a greenhouse.

MIXING INSTRUCTIONS

Add one-half the required amount of water to the spray tank, then add the WEEDONE[®] 638 with agitation, and finally, the balance of the water with continued agitation. Provide continuous agitation to insure uniform spray mixtures. Use spray mixture as soon as possible after mixing.

COMPATIBILITY

If WEEDONE® 638 is to be tank mixed with fertilizers or with other pesticides, compatibility should be tested prior to mixing. To test for compatibility, use a small container and mix a small amount (0.5 to 1 quart) of spray, combining all ingredients in the same ratio as the anticipated use. If any indications of physical incompatibility develop, do not use this mixture for spraying. Indications of incompatibility usually will appear within 5 to 15 minutes after mixing. Read and follow the label of each tank-mix product used for precautionary statements, directions for use, geographic and other restrictions.

COMBINATION WITH LIQUID NITROGEN FERTILIZER

Use the recommended amount of WEEDONE® 638 Broadleaf Herbicide per acre for weeding and feeding corn, small grains, grasses for sect-

production or grass pastures as directed on this label. Use the fertilizer at rates recommended by supplier or Extension Service Specialist. Fill the spray tank about half full with the liquid fertilizer, then add the WEEDONE® 638 with vigorous agitation, and complete filling the tank. Apply immediately and continue agitation in the spray tank during application. Do not allow mixture to stand overnight. NOTE: Fertilizers can increase foliage contact burn of herbicides. Reducing the fertilizer rate and concentration will reduce the hazard of leaf burn.

GENERAL INFORMATION

WEEDONE® 638 Broadleaf Herbicide is a special formulation containing 2,4-D acid. WEEDONE® 638 is more effective than 2.4-D amines for controlling hard-to-kill weeds such as field bindweed, Russian knapweed, Canada thistle, leafy spurge, cattails, tules and nutgrass.

WEEDONE[®] 638 Broadleaf Herbicide should be applied when daytime temperatures are lower than 80 to 85 degrees. Spraying when temperatures are higher may cause rapid foliar burn and decrease the effectiveness of WEEDONE[®] 638. Treatment at higher temperatures also increases the possibility of crop injury.

INJURY TO CROPS FROM THIS HERBICIDE MAY OCCUR. IF YOU ARE NOT PREPARED TO ACCEPT SOME DEGREE OF CROP INJURY DO NOT USE THIS PRODUCT.

Crop varieties vary in response to 2,4-D and some are easily injured. Apply WEEDONE® 638 only to varieties known to be tolerant to 2,4-D. If you are uncertain concerning tolerant varieties or local use situations that may affect crop tolerance to 2,4-D consult your seed company or state Agricultural Extension Service for advice.

GENERAL WEED LIST

Annual and Biennial Weeds

mustards (except blue mustard)

annual yellow sweetclover pepper weeds (except *beggarticks perennial) **pigweeds (Amaranthus spp.) bullthistle coffeeweed *prickly lettuce ragweed (common or giant) common broomweed rough fleabane common burdock common cocklebur *Russian thistle common evening primrose *Salsify (western or common) common lambsquarters *smartweeds (annual species) croton (Texas or woolly) sowthistles (annual or spiny) galinsoga sunflower jimsonweed velvetleaf *knotweed *vervains *mallow (venice or little) vetches †*wild carrot marshelder wild lettuce morningglory (common, ivy, woolly) wild parsnip *musk thistle*** wild radish

Perennial Weeds

i Giemmai Meeus	
*alfalfa	*hoary cress
*Austrian fieldcress	Jerusalem-artichoke
*bindweed (hedge, field and	*many-flower aster
European)	*nettles (including stinging)
blue lettuce	*orange hawkweed
*Canada thistle	plantains
catnip	sowthistle (perennial)
chicory	*tansy ragwort
dandelion	Texas blueweed
*docks	*vervains
*dogbanes	*western ironweed
*goldenrod	*wild garlic
*ground ivy	*wild onion

*These species may require repeated applications and/or use of the higher rate recommended on this product label even under ideal conditions for application.

**Control of pigweeds in the High Plains area of Texas and Oklahoma may not be satisfactory with this product.

***Not registered for control of musk thistle in California.

SPECIFIC USE DIRECTIONS

CEREAL GRAIN CROPS

WHEAT AND BARLEY (not underseeded with legumes)

WEEDS IN CROP	AMOUNT OF WEEDONE® 638 PER ACRE	DIRECTIONS
Postemergence Annual and biennial weeds	1 pint	Apply after grain is fully tillered (usually about 4 to 8 inches high) but not forming joints in the stem. Apply when weeds
Perennial broadleaf weeds	2 pints*	are near bud stage. Do not spray grain in boot to dough stage.
Wild onion or garlic	1½ to 2 pints	Apply 1½ pints when grain is fully tillered and wild garlic or onion plants are small. Apply 2 pints after harvest in the crop stubble. For control of new fall growth of wild onion on garlic, refer to FALLOWILAND, use directions.

