**GROUP** 

14

HERBICIDE





HERBICIDE SW

FOR CONTROL AND/OR SUPPRESSION OF CERTAIN WEEDS IN ALFALFA, ARTICHOKE, ASPARAGUS, BUSHBERRIES, CELERY, COTTON, FIELD CORN, GARLIC, GRAPE, HOPS, MINT, NUT TREES (INCLUDING PISTACHIO), OLIVE, ONION (DRY BULB), POME FRUIT, POMEGRANATE, STONE FRUIT, STRAWBERRY, SWEET POTATO, NON-BEARING FRUIT TREES, FALLOW LAND AND TO MAINTAIN BARE GROUND ON NON-CROP AREAS OF FARMS, ORCHARDS AND VINEYARDS.

Active Ingredient	By Wt
Flumioxazin*	51%
Other Ingredients	. 49%
Total	100%
*0[7 fl	

\*2-[7-fluoro-3,4-dihydro-3-oxo-4-(2-propynyl)-2*H*-1,4-benzoxazin-6-yl]-4,5,6,7-tetrahydro-1*H*isoindole-1,3(2*H*)-dione

Chateau® Herbicide SW is a water dispersible granule containing 51% active ingredient.

EPA Reg. No. 59639-99 EPA Est. 11773-IA-01®, 39578-TX-01® Superscript is the first letter in lot number.

## KEEP OUT OF REACH OF CHILDREN CAUTION

SEE BELOW FOR ADDITIONAL PRECAUTIONARY STATEMENTS

### PRECAUTIONARY STATEMENTS

### HAZARDS TO HUMANS & DOMESTIC ANIMALS CAUTION

Harmful if inhaled or absorbed through the skin. Causes moderate eye irritation. Avoid breathing dust and spray mist. Avoid contact with skin, eyes or clothing.

### **FIRST AID**

**If inhaled:** Move person to fresh air.

If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-

mouth if possible.

Call a poison control center or doctor for further treatment advice.

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FIRST AID (continued)

If on skin or Take off contaminated clothing.

**clothing:** Rinse skin immediately with plenty of

water for 15-20 minutes.

Call a poison control center or doctor

for treatment advice.

If in eyes: 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 contin-

ue rinsing.

Call a poison control center or doctor

for treatment advice.

If Call a poison control center or docswallowed: tor immediately for treatment advice.

Have person sip a glass of water if

able to swallow.

Do not induce vomiting unless told to by the poison control center or doctor. Do not give anything to an uncon-

scious person.

### **HOT LINE NUMBER**

Have the product container or label with you when calling a poison control center or doctor or going for treatment. You may also contact **800-892-0099** for emergency medical treatment information.

### 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: longsleeved shirt and long pants, chemical-resistant gloves made of any waterproof material such as polyethylene or polyvinyl chloride, shoes and socks.

For aerial application to artichoke, mixer/loaders must also wear: filtering face piece respirator (N95, R95 or P95).

For ground boom application to olive and pomegranate, mixer/loaders must also wear: filtering face piece respirator (N95, R95 or P95).

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.

### **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.

### **ENVIRONMENTAL HAZARDS**

This product is toxic to non-target plants and aquatic invertebrates. Do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark. Drift or runoff may be hazardous to non-target plants and aquatic organisms in neighboring areas. Do not apply where runoff is likely to occur. Do not apply when weather conditions favor drift from treated areas. Do not contaminate water when disposing of equipment washwaters.

This pesticide is toxic to plants and should be used strictly in accordance with the drift and run-off precautions on this label in order to minimize off-site exposures.

Under some conditions this product may have a potential to run-off to surface water or adjacent land. Where possible, use methods which reduce soil erosion, such as no till, limited till and contour plowing; these methods also reduce pesticide run-off. Use of vegetation filter strips along rivers, creeks, streams, wetlands or on the downhill side of fields where run-off could occur will minimize water run-off and is recommended.

### **DIRECTIONS FOR USE**

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

READ ENTIRE LABEL. USE STRICTLY IN ACCORDANCE WITH PRECAUTIONARY STATEMENTS AND DIRECTIONS, AND WITH APPLICABLE STATE AND FEDERAL REGULATIONS.

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 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.

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AGRICULTURAL USE REQUIREMENTS (continued) PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil or water is: coveralls, chemical-resistant gloves made of water-proof material, shoes plus socks.

### NON-AGRICULTURAL USE REQUIREMENTS

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

Keep all unprotected persons out of operating areas, or vicinity where there may be drift.

Do not enter or allow others to enter treated areas until sprays have dried.

### DISCLAIMER, RISKS OF USING THIS PRODUCT, LIMITED WARRANTY AND LIMITATION OF LIABILITY

IMPORTANT: Read the entire Label including this Disclaimer, Risks of Using this Product, Limited Warranty, and Limitation of Liability before using this product. If the terms are not acceptable THEN DO NOT USE THE PRODUCT; rather, return the unopened product within 15 days of purchase for a refund of the purchase price.

### RISKS OF USING THIS PRODUCT

The Buyer and User (referred to collectively herein as "Buyer") of this product should be aware that there are inherent unintended risks associated with the use of this product which are impossible to eliminate. These risks include, but are not limited to, injury to plants and crops to which this product is applied, lack of control of the target pests or weeds, resistance of the target pest or weeds to this product, injury caused by drift, and injury to rotational crops caused by carryover in the soil. Such risks of crop injury, non-performance, resistance or other unintended consequences are unavoidable and may result because of such factors as weather, soil conditions, disease, moisture conditions, irrigation practices, condition of the crop at the time of application, presence of other materials either applied in the tank mix with this product or prior to application of this product, cultural practices or the manner of use or application, (or a combination of such factors) all of which are factors beyond the control of Valent. The Buyer should be aware that these inherent unintended risks may reduce the harvested yield of the crop in all or a portion of the treated acreage, or otherwise affect the crop such that additional care, treatment and expense are required to take the crop to (continued)

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harvest. If the Buyer chooses not to accept these risks, THEN THIS PRODUCT SHOULD NOT BE APPLIED. By applying this product Buyer acknowledges and accepts these inherent unintended risks AND TO THE FULLEST EXTENT ALLOWED BY LAW, AGREES THAT ALL SUCH RISKS ASSOCIATED WITH THE APPLICATION AND USE ARE ASSUMED BY THE BUYER.

Valent shall not be responsible for losses or damages (including, but not limited to, loss of yield, increased expenses of farming the crop or such incidental, consequential or special damages that may be claimed) resulting from use of this product in any manner not set forth on the label. Buyer assumes all risks associated with the use of this product in any manner or under conditions not specifically directed or approved on the label.

### **LIMITED WARRANTY**

Valent warrants only that this product conforms to the chemical description on the label and is reasonably fit for the purposes stated in the label, under average use conditions, when used strictly in accordance with the label and subject to the Risks of Using This Product as described above. To the extent consistent with applicable law AND AS SET FORTH ABOVE, VALENT MAKES NO OTHER WARRANTIES, EITHER EXPRESSED OR IMPLIED. No agent or representative of Valent or Seller is authorized to make or create any other express or implied warranty.