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Emergency weed control in Wheat Perennial broadleaf weeds	3 pints*	Apply when weeds are approaching bud stage, but do not spray grain during the boot to dough stage. The 3 pints per acre application can produce injury to wheat. Balance the severity of your weed problem against the possibility of crop damage. Where perennial weeds are scattered, spot treatment is suggested to minimize
Preharvest	1 to 2 pints*	the extent of crop injury. Apply when grains are in the hard dough stage to suppress large weeds that may interfere with harvest. Best results will be obtained when soil moisture is sufficient to induce succulent weed growth. DO NOT USE IN CALIFORNIA.

*Use the lower rate if small annual and biennial weeds are the major problem. Use the higher rate if perennial weeds or annual and biennial weeds are present which are in the hard-to-kill categories as determined by local experience. The higher rates increase the risk of grain injury and should be used only where tweed control problem justifies the grain damage risk. Do not apply to grain in the seedling stage.

RESTRICTIONS AND LIMITATIONS FOR USE ON CEREAL GRAINS

For aerial application on grain, apply WEEDONE® 638 Broadleaf Herbicide in 2 or more gallons of water per acre.

For ground application, a minimum of 10 to 15 gallons of water per acre is recommended for proper spray coverage.

Do not mix with oil for crop uses.

Do not permit dairy animals or meat animals being finished for slaughter to forage treated grain fields within 2 weeks after treatment.

Do not feed treated straw to livestock if an emergency treatment as described above is applied.

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AMOUNT OF				
WEEDS IN	WEEDONE®	DIRECTIONS		
CROP	638 PER			
	ACRE			
Preplant	1½ to 2½ pints	To control emerged		
, - · · · p · · · · · ·	172 to 272 parts	broadleaf weed seedlings		
 		or existing cover crops		
		prior to planting corn, apply		
		7 to 14 days before		
		planting. Do not use on		
		light, sandy soil, or where		
		soil moisture is inadequate		
		for normal weed growth.		
		Use high rate for control of		
•		less susceptible weeds or		
		cover crops such as alfalfa.		
Preemergence	2 to 3 pints	To control broadleaf		
		weeds, apply 3 to 5 days		
		after planting but before		
		corn emerges. Use high		
		rate on soil high in organic matter. Do not use on light,		
		sandy soil, or where soil		
		moisture is inadequate for		
		normal weed growth.		
		DO NOT USE IN		
		CALI FORNIA.		
Postemergence		Avoid spraying just after		
		the first corn leaves unfold,		
Annual broadleaf		as injury may occur. Apply		
weeds	2/3 pint	when weeds are small and		
	ļ	corn is less than 8 inches		
		tall (to top of canopy). If		
		corn more than 8 inches		
		tall must be sprayed, use		
Perennial broadleaf		drop pipes. Spray when weeds are in		
weeds	1 pint	the bud to bloom stage. If		
1 110003		corn is more than 8 inches		
		tall, use drop pipes to keep		
		spray off corn leaves. Do		
		not spray in the		
	ļ	tassel to dent stage.		
		2,4-D may make corn		
	Į	brittle. Winds or cultivation		
	1	may cause stalk breakage		
1		while brittle.		

Preharvest	1½ to 2½ pints	After the dent stage to suppress weeds that interfere with harvest, such as bindweed, cocklebur, dogbane, jimsonweed, ragweed, sunflower and velvetleaf, and to decrease the production of weed seeds, spray with air or ground equipment. The high rate will be needed for weeds under stress. DO NOT USE IN CALIFORNIA.
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Do not forage or feed sorghum fodder for 7 days following application. A minimum application volume of 5 gallons per acre by air or 10 gallons per acre by ground is recommended.

SOYBEANS (Preplant Only)

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WEEDS IN CROP	AMOUNT OF WEEDONE® 638 PER ACRE	DIRECTIONS
Post- emergence	1 to 1-1/3 pints	Apply not less than 7 days prior to planting soybeans, when weeds are small and actively growing. Use the higher rate on larger weeds and when perennials are present. Some weeds may require repeat treatment for adequate control (see GENERAL WEED LIST and below.)
	> 1-1/3 to 2-2/3 pints	Apply not less than 30 days prior to planting soybeans, when weeds are actively growing. Some weeds may require repeat treatment for adequate control (see GENERAL WEED LIST and below.)
		In addition to those weeds found on the GENERAL WEED LIST, WEEDONE® 638 will suppress or control the following broadleaf weeds frequently encountered in reduced tillage soybean production systems: builnettle, smallflowered bittercress, Carolina geranium, smallflowered buttercup, common and rough cinquefoil, red clover*, horseweed or marestail, mousetail, wild mustard, field pennycress, cutleaf evening primrose, common purslane, speedwell, velvetleaf, and Virginia copperleaf. * These weeds are only partially controlled.
		Apply no more than 2-2/3 pints of WEEDONE® 638 in one season prior to planting soybeans. After applying, plant soybean seed as deep as practical or at least 1-1/2 to 2 inches deep. Adjust the planter press wheel, if necessary,

POPCORN

WEEDS IN	AMOUNT OF WEEDONE® 638 PER ACRE	DIRECTIONS
Preharvest	1½ to 2½ pints	After the dent stage to suppress weeds that interfere with harvest, such as bindweed, cocklebur, dogbane, jirnsonweed, ragweed, sunflower and velvetleaf, and to decrease production of weed seeds, spray with air or ground equipment. The high rate will be needed for weeds under stress. DO NOT USE IN CALIFORNIA.

RESTRICTIONS AND LIMITATIONS FOR USE ON FIELD CORN AND POPCORN

Do not forage or feed corn fodder for 7 days following application.

A minimum application volume of 5 gallons per acre by air or 10 gallons per acre by ground is recommended.

GRAIN SORGHUM (milo)

WEEDS IN	AMOUNT OF WEEDONE® 638 PER ACRE	DIRECTIONS
Annual broadleaf weeds	1 pint	Treat when sorghum is 6 to 15 inches tall. If sorghum is taller than 8 inches (to top of canopy), use drop nozzles to keep spray off crop
Perennial broadleaf weeds	1½ pints	foliage. Do not treat during the boot, flowering or early dough stages.

RESTRICTIONS AND LIMITATIONS FOR USE ON SORGHUM

to ensure that planted seed is

completely covered.

If desired, WEEDONE® 638 may be applied pre-plant to soybeans in tank mixtures with other herbicides such as Poast®, Poast Plus®, Roundup®, Roundup D-Pak®, Honcho®, Gramoxone Extra®, Prowl®, Pursuit Plus®, Scepter®, Scepter 70 DG, Squadron® and others that are registered for pre-plant soybean use.

NOTE: Unacceptable injury to planted soybeans in fields previously treated WEEDONE® 638 may occur. whether or not soybean injury occurs, and the extent of injury will depend on weather and agronomic factors such as the amount of weed vegetation and previous crop residue present that may be in effect between the time of WEEDONE® 638 application and the emergence of the soybean plant.

RESTRICTIONS AND LIMITATIONS FOR USE IN SOYBEANS (PREPLANT)

Do not apply WEEDONE[®] 638 prior to planting soybeans if you are not prepared to accept the results of soybean injury including possible loss of stand and yield.

Do not apply WEEDONE $^{\circledR}$ 638 when weather conditions such as temperature, air inversions, or wind favors drift from treated areas to susceptible plants.

Apply no more than 2-2/3 pints of WEEDONE® 638 per acre in one season prior to planting soybeans.

Do not mow or cultivate weeds prior to treating with WEEDONE® 638 as poor control may result.

Do not feed treated hay, forage, or fodder or graze treated soybeans to livestock.

Only one application of WEEDONE® 638 may be made prior to planting soybeans per growing season.

Do not feed or graze treated cover crops to livestock.

Do not replant fields treated with WEEDONE® 638 in the same growing season with crops other than those labeled for 2,4-D pre-plant use.

GRASSES GROWN FOR SEED PRODUCTION

WEEDS IN CROP	AMOUNT OF WEEDONE [®] 638 PER ACRE	DIRECTIONS
Annual broadleaf weeds	1 to 1½ pints	Apply to established stands in the spring before the seed head comes into the boot stage. Do not spray in boot stage of growth. In seedling grasses apply in the spring after the grass has tillered or has at least 5 leaves but before the boot stage. Use only the low rate on seedling grasses.
Perennial and biennial broadleaf weeds	2 to 3 pints	DO NOT USE IN CALIFORNIA.