### **LIMITATION OF LIABILITY**

To the fullest extent allowed by law, Valent or Seller is not liable for any incidental, consequential, indirect or special damages resulting from the use or handling of this product. The limitation includes, but is not limited to, loss of yield on all or any portion of the treated acreage, increased care, treatment or other expenses required to take the crop to harvest, increased finance charges or altered finance ratings, emotional or mental distress and/or exemplary damages. TO THE FULLEST EXTENT ALLOWED BY LAW, THE EXCLUSIVE REM-**EDY OF THE BUYER, AND THE EXCLUSIVE MAXI-MUM LIABILITY OF VALENT OR SELLER FOR ANY** AND ALL CLAIMS, LOSSES, INJURIES OR DAM-AGES (INCLUDING CLAIMS BASED ON BREACH OF WARRANTY, CONTRACT, NEGLIGENCE, TORT, STRICT LIABILITY OR OTHERWISE) RESULTING FROM THE USE OR HANDLING OF THIS PROD-**UCT SHALL BE THE RETURN OF THE PURCHASE** PRICE OF THIS PRODUCT OR, AT THE ELECTION OF VALENT OR SELLER, THE REPLACEMENT OF THE PRODUCT.

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### PROMPT NOTICE OF CLAIM

To the extent consistent with applicable law allowing such requirements Valent must be provided notice as soon as Buyer has reason to believe it may have a claim, but in no event later than twenty-one days from date of planting, or twenty-one days from the date of application, whichever is latter, so that an immediate inspection of the affected property and growing crops can be made.

To the extent consistent with applicable law if Buyer does not notify Valent of any claims, in such period, it shall be barred from obtaining any remedy.

### **NO AMENDMENTS**

Valent and Seller offer this product, and Buyer accepts it, subject to the foregoing **Disclaimer**, **Risks of Using This Product**, **Limited Warranty** and **Limitation of Liability**, which may not be modified by any oral or written agreement.

### **TANK MIXES**

NOTICE: Tank mixing or use of this product with any other product which is not specifically and expressly authorized by the label shall be the exclusive risk of user, applicator and/or application advisor, to the extent allowed by applicable law.

Read and follow the entire label of each product to be used in the tank mix with this product.

### RESISTANCE MANAGEMENT RECOMMENDATIONS

Chateau Herbicide SW is a Group 14 herbicide. Any weed population may contain or develop plants naturally resistant to *Chateau* Herbicide SW and other Group 14 herbicides. Weed species with acquired resistance to Group 14 herbicides may eventually dominate the weed population if Group 14 herbicides are used repeatedly in the same field or in successive years as the primary method of control for targeted species. This may result in partial or total loss of control of those species by *Chateau* Herbicide SW or other Group 14 herbicides.

To delay herbicide resistance consider:

- Avoiding the consecutive use of Chateau Herbicide SW or other target site of action Group 14 herbicides that might have a similar target site of action, on the same weed species.
- Using tank mixtures or premixes with herbicides from different target site of action Groups as long as the involved products are all registered for the same use, have different sites of action and are both effective at the tank mix or prepack rate on the weed(s) of concern.
- Basing herbicide use on a comprehensive Integrated Pest Management (IPM) program.
- Monitoring treated weed populations for loss of field efficacy.

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Contacting your local extension specialist, certified crop advisors and/or manufacturer for herbicide resistance management and/or integrated weed management recommendations for specific crops and resistant weed biotypes.

For further information or to report suspected resistance, you may contact Valent U.S.A. Corporation at the following toll-free number: 800-682-5368.

### TABLE OF CONTENTS

USE INFORMATI	0N
---------------	----

Restrictions and Limitations

**Environmental Conditions and** 

Biological Performance

Preemergence Application

**Burndown Application** 

Postemergence Application

Rainfastness

Soil Characteristics

Herbicide Rate

Residual Weed Control

Carrier Volume and Spray Pressure

Preemergence Application

**Burndown Application** 

Postemergence Application

Additives

Burndown Application

Jar Test to Determine Compatibility of Adjuvants

and Chateau Herbicide SW

Sprayer Preparation

Mixing Instructions

Sprayer Cleanup

Application Equipment

**Broadcast Application** 

Band Application

Aerial Application

Chemidation

Application with Dry Bulk Fertilizers

**Rotational Restrictions** 

Broadleaf Weeds Controlled by Residual

Activity of Chateau Herbicide SW . . . . . . Table 1

Weeds Suppressed by Residual Activity

of *Chateau* Herbicide SW ...... Table 2

### DIRECTIONS FOR USE IN FALL AND SPRING PREPLANT BURNDOWN AND FALLOW SEEDBED PROGRAMS IN FIELD CORN

Restrictions and Limitations

Fall Burndown and Fallow Seedbed Programs

Weeds Controlled by Fall and Spring Preplant

Burndown Programs..... Table 3

Spring Burndown Programs

### **DIRECTIONS FOR USE IN FALL AND SPRING BURNDOWN PROGRAMS IN COTTON**

**Restrictions and Limitations** Fall Burndown Programs Spring Burndown Programs **TABLE OF CONTENTS** (continued)

### **DIRECTIONS FOR USE IN FALL AND SPRING** BURNDOWN PROGRAMS IN RICE, SORGHUM, **SUNFLOWER AND WHEAT (Preplant to Crop)**

**Restrictions and Limitations** 

Fall Burndown Programs

Spring Burndown Programs

### DIRECTIONS FOR USE IN FALL BURNDOWN PROGRAMS IN FIELDS TO BE PLANTED TO BARLEY. FIELD PEA, FLAX, LENTIL, SAFFLOWER, SUNFLOWER **AND SPRING WHEAT (Preplant to Crop)**

Restrictions and Limitations

Fall Burndown Programs

### DIRECTIONS FOR USE IN FALLOW LAND **DIRECTIONS FOR USE IN ESTABLISHED ALFALFA**

Restrictions and Limitations

Timing to Alfalfa

### Timing to Weeds DIRECTIONS FOR USE IN ARTICHOKE

Restrictions and Limitations

Timing to Artichoke

Timing to Weeds

### DIRECTIONS FOR USE IN ESTABLISHED **ASPARAGUS**

Restrictions and Limitations

Timing to Asparagus

Timing to Weeds

### DIRECTIONS FOR USE IN CELERY

Restrictions and Limitations

Timing to Celery

Timing to Weeds

### DIRECTIONS FOR USE IN COTTON

Restrictions and Limitations

**Environmental Conditions and Biological** 

Performance

Herbicide Rate

Emerged Broadleaf Weeds Controlled by

Hooded, Shielded and Layby Application of Chateau Herbicide SW Tank Mixes

with Glyphosate or MSMA in Cotton..... Table 4

Carrier Volume and Spray Pressure

Additives

Application Equipment

Timing to Cotton

Timing to Weeds

Tank Mixes

Tank Mixes with Chateau Herbicide SW

for Hooded, Shielded and/or Layby

Use in Cotton..... . . . . . . . Table 5

### **DIRECTIONS FOR USE IN FIELD CORN**

Restrictions and Limitations

Timing to Field Corn

Burndown Use Directions -

For Preplant Application in Field Corn

Increasing Speed of Glyphosate

Burndown Activity

Tank Mixes

Tank Mix Partners for Burndown and/or

Residual Control of Weeds in Field Corn . . Table 6

Tank Mix Restrictions

### **TABLE OF CONTENTS** (continued)

### **DIRECTIONS FOR USE IN GARLIC**

**Restrictions and Limitations** 

Timing to Garlic

Timing to Weeds

### **DIRECTIONS FOR USE IN HOPS**

**Restrictions and Limitations** 

Timing to Hops for Sucker Control

Timing to Hops for Preemergence

Weed Control

Timing to Weeds

### DIRECTIONS FOR USE IN MINT (Peppermint and Spearmint)

Restrictions and Limitations

Timing to Mint

Timing to Weeds

Weeds Controlled by Residual

Activity of *Chateau* Herbicide SW . . . . . . Table 7

### **DIRECTIONS FOR USE IN ONIONS (DRY BULB)**

Restrictions and Limitations

Timing to Onions (dry bulb)

Timing to Weeds

### **DIRECTIONS FOR USE IN STRAWBERRY**

**Restrictions and Limitations** 

Weeds Controlled by Preemergence

Application of *Chateau* Herbicide SW . . . . Table 8

### **DIRECTIONS FOR USE IN SWEET POTATO**

**Restrictions and Limitations** 

Timing to Sweet Potatoes

Timing to Weeds

### DIRECTIONS FOR USE IN BUSHBERRIES, GRAPE, NUT TREES (INCLUDING PISTACHIO), OLIVE, POME FRUIT, POMEGRANATE, STONE FRUIT AND NON-BEARING FRUIT TREES

**Restrictions and Limitations** 

Preemergence Application

Postemergence Application

Carrier Volume and Spray Pressure

**Banded Application** 

Use Precautions for Bushberries

Use Precautions for Grapes

Use Precautions for Nut Trees

(Including Pistachio), Olive, Pome Fruit,

Pomegranate and Stone Fruit

Use Precautions for Non-Bearing Fruit Trees

Weeds Controlled by Postemergence Activity of Chateau Herbicide SW Tank Mixes...... Table 9

Additional Residual Weed Control

# DIRECTIONS FOR USE TO MAINTAIN BARE GROUND ON NON-CROP AREAS OF FARMS, ORCHARDS OR VINEYARDS

Restrictions and Limitations

Preemergence Application

Postemergence Application

Tank Mix Combinations to Maintain Bare Ground
Non-Crop Areas......Table 10

### STORAGE AND DISPOSAL

### **USE INFORMATION**

Chateau Herbicide SW uses:

Chateau Herbicide SW provides residual control of

susceptible weeds.

 Chateau Herbicide SW provides additional burndown activity when used as part of a burndown program.

 Chateau Herbicide SW can be applied as part of a fall burndown program for control of susceptible winter annuals.

- Chateau Herbicide SW can be applied with a hooded or shielded sprayer, as well as part of a layby application, in selected crops for postemergence weed control as well as residual control of susceptible weeds.
- Chateau Herbicide SW can be used on farms, orchards and vineyards for non-selective vegetation control to maintain bare ground non-crop areas that must be kept weed free.
- Read tank mix product label for rates and weeds controlled. Always read and follow label directions for all tank mix products before using. The most restrictive labeling of any tank mix product must be followed. Chateau Herbicide SW, when applied according to label use directions, will control the weeds claimed in crop specific use directions. This label makes no claims concerning control of other weed species.

### AVOIDING SPRAY DRIFT AT THE APPLICATION SITE IS THE RESPONSIBILITY OF THE APPLICATOR.

The interaction of many equipment and weather related factors determine the potential for spray drift. The applicator is responsible for considering all of these factors when making decisions. Where states have more stringent regulations, they should be observed.

### **RESTRICTIONS AND LIMITATIONS**

- Do not apply this product when weather conditions favor spray drift from treated areas.
- Do not apply during low-level inversion conditions, including fog.
- When applying by air, observe drift management restrictions and precautions listed under "AERIAL APPLICATION".
- Do not apply to frozen or snow covered soil.
- Mechanical incorporation into the soil will reduce residual weed control.
- Post directed and layby applications of Chateau Herbicide SW should be applied only to healthy growing crops.
- Do not apply to farm alleys or roads where traffic may result in treated dust settling onto crops or other desirable vegetation.
- Do not apply within 300 yards of non-dormant pears.
- Do not apply to powdery soils or soils that are susceptible to wind displacement unless irrigation can be applied immediately after application.

Spray equipment used to apply *Chateau* Herbicide SW should not be used to apply other materials to any crop foliage, unless the proper cleanout procedures are followed. See "SPRAYER CLEANUP" for more information.

### ENVIRONMENTAL CONDITIONS AND BIOLOGICAL PERFORMANCE

Preemergence Application (Conventional Tillage) Important: Crop injury may occur from applications made to poorly drained soils and/or applications made under cool, wet conditions. Risk of crop injury can be minimized by using on well drained soils, planting at least 1.5 inches deep, using high quality seed and completely covering seeds with soil prior to preemergence applications. Treated soil that is splashed onto newly emerged crops may result in temporary crop injury.

Moisture is necessary to activate *Chateau* Herbicide SW in soil for residual weed control. Dry weather following applications of *Chateau* Herbicide SW may reduce effectiveness. However, when adequate moisture is received after dry conditions, *Chateau* Herbicide SW will control susceptible germinating weeds. *Chateau* Herbicide SW may not control weeds that germinate after application but before an activating rainfall/irrigation or weeds that germinate through cracks resulting from dry soil.

When adequate moisture is not received after a *Chateau* Herbicide SW application, weed control may be improved by irrigation with at least 1/4 inch of water. If emerged weeds are controlled by cultivation, residual weed control will be reduced.

### **Burndown Application**

For best results, Chateau Herbicide SW should be applied as part of a burndown program to actively growing weeds. Applying Chateau Herbicide SW under conditions that do not promote active weed growth will reduce herbicide effectiveness. Do not apply Chateau Herbicide SW when weeds are under stress due to drought, excessive water, extremes in temperature, disease or low humidity. Weeds under stress tend to become less susceptible to herbicidal action. Chateau Herbicide SW is most effective when applied under warm sunny conditions.

Reduced residual weed control may occur when burndown applications are made to fields where heavy crop and/or weed residue exist.

### **Postemergence Application**

Chateau Herbicide SW should only be applied to healthy crops labeled for postemergence use. Do not apply Chateau Herbicide SW to crops that have been weakened by disease, drought, flooding, excessive fertilization, soil salts, previously applied pesticides, nematodes, insects or winter injury.

### Rainfastness

Chateau Herbicide SW is rainfast one hour after application. Applications should not be made if rain is expected within one hour of application or postemergence efficacy may be reduced.

### **Soil Characteristics**

Application of *Chateau* Herbicide SW to soils with high organic matter and/or high clay content may require higher dosages than soils with low organic matter and/or low clay content. Application to cloddy

seedbeds can result in reduced weed control.

#### HERBICIDE RATE

Residual Weed Control (Including Preemergence Applications or Applications as Part of a Fall or Spring Burndown and Fallow Seedbed Program)

Resedunce soil characteristics (organic matter con-

Based upon soil characteristics (organic matter content and texture), the most difficult to control weed species being targeted, and the crop being grown, select the proper *Chateau* Herbicide SW dosage from the rate range tables contained in this label.

**CARRIER VOLUME AND SPRAY PRESSURE** (Ground Equipment only. See Information for Aerial Equipment under "AERIAL APPLICATION".)

**Preemergence Application (Conventional Tillage)** 

To ensure uniform coverage, use 10 to 30 gals of spray solution per acre for conventional tillage applications. Nozzle selection should meet manufacturer's gallonage and pressure recommendations for preemergence herbicide application.

**Burndown Application (Prior to Crop Emergence)** 

To ensure thorough coverage in burndown applications, use 15 to 60 gals spray solution per acre. Use 20 to 60 gals per acre if dense vegetation or heavy crop residue is present. Nozzle selection should meet manufacturer's gallonage and pressure recommendations for postemergence herbicide application. Do not use flood jet nozzles.

### **Postemergence Application (Emerged Crop)**

Check use directions for specific crops in which *Chateau* Herbicide SW can be applied postemergence. To ensure thorough coverage in burndown applications, use a minimum of 15 gallons spray solution per acre. Use a minimum of 20 gallons per acre if dense vegetation or heavy crop residue is present. Nozzle selection should meet manufacturer's gallonage and pressure recommendations for postemergence herbicide application.

#### **ADDITIVES**

**Burndown Application (Prior to Crop Emergence)** 

Postemergence control of weeds from Chateau Herbicide SW tank mixes will require the addition of an agronomically approved adjuvant to the spray mixture. When an adjuvant is to be used with Chateau Herbicide SW, Valent recommends the use of a Chemical Producers and Distributors Association certified adjuvant. Either a crop oil concentrate or methylated seed oil which contains at least 15% emulsifiers and 80% oil or a non-ionic surfactant at 0.25% v/v, may be used when applying *Chateau* Herbicide SW as part of a burndown program. Some tank mix partners, such as Roundup Power Max®, are formulated with sufficient adjuvants and do not require the addition of a crop oil concentrate, methylated seed oil or non-ionic surfactant when tank mixed with *Chateau* Herbicide SW. The addition of a crop oil concentrate or methylated seed oil may increase the burndown activity on certain weeds such as cutleaf eveningprimrose and Carolina geranium. Mixing compatibility qualities should be verified by a jar test.

A spray grade nitrogen source (either ammonium sulfate at 2 to 2.5 lbs/A or a 28 to 32% nitrogen solution at 1 to 2 qts/A) may be added to the spray mixture along with either a crop oil concentrate, methylated seed oil or non-ionic surfactant to enhance weed control. The addition of a nitrogen source does not replace the need for a crop oil concentrate, a methylated seed oil or a non-ionic surfactant.

### JAR TEST TO DETERMINE COMPATIBILITY OF ADJUVANTS AND *Chateau* Herbicide SW

When using *Chateau* Herbicide SW and an adjuvant, such as in stale seed bed, layby, hooded/shielded or reduced tillage situations, a jar test should be performed before mixing commercial quantities of *Chateau* Herbicide SW, when using *Chateau* Herbicide SW for the first time, when using new adjuvants or when a new water source is being used.

- Add 1 pt of the water to a quart jar. The water should be from the same source and temperature as which will be used in the spray tank mixing operation.
- 2. Add 1 g of *Chateau* Herbicide SW to the quart jar for every 3 oz of *Chateau* Herbicide SW per acre being applied (4 g if 12 oz/A is the desired *Chateau* Herbicide SW rate), gently mix until product goes into suspension.
- Add 60 ml (4 Tbsps or 2 fl oz) of the crop oil or methylated seed oil to the quart jar or 1 ml of nonionic surfactant if it is being used in place of oil, gently mix.
- 4. If nitrogen is being used, add 16 ml (1 Tbsp or 0.5 oz) of the 28 to 32% nitrogen source to the quart jar. If ammonium sulfate is being used, add 19 g AMS to the quart jar in place of the 28 to 32% nitrogen.
- Place cap on jar, invert 10 times, let stand for 15 minutes, evaluate.
- An ideal tank mix combination will be uniform and free of suspended particles. If any of the following conditions are observed the choice of adjuvant should be questioned:
  - a) Layer of oil or globules on the mixture's surface.
  - Flocculation: fine particles in suspension or as a layer on the bottom of the jar.
  - c) Clabbering: thickening texture (coagulated) like gelatin.

### **SPRAYER PREPARATION**

Before applying *Chateau* Herbicide SW, start with clean, well maintained application equipment. The spray tank, as well as all hoses and booms, must be cleaned to ensure no residue from the previous spraying operation remains in the sprayer. Some pesticides, including but not limited to, the sulfonylurea and phenoxy herbicides, (i.e., Classic® and 2,4-D respectively) are active at very small amounts and can cause crop injury when applied to susceptible crops. The spray equipment must be cleaned according to the manufacturer's directions for the

last product used before the equipment is used to apply *Chateau* Herbicide SW. If two or more products were tank mixed prior to *Chateau* Herbicide SW application, the most restrictive cleanup procedure should be followed.

#### MIXING INSTRUCTIONS

- 1. Fill clean spray tank 1/2 to 2/3 of desired level with clean water.
- If a drift retardant is to be used, add 10 lbs of spray grade ammonium sulfate per 100 gals of spray solution.
- 3. To ensure a uniform spray mixture, pre-slurry the required amount of *Chateau* Herbicide SW with water prior to addition to the spray tank. Use a minimum of 1 gal of water per 10 oz of *Chateau* Herbicide SW.
- 4. While agitating, slowly add the pre-slurried *Chateau* Herbicide SW to the spray tank. Agitation should create a rippling or rolling action on the water surface.
- 5. If tank mixing Chateau Herbicide SW with other labeled herbicides, add water soluble bags first, followed by dry formulations, flowables, emulsifiable concentrates and then solutions. Prepare no more spray mixture than is required for the immediate spray operation.
- 6. Add any required adjuvants.
- 7. Fill spray tank to desired level with water. Agitation should continue until all spray solution has been applied.
- Mix only the amount of spray solution that can be applied the day of mixing. Chateau Herbicide SW should be applied within 6 hours of mixing.

### **SPRAYER CLEANUP**

Spray equipment, including mixing vessels and nurse tanks, must be cleaned each day following *Chateau* Herbicide SW application. After *Chateau* Herbicide SW is applied, the following steps must be used to clean the spray equipment:

- Completely drain the spray tank, rinse the sprayer thoroughly, including the inside and outside of the tank and all in-line screens.
- 2. Fill the spray tank with clean water and flush all hoses, booms, screens and nozzles.
- Top off tank, add 1 gal of 3% household ammonia (or equivalent) for every 100 gals of water, circulate through sprayer for 5 minutes, and then flush all hoses, booms, screens and nozzles for a minimum of 15 minutes. If diaphragms are being used on the spray boom, loosen diaphragms before flushing the spray system, allowing cleaning solution to spray through the open diaphragm. If spray lines have any end caps, they must be loosened before flushing the system, allowing cleaning solution to spray through the loosened caps. To enhance removal of *Chateau* Herbicide SW from the spray system, add a tank cleaner such as "Valent Tank Cleaner" from Valent U.S.A. Corporation, in place of ammonia and allow the cleaning solution to remain in the pressurized spray system (spray tank, hoses and boom) over-

- night before flushing the system for a minimum of 15 minutes.
- 4. Drain tank completely.
- 5. Add enough clean water to the spray tank to allow all hoses, booms, screens and nozzles to be flushed for 2 minutes.
- Remove all nozzles and screens and rinse them in clean water.

Spray equipment, including all tanks, hoses, booms, screens and nozzles, should be thoroughly cleaned before it is used to apply postemergence pesticides. Equipment with *Chateau* Herbicide SW residue remaining in the system may result in crop injury to the subsequently treated crop.

### **APPLICATION EQUIPMENT**

Application equipment should be clean and in good repair. Nozzles should be uniformly spaced on boom and frequently checked for accuracy.

#### **BROADCAST APPLICATION**

Apply *Chateau* Herbicide SW, and *Chateau* Herbicide SW tank mixes, with ground equipment using standard commercial sprayers equipped with flat fan or flood nozzles (preemergence applications only) designed to deliver the desired spray pressure and spray volume.

#### **BAND APPLICATION**

When banding, use proportionately less water and *Chateau* Herbicide SW per acre. The rate of *Chateau* Herbicide SW required per acre, when applied as a banded application, can be calculated with the following formula:

Amount Needed		Band Width in Inches		_Rate_per
per Acre for Banded Application	=	Row Width in Inches	_ X	Broadcast Acre

### **AERIAL APPLICATION**

Spray drift away from the site of application may cause damage to non-target vegetation. To minimize drift, apply the largest droplet size consistent with uniform coverage and satisfactory weed control. To obtain satisfactory application and avoid drift, the following directions must be observed:

- Do not apply during low-level inversion conditions (including fog), when winds are gusty or under other conditions that favor drift. Do not spray when wind velocity is less than 2 mph or more than 10 mph.
- Do not apply this product by air within 40 ft of nontarget plants including non-target crops.
- Do not apply this product by air within 100 ft of emerged cotton crops.
- Do not apply this product by air within 40 ft of streams, wetlands, marshes, ponds, lakes and reservoirs.
- Carrier Volume and Spray Pressure: When used as part of a burndown weed control program, apply Chateau Herbicide SW in 7 to 10 gals of water per acre. Application at less than 7 gals per acre may

provide inadequate control. When used for preemergence weed control, apply *Chateau* Herbicide SW in 5 to 10 gals of water per acre. The higher gallonage applications generally afford more consistent weed control. Do not exceed the nozzle manufacturer's recommended pressures. For many nozzle types, lower pressure produces larger droplets. When higher flow rates are needed, use higher flow rate nozzles instead of increasing pressure.

- Nozzle Selection and Orientation: Formation of very small drops may be minimized by appropriate nozzle selection, by orienting nozzles away from the air stream as much as possible and by avoiding excessive spray pressure. Use nozzles that produce flat or hollow cone spray patterns. Use non-drip type nozzles, such as diaphragm type nozzles, to avoid unwanted discharge of spray solution. The nozzles must be directed toward the rear of the aircraft, at an angle between 0 and 15° downward. Do not place nozzles on the outer 25% of the wings or rotors.
- Adjuvants and Drift Control Additives: Refer to tank mix partner's label for adjuvant recommendation. 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.

### CHEMIGATION

Follow all label recommendations for crops regarding rates, timing of application, special instructions and precautions.

Apply this product only through center pivot systems. End guns must be turned off due to uneven application. Do not apply this product through any other type of irrigation system.

Crop injury, lack of efficacy or illegal pesticide residues in the crop can result from non-uniform distribution of treated water.

The system must be properly calibrated (with water only) to ensure that the amount of *Chateau* Herbicide SW applied corresponds to the recommended rate.

Apply *Chateau* Herbicide SW in 1/2 to 3/4 inches of water during the first sprinkler set. Allow time for all lines to flush the herbicide through all nozzles before turning off irrigation water. To ensure the lines are flushed and free of remaining herbicide, a dye indicator may be injected into the lines to mark the end of the application period. Once chemigation has begun, the run must be completed to ensure no product is left in the system.

If you have any questions about calibration, you should contact your State Extension Service Specialist, equipment manufacturers or other experts.

### **Special Precautions for Chemiqation**

 Do not connect an irrigation system (including greenhouse systems) used for pesticide application to a public water system unless the pesticide label-prescribed safety devices for public water systems are in place.

- A person knowledgeable of the chemigation system and responsible for its operation or under the supervision of the responsible person, shall shut the system down and make necessary adjustments should the need arise.
- The system must be free of leaks and clogged nozzles.
- The pesticide must be supplied continuously for the duration of the aqueous application. An uneven application may cause injury to the crop or poor weed control.
- 5. Agitation must be maintained in the nurse tank.
- The sprinkler chemigation system must contain a functional check valve, vacuum relief valve and low pressure drain appropriately located on the irrigation pipeline to prevent water source contamination from backflow.
- The pesticide injection pipeline must contain a functional, automatic, quick closing check valve to prevent the flow of fluid back toward the injection pump.
- The pesticide injection pipeline must contain a functional, normally closed, solenoid operated valve located on the intake side of the injection pump and connected to the system interlock to prevent fluid from being withdrawn from the supply tank when the irrigation system is either automatically or manually shut down.
- The system must contain functional interlocking controls to automatically shut off the pesticide injection pump when the water pump motor stops, or in the case where there is no water pump, when the water pressure decreases to the point where pesticide distribution is adversely affected.
- 10. The irrigation line or water pump must include a functional pressure switch which will stop the water pump motor when the water pressure decreases to the point where pesticide distribution is adversely affected.
- 11. Systems must use a metering pump, such as a positive displacement injection pump (e.g., diaphragm pump), effectively designed and constructed of materials that are compatible with the pesticides and capable of being fitted with a system interlock.
- Do not apply when wind speed favors drift beyond the area intended for treatment.

### Chemigation Systems Connected to Public Water Systems

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

- public water system should be discharged into a reservoir tank prior to pesticide introduction. There shall be a complete physical break (air gap) between the outlet end of the fill pipe and the top overflow rim of the reservoir tank of at least twice the inside diameter of the fill pipe.
- All chemigation systems connected to the public water system must also follow restrictions listed in the preceding section titled "Special Precautions for Chemigation."

### **APPLICATION WITH DRY BULK FERTILIZERS**

Dry bulk fertilizer may be impregnated or coated with *Chateau* Herbicide SW. Application of dry bulk fertilizer with *Chateau* Herbicide SW provides weed control equal to, or slightly below, the same rate of *Chateau* Herbicide SW applied in liquid carriers, due to better coverage with application via spray equipment. Follow label recommendations for *Chateau* Herbicide SW regarding rates, special instructions, cautions and special precautions. Apply 400 to 700 lbs of the fertilizer/herbicide mixture per acre to obtain adequate soil coverage. Apply the mixture to the soil with properly calibrated equipment immediately after blending. Uniform application of the herbicide/fertilizer mixture is essential to prevent possible crop injury and to obtain uniform weed control.

Ammonium nitrate and/or limestone should not be used as the sole source of fertilizer, as the *Chateau* Herbicide SW may not adhere to these materials.

Compliance with all Federal and State regulations relating to blending pesticide mixtures with dry bulk fertilizer, registrations, labeling and application are the responsibility of the individual and/or company offering the fertilizer and *Chateau* Herbicide SW mixture for sale.

Chateau Herbicide SW must be premixed with water to form a slurry prior to impregnation on dry bulk fertilizer. For best results, use a minimum of 1 pt of water for each 2 oz of Chateau Herbicide SW. A minimum of 6 pts of the Chateau Herbicide SW slurry should be used to impregnate 2000 lbs of the fertilizer for uniform coverage of the fertilizer. Closed drum, belt, ribbon or other commonly used dry bulk blenders may be used.

The amount of *Chateau* Herbicide SW required can be calculated with the following formula:

ounces of Chateau Herbicide = SW per ton of fertilizer	ounces of <i>Chateau</i> Herbicide SW per acre	х	2000 ÷	pounds of fertilizer per acre
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Thoroughly clean dry fertilizer blending equipment after *Chateau* Herbicide SW has been placed in the system to avoid injury to sensitive crops that may be treated with fertilizers blended after the equipment has been used for *Chateau* Herbicide SW. Rinse the sides of the blender and the herbicide tank with water. Then impregnate the rinsate onto a load of dry

fertilizer intended for an approved crop. Use a maximum rate of 1 gal of rinsate per ton of fertilizer. Follow with 1 to 2 loads of unimpregnated fertilizer in the blender before switching herbicides.

**ROTATIONAL RESTRICTIONS** 

The following rotational crops may be planted after

applying *Chateau* Herbicide SW at the listed rate. Planting earlier than the recommended rotational interval may result in crop injury.

 Do not plant any crop, except corn (field), cotton, peanut, soybean and sweet potato earlier than 30 days after applying Chateau Herbicide SW.

### CHATEAU HERBICIDE SW

RATES	CROPS	ROTATION INTERVALS
1 oz/A	Cotton (no-till or strip-till only)	14 days¹
1.5 to 2 oz/A	Cotton (no-till or strip-till only)	21 days¹
2 oz/A or less	Peanut, Soybean and Sweet Potato	immediately
	Field Corn (minimum and no-till)	7 days
	Cotton and Field Corn (conventional tillage), Rice, Sorghum, Sunflower, Tobacco and Wheat	30 days¹
	Barley, Dry and Snap Beans, Flax, Peas, Rye, Safflower and Sweet Corn	3 months
	Alfalfa, Canola, Clover, Oats, Potato, Sugar Beet and all other crops not listed <sup>2</sup>	4 months if soil is tilled prior to planting 8 months if no tillage is performed
	Lentils	6 months
Up to 3 oz/A	Peanut, Soybean and Sweet Potato	immediately
	Field Corn (minimum and no-till)	14 days
	Field Corn (conventional tillage) and Sorghum	30 days¹
	Cotton, Rice, Sunflower, Tobacco and Wheat	2 months <sup>1</sup>
	Barley, Dry and Snap Beans, Flax, Peas, Rye Safflower and Sweet Corn	4 months
	Alfalfa, Clover, Oats, Potato and Sugar Beet	5 months if soil is tilled prior to planting 10 months if no tillage is performed
	Canola and all other crops not listed <sup>2</sup>	6 months if soil is tilled prior to planting 12 months if no tillage is performed
	Lentils	7 months
Up to 4 oz/A	Alfalfa, Canola, Potato, Sugar Beet and all other crops not listed <sup>2</sup>	6 months if soil is tilled prior to planting 12 months if no tillage is performed
	Cotton, Field Corn, Peanut, Rice, Sorghum, Soybean, Sunflower, Tobacco and Wheat	4 months
	Transplanted on raised beds only: Melon, Pepper and Tomato <sup>3</sup>	2 months (if the top 4 inches of the beds have been removed)
6 to 12 oz/A	Cotton, Field Corn, Peanut, Rice, Sorghum, Soybean, Sunflower, Tobacco and Wheat	9 months
	Alfalfa, Canola, Sugar Beet and all other crops not listed <sup>2</sup> Trees can be transplanted 2 months after an application of <i>Chateau</i> Herbicide SW <sup>4</sup>	12 months if soil is tilled prior to planting 18 months if no tillage is performed

<sup>&</sup>lt;sup>1</sup> At least one inch of rainfall/irrigation must occur between application and planting or crop injury may occur.

<sup>2</sup> Successful soil bioassay must be performed prior to planting these crops.

<sup>3</sup> **Arizona, California and Hawaii only:** For fallowbed application on transplanted melon, pepper and tomato beds follow supplemental labeling provided by Valent U.S.A. Corporation.

<sup>&</sup>lt;sup>4</sup> Transplanted apple, apricot, avocado, bushberries (including blueberry), cherry, fig, grape, grapefruit, lemon, nectarine, nut trees (including pistachio), olive, orange, peach, pear, plum (including dried plum), and tangerine can be planted 2 months after a *Chateau* Herbicide SW application of 2 to 12 oz/A.

Table 1. Broadleaf Weeds Controlled by Residual Activity of *Chateau* Herbicide SW

BROADLEAF WEED SPECIES				CHATEAU
SECTION A		ORGANIC	SOIL	HERBICIDE
COMMON NAME	SCIENTIFIC NAME	MATTER	TYPE	SW RATE <sup>1</sup>
Carpetweed	Mollugo verticillata	Up to 5%	All Soil	2 oz/A
Chickweeds			Types	
Common	Stellaria media			
Mouseear	Cerastium vulgatum			
Dandelion	Taraxacum officinale			
Eclipta	Eclipta prostrata			
Eveningprimrose, Cutleaf	Oenothera laciniata			
Florida Pusley	Richardia scabra			
Henbit	Lamium amplexicaule			
Lambsquarters	Chenopodium album			
Common				
Little Mallow	Malva parviflora			
Marestail/Horseweed	Conyza canadensis			
Mayweed/False Chamomile	Matricaria maritima			
Nightshades				
Black	Solanum nigrum			
Eastern Black	Solanum ptycanthum			
Hairy	Solanum sarrachoides			
Pigweeds				
Redroot	Amaranthus retroflexus			
Smooth	Amaranthus hybridus			
Spiny Amaranth	Amaranthus spinosus			
Tumble	Amaranthus albus			
Prickly Lettuce	Lactuca serriola			
Prickly Sida (Teaweed)	Sida spinosa			
Puncturevine	Tribulus terrestris			
Purslane, Common	Portulaca oleracea			
Radish, Wild	Raphanus raphanistrum			
Redmaids	Calandrinia ciliata var. me	nziessii		
Shepherd's-purse	Capsella bursa-pastoris			
Smallflower Morningglory	Jacquemontia tamnifolia			
Spotted Spurge	Eupĥorbia maculata			
Venice Mallow	Hibiscus trionum			
<b>SECTION B</b> All weeds listed i	n Section A plus:			
Coffee Senna	Cassia occidentalis	Up to 3%	All Soil	2 oz/A Cotton
Common Ragweed	Ambrosia artemisiifolia	•	Types	2.5 oz/A
Florida Beggarweed	Desmodium tortuosum		,,	Field Corn
Golden Crownbeard	Verbesina encelioides			3 oz/A All other
Hairy Indigo	Indigofera hirsuta			labeled crops
Hemp Sesbania	Sesbania exaltata	3 to 5%	Coarse and	2 oz/A Cotton
Jimsonweed	Datura stramonium	0 10 0 70	Medium Soils:	2.5 oz/A
Kochia	Kochia scoparia		(sandy loam,	Field Corn
Morningglories <sup>2</sup>	Rooma ocopana		loamy sand,	
Entireleaf	Ipomoea hederacea		loamy,	3 oz/A All other
Endiologi	var. integriuscula		silt-loam, silt,	labeled crops
lvyleaf	Ipomoea hederacea		sandy clay,	
Red/Scarlet	Ipomoea coccinea		sandy clay loam)	
Tall	Ipomoea purpurea		. ,	
Mustard, Wild	Brassica kaber			
Palmer Amaranth	Amaranthus palmeri			

(continued)

<sup>&</sup>lt;sup>1</sup> *Chateau* Herbicide SW will provide residual control of these weeds at 2 oz/A when applied under a cotton canopy. <sup>2</sup> Morningglory species are not adequately controlled on fine soils or soils with greater than 3% organic matter.

Table 1. Broadleaf Weeds Controlled by Residual Activity of Chateau Herbicide SW (continued)

<b>BROADLEAF WEED SPECII</b>	CHATEAU				
SECTION B All weeds listed in Section A plus:		ORGANIC	SOIL	HERBICIDE	
COMMON NAME	SCIENTIFIC NAME	MATTER	TYPE	SW RATE <sup>1</sup>	
Spurred Anoda Tropic Croton Waterhemps	Anoda cristata Croton glandulosus	3 to 5%	Fine Soils: (silty clay, silty clay loam,	2 oz/A Cotton 3 oz/A	
Common Tall Wild Poinsettia	Amaranthus rudis Amaranthus tuberculatus Euphorbia heterophylla		clay, clay loam)	Field Corn and all other labeled crops	

<sup>&</sup>lt;sup>1</sup> Chateau Herbicide SW will provide residual control of these weeds at 2 oz/A when applied under a cotton canopy.

Table 2. Weeds Suppressed by Residual Activity of Chateau Herbicide SW

BROADLEAF WEED SPECIES			
COMMON NAME	SCIENTIFIC NAME	ORGANIC MATTER	<b>OUNCES PER ACRE</b>
Bristly Starbur	Acanthospermum hispidum	Up to 5%	2 to 3
Copperleaf, Hophornbeam	Acalypha ostryifolia		
Ragweed, Giant	Ambrosia trifida		
Russian Thistle	Salsola iberica		
Smartweeds			
Ladysthumb	Polygonum persicaria		
Pennsylvania	Polygonum pensylvanicum		
Velvetleaf	Abutilon theophrasti		
Wild Buckwheat	Polygonum convolvulus		
Wormwood, Biennial	Artemisia biennis		
<b>GRASS WEED SPECIES</b>		_	
Barnyardgrass	Echinochloa crus-galli		
Bluegrass, Annual	Poa annua		
Crabgrass, Large	Digitaria sanguinalis		
Foxtail, Giant	Setaria faberi		
Goosegrass	Eleusine indica		
Lovegrass, California	Eragrostis diffusa		
Panicums			
Fall	Panicum dichotomiflorum		
Texas	Panicum texanum		
Signalgrass, Broadleaf	Brachiaria platyphylla		
Cheat		Up to 5%	1.5 to 3

# DIRECTIONS FOR USE IN FALL AND SPRING PREPLANT BURNDOWN AND FALLOW SEEDBED PROGRAMS IN FIELD CORN

(Preemergence to Crop)

For Use in the States of Arizona, California and Hawaii Only

### **RESTRICTIONS AND LIMITATIONS**

- Do not apply to frozen or snow covered soil.
- Do not perform any tillage operation after application or residual weed control will be reduced.
- Observe all rotational intervals prior to planting as listed in the "ROTATIONAL RESTRICTIONS" table.

### FALL BURNDOWN AND FALLOW SEEDBED PROGRAMS

Chateau Herbicide SW, at 2 to 3 oz/A can be used in the

fall to provide residual weed control in fields that will be planted the following spring with field corn. Weeds controlled by residual activity are listed in Table 1 (sections A and B), Broadleaf Weeds Controlled by Residual Activity of *Chateau* Herbicide SW; Table 3, Weeds Controlled by Fall and Spring Preplant Burndown Programs; and Table 7, Weeds Controlled by Residual Activity of *Chateau* Herbicide SW. If weeds have emerged at the time of application, use *Chateau* Herbicide SW in combination with a labeled burndown herbicide. *Chateau* Herbicide SW can be used in a fall burndown or fallow seedbed program, however the length of residual control may be variable.

Abnormally warm or wet winters will reduce the length of weed control observed in the spring.

<sup>&</sup>lt;sup>2</sup> Morningglory species are not adequately controlled on fine soils or soils with greater than 3% organic matter.

Weeds controlled by postemergence or residual activity are listed in Table 3. Preplant burndown treatment tank mixes and rates are:

Herbicide	Rate
Program 1 <sup>1</sup>	
Chateau Herbicide SW Plus	2 to 3 oz/A
Glyphosate <b>Plus</b>	0.5 to 1.0 lb ai/A (equivalent to 1 to 2 pt/A of RoundUp Original®)
NIS + AMS	0.5% v/v + 17 lbs/100 gals of water
or	
Program 2 <sup>1</sup>	
Chateau Herbicide SW Plus	2 to 3 oz/A
Glyphosate <b>Plus</b>	0.5 to 1.0 lb ai/A (equivalent to 1 to 2 pt/A of RoundUp Original)
COC <sup>2</sup>	1pt/A
or NIS + AMS	<b>or</b> 0.5% v/v + 17 lbs/100 gals of water
Or ANIO	0.3 /0 V/V + 17 103/100 gais of water
Program 3 <sup>1</sup>	
Chateau Herbicide SW Plus	2 to 3 oz/A
COC	1 pt/A

<sup>&</sup>lt;sup>1</sup> Dicamba (Banvel®), at 0.188 lb ai/A (6 fl oz/A of Banvel 4) can be added to Programs 1, 2 & 3 to assist in the control of emerged broadleaves. Refer to dicamba label for rotational restrictions.

**Table 3. Weeds Controlled by Fall and Spring Preplant Burndown Programs** 

WEEDS CONTROLLED <sup>1</sup>		`	POSTEMER	GENCE	
COMMON NAME	SCIENTIFIC NAME	Program 1	Program 2	Program 3	RESIDUAL
			Weeds 3 inch	es or less	
Chamomile, False	Matricaria maritime	Yes	Yes	No	Yes
Cheatgrass	Bromus tectorum	Yes	Yes	No	Yes
Chickweed, Common	Stellaria media	Yes	Yes	No	Yes
Chickweed, Mouseear	Cerastium vulgatum	Yes	Yes	No	Yes
Cockle, White	Silene latifolie	No	Yes	Yes	Yes
Dandelion	Taraxacum officinale	Yes	No	Yes <sup>2</sup>	Yes
Deadnettle, Purple	Lamium purpureum	Yes	Yes	Yes	Yes
Groundsel, Cressleaf	Senecio glabellus	Yes	Yes	-	Yes
Henbit	Lamium amplexicaule	Yes	Yes	Yes	Yes
Kochia	Kochia scoparia	Yes	Yes	Yes	Yes
Marestail/Horseweed	Conyza canadensis	Yes	Yes <sup>3</sup>	Yes	Yes
Mallow, Common	Malva neglecta	Yes	Yes	No	Yes
Prickly Lettuce	Lactuca serriola	Yes	Yes	Yes	Yes
Wormwood, Biennial	Artemisia biennis	Yes	Yes	Yes	Yes
		1	Weeds 12 inch	nes or less	
Canola, Volunteer	Brassica napus	Yes	Yes	Yes	Yes
Carolina Geranium	Geranium carolinianum	Yes	Yes	Yes	-
Eveningprimrose, Cutleaf <sup>4</sup>	Oenothera laciniata	Yes	Yes	Yes	Yes
Flixweed	Descurainia sophia	Yes	Yes	Yes	Yes
Mustard, Tansy	Descurainia pinnata	Yes	Yes	Yes	Yes
Mustard, Wild	Brassica kaḃer	Yes	Yes	Yes	Yes
Shepherd's-purse	Capsella bursa-pastoris	Yes	Yes	Yes	Yes

<sup>&</sup>lt;sup>2</sup> Crop oil concentrate has been found to increase glyphosate burndown of emerged cutleaf eveningprimrose and Carolina geranium.

<sup>&</sup>lt;sup>1</sup> Refer to glyphosate and/or 2,4-D labels for additional weeds controlled and rotational restrictions. <sup>2</sup> 1 lb ai/A of 2,4-D LVE (equivalent to 2 pt/A of 2,4-D 4 LVE) should be used for control of emerged dandelion.

- <sup>3</sup> Program 2 will not control emerged glyphosate resistant marestail/horseweed.
- <sup>4</sup> Program 1 should be used to control cutleaf eveningprimrose that are nearing 12 inches in height or are past the rosette stage.

Programs 2 or 3 should be used to control cutleaf eveningprimrose that are 12 inches or less and in the rosette stage.

### **SPRING BURNDOWN PROGRAMS**

Chateau Herbicide SW can be used in combination with labeled preplant burndown herbicides to assist in the postemergence burndown of emerged weeds and provide residual weed control prior to crop emergence. Weeds controlled by residual activity are listed in Table 1.

No-till planters that incorporate the soil during planting may result in decreased weed control in the row. *Chateau* Herbicide SW cannot be applied after planting field corn.

Chateau Herbicide SW can be used at 1 to 3 oz/A with labeled preplant burndown herbicides to enhance the speed of burndown and increase weed spectrum.

Chateau Herbicide SW can be used at 1 to 3 oz/A in field corn burndown programs. See "DIRECTIONS FOR USE IN FIELD CORN".

### DIRECTIONS FOR USE IN FALL AND SPRING BURNDOWN PROGRAMS IN COTTON

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Do not apply to frozen or snow covered soil.
- Do not perform any tillage operation after application or residual weed control will be reduced.
- Chateau Herbicide SW can be used at 1 to 2 oz/A with labeled burndown herbicides to enhance the speed of burndown and increase weed spectrum.
- A minimum of 30 days must pass, and 1 inch of rainfall/irrigation must occur, between *Chateau* Herbicide SW application and planting of conventionally tilled cotton.
- A minimum of 14 days must pass, and 1 inch of rainfall/irrigation must occur, between *Chateau* Herbicide SW application and planting of no-till or strip-till cotton when a *Chateau* Herbicide SW rate of 1 oz/A is used and 21 days when a *Chateau* Herbicide SW rate of 1.5 to 2 oz/A is used. The field must contain the stubble from the previous crop.
- Observe all rotational intervals prior to planting as listed in the "ROTATIONAL RESTRICTIONS" table.
- Refer to most restrictive label for minimum interval between application and planting.

### **FALL BURNDOWN PROGRAMS**

Chateau Herbicide SW, at 2 to 4 oz/A, can be used in the fall to provide residual weed control in fields that will be planted the following spring with cotton. Weeds controlled by residual activity are listed in Table 1 and Table 7. If weeds have emerged at the time of application, use Chateau Herbicide SW

in combination with a labeled burndown herbicide. *Chateau* Herbicide SW can be used in a fall burndown or fallow seedbed program.

Abnormally warm or wet winters will reduce the length of weed control observed in the spring.

### SPRING BURNDOWN PROGRAMS

Chateau Herbicide SW, at 1 to 2 oz/A, can be used in combination with labeled preplant burndown herbicides to assist in the postemergence burndown of emerged weeds and provide residual weed control prior to crop emergence in fields that will be planted with cotton. Weeds controlled by residual activity are listed in Table 1.

No-till planters that incorporate the soil during planting may result in decreased weed control in the row.

### DIRECTIONS FOR USE IN FALL AND SPRING BURNDOWN PROGRAMS IN RICE, SORGHUM, SUNFLOWER AND WHEAT

(Preplant to Crop)

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Do not apply to frozen or snow covered soil.
- Do not perform any tillage operation after application or residual weed control will be reduced.
- Chateau Herbicide SW can be used at 1 to 2 oz/A with labeled burndown herbicides to enhance the speed of burndown and increase weed spectrum. A minimum of 30 days must pass, and 1 inch of rainfall/irrigation must occur, between Chateau Herbicide SW application and planting of rice, sorghum, sunflower or wheat. Refer to most restrictive label for minimum interval between application and planting.
- Observe all rotational intervals prior to planting as listed in the "ROTATIONAL RESTRICTIONS" table.

### **FALL BURNDOWN PROGRAMS**

Chateau Herbicide SW can be used in combination with labeled burndown programs to control emerged weeds and provide residual weed control in fields that will be planted the following spring.

Abnormally warm winters may reduce the length of weed control observed in the spring.

### **SPRING BURNDOWN PROGRAMS**

Chateau Herbicide SW can be used in combination with labeled burndown programs to control emerged weeds and provide residual weed control prior to crop emergence. Weeds controlled by residual activity are listed in Table 1 Section A. Crops that will be planted following application must be in compliance with the rotational interval listed in the "Rotational RestrictionS" table on pages 19-20.

No-till planters that incorporate the soil during planting may result in decreased weed control in the row.

# DIRECTIONS FOR USE IN FALL BURNDOWN PROGRAMS IN FIELDS TO BE PLANTED TO BARLEY, FIELD PEA, FLAX, LENTIL, SAFFLOWER, SUNFLOWER AND SPRING WHEAT

(Preplant to Crop)

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Do not apply to frozen or snow covered soil.
- Do not perform any tillage operation after application or residual weed control will be reduced.
- Chateau Herbicide SW can be mixed with 2,4-D and/or glyphosate formulations labeled for burndown programs (preplant to crop) in accordance with the most restrictive label limitations and precautions. Labeled application rates can not be exceeded. Do not mix Chateau Herbicide SW with any product containing a label prohibition against such mixing.
- Observe all rotational intervals prior to planting as listed in the "ROTATIONAL RESTRICTIONS" table.

### **FALL BURNDOWN PROGRAMS**

Chateau Herbicide SW can be used at 2 to 4 oz/A with labeled burndown herbicides to enhance the speed of burndown, increase weed spectrum and provide residual weed control of the weeds listed in Table 3 until the following spring. Rotational intervals must be followed for crop to be planted in the spring following the fall *Chateau* Herbicide SW application. Refer to most restrictive label for minimum interval between application and planting.

### **DIRECTIONS FOR USE IN FALLOW LAND**

For Use in the States of Arizona, California and Hawaii Only

Chateau Herbicide SW may be used as a preemergence fallow treatment. Weeds controlled by residual activity are listed in Table 1.

Chateau Herbicide SW, at 2 to 4 oz/A, can be used in the fall to provide residual weed control in fallow fields (refer to Rotational Restrictions table for rates and rotational intervals prior to planting). If weeds have emerged at the time of application, use Chateau Herbicide SW