WEEDS AND BRUSH IN PASTURES, RANGELAND, FALLOW LAND AND CONSERVATION RESERVE PROGRAM AREAS

WEEDS IN	AMOUNT OF WEEDONE [®] 638 PER ACRE	DIRECTIONS
Annual broadleaf weeds	2½ pints	Apply in spring or fall when annual weeds such as knotweed or common chickweed are up but still small and in or near the seedling stage, and growing vigorously. Also controls cocklebur, galinsoga, lambsquarters, mustards, pigweed, ragweed and sunflower.
Perennial and biennial broadleaf weeds	3 to 5 pints	To control dandelion, plantain and most other common broadleaf weeds in turf, apply in spring or fall when these weeds are growing actively. Treat wild garlic or onion in three successive seasons (Example: spring fail, spring).

RESTRICTIONS AND LIMITATIONS FOR USE ON RANGELAND AND PASTURES

A minimum application volume of 2 gallons by air or 5 to 10 gallons by ground is recommended for pastures.

Do not graze animals on treated areas within 7 days of treatment,

Do not cut forage for hay within 30 days of treatment.

Do not permit dairy animals or meat animals being finished for slaughter to forage treated fields within 3 days of slaughter.

ORNAMENTAL TURF (GOLF COURSES, CEMETERIES, PARKS AND OTHER TURF AREAS)

WEEDS IN	AMOUNT OF WEEDONE [®] 638 PER ACRE	DIRECTIONS
Annual broadleaf weeds	2½ pints	Apply in spring or fall when annual weeds such as knotweed or common chickweed are up but still small and in or near the seedling stage, and growing vigorously. Also controls cocklebur, galinsoga. lambsquarters, mustards, pigweed, ragweed and sunflower.
Perennial and biennial broadleaf weeds	3 to 5 pints	To control dandelion, plantain and most other common broadleaf weeds in turf, apply in spring or fall when these weeds are growing actively. Treat wild garlic or onion in three successive seasons (Example: spring, fall, spring).

RESTRICTIONS AND LIMITATIONS FOR USE ON ORNAMENTAL TURF AREAS

A minimum application volume of 25 gallons per acre is recommended for use on turf.

Do not apply to newly seeded areas until sod is formed and grass has been cut a few times. Do not use WEEDONE[®] 638 for susceptible southern grasses such as St. Augustine. Bentgrass and clover may be injured by this treatment.

Do not apply more than 2 broadcast applications per year per treatment site. This does not exclude spot treatment.

Do not allow people (other than applicator) or pets on treatment area during application.

Do not enter treatment areas until sprays have dried.

CONSERVATION RESERVE PROGRAM AREAS

WEEDS IN CROP	AMOUNT OF WEEDONE® 638 PER ACRE	DIRECTIONS .
Annual broadleaf weeds in young grasses	2/3 to 1-1/3 pints 2/3 to 2-2/3 pints	Apply to actively growing annual broadleaf weeds. Use 2/3 to 1-1/3 pints when weeds are small; use higher rates on older weeds. Do not apply to young grasses with fewer than 6 leaves or prior to tillering, as excessive injury may result. Do not apply more than 1-1/3 pints until grasses are well established as excessive injury may result.

Biennial and	2-2/3 to 5 pints	Treat when biennial weeds are
perennial		in the seedling to rosette stage
broadleaf	5-1/3 pints	and before flower stalks become
weeds in		apparent. Treat perennial weeds
established	-	in the bud to bloom stage. Apply
grasses		to actively growing weeds.

RESTRICTIONS AND LIMITATIONS FOR USE ON CONSERVATION RESERVE PROGRAM AREAS

Use at least 2 gallons of water per acre by air and 5 gallons of water per acre by ground.

Do not harvest or graze treated Conservation Reserve Program areas. Do not apply to grasses in the boot to dough stage if grass seed production is desired.

FALLOW LAND AND CROP STUBBLE

	AMOUNT OF	
WEEDS IN	WEEDONE [®] 638 PER ACRE	DIRECTIONS
Annual	1-1/3 to 2-2/3	Use the lower rate when weeds are
broadleaf	pints	small (2 to 3 inches tall) and
weeds		growing actively. Use the higher rate on older and drought-stress
		plants, except as directed in the
		SPECIAL WEED PROBLEMS
		section of this label.
Biennial	2-2/3 to 5-1/3	Spray while musk thistles or other
broadleaf weeds	pints	biennial species are in the seedling to rosette stage, and before flower
weeds		stalks become apparent. The lower
		rate can be used in spring during
		rosette stage. In fall or after flower
		stalks have developed, use the
		highest rate, except as directed in the SPECIAL WEED PROBLEMS
		section of this label.
Perennial	1-1/2 to 4 quarts	Spray weeds in bud to bloom stage,
broadleaf		or in good vegetative growth. Do
weeds		not disturb treated area for at least 2 weeks after treatment, or until
		weed tops are dead, except as
		directed in the SPECIAL WEED
		PROBLEM section of this label.
Wild	2-2/3 to 4 quarts	Apply to new regrowth of wild onion
garlic and onion in		or garlic which codurs in the fall following harvest of small grains,
crop		soybeans, com or grain sorghum.
stubble		gram or gram or gram

RESTRICTIONS AND LIMITATIONS FOR USE ON FALLOWLAND AND CROP STUBBLE

A minimum spray volume of 5 gallons per acre by air or 10 to 15 gallons per acre by ground is recommended.

Do not plant treated fallow land until 3 months after treatment or until chemical has disappeared from soil.

Do not graze dairy animals on treated areas within 7 days of treatment.

WEEDS AND BRUSH IN NON-CROP AREAS

FENCEROWS, ROADSIDES, DRAINAGE DITCHBANKS, VACANT LOTS, AIRFIELDS, RAILROAD AND HIGHWAY AND UTILITY RIGHTS-OF-WAY, AND OTHER NON-CROP AREAS.

WEEDS IN CROP	AMOUNT OF WEEDONE [®] 638 PER ACRE	DIRECTIONS
Annual broadleaf weeds	1-1/3 to 2-2/3 quarts	Apply when most weeds are still young and growing vigorously, except as directed in the SPECIAL WEED PROBLEM section of this label.
Perennial and biennial broadleaf weeds	2 to 4 quarts	Apply when weeds are actively growing and near the bud stage, but before flowering. For best results on tansy ragwort and musk thistle, treat in rosette stage, before bolting. A second application is usually needed for best results on thistle, nettle and bindweed. Treat wild onion or garlic in early spring and in fall when they are young and growing actively, except as directed in the SPECIAL WEED PROBLEM section of this label.

SMALL AREA APPLICATIONS FOR NON-CROP USE

For control of broadleaf weeds in small non-crop areas with hand-held or back-pack sprayers, mix 5 fluid ounces WEEDONE® 638 per gallon of water. Thoroughly wet all weed foliage. Maintain agitation of mixture.

SPECIAL WEED PROBLEMS

DIRECTIONS FOR SPECIAL WEED PROBLEMS IN PASTURES, FALLOW LAND, NON-CROP AND CONSERVATION RESERVE PROGRAM AND CONSERVATION RESERVE ACREAGE

To control the following special weed problems in fallow land, non-crop areas or pastures, apply the rates indicated at the recommended application time in sufficient spray volume by air or ground to obtain thorough and uniform coverage. Thorough and uniform coverage

may require high volume ground spraying at 50 gallons per acre or more or aerial spraying at 10 gallons per acre or more when weed growth is dense. Adequate soil moisture for weed growth is essential for good control.

WEEDS	AMOUNT OF WEEDONE® 638	WHEN TO SPRAY
musk thistle	1½ to 2 quarts	rosette stage spring or fall; use higher rate in fall
field bindweed	1½ to 2 quarts	bud to full bloom
hoary cress	2 quarts	bud to full bloom
leafy spurge, Russian knapweed	2 quarts	full bloom
Canada thistle, camelthorn, lotus	2 quarts	bud to early bloom -
Canada thistle	2 quarts	in spring or summer
Canada thistle	1½ to 2½ quarts	6 to 8 inches high in fall, prior to a killing frost with good soil moisture. Do not till treated area within 7 days of treatment.
cattails, tule (hard-stem bulrush)	3 quarts	late spring to early summer when 4 to 6 feet tall; repeat in fall and following spring
tansy ragwort	3 quarts	rosette stage to early bloom
nutgrass	3 quarts	6 to 8 inches high, before bloom; repeat when regrowth is 6 to 8 inches high.

Refer to the restrictions and limitations for use on these sites.

LIMITED WARRANTY AND DISCLAIMER

The manufacturer warrants that this product conforms to the chemical description on the label; that this product is reasonably fit for the purposes set forth in the directions for use when it is used in accordance with such directions; and that the directions, warnings and other statements on this label are based upon responsible experts' evaluation of reasonable tests of effectiveness, of toxicity to laboratory animals and to plants, and of residues on food crops, and upon reports of field experience. Tests have not been made on all varieties or in all states or under all conditions. THE MANUFACTURER NEITHER MAKES NOR INTENDS, NOR DOES IT AUTHORIZE ANY AGENT OR REPRESENTATIVE TO MAKE, ANY OTHER WARRANTIES, EXPRESS OR IMPLIED, AND IT EXPRESSLY EXCLUDES AND DISCLAIMS ALL IMPLIED WARRANTIES OF MERCHANTABILITY CP. FITNESS FOR A PARTICULAR PURPOSE.

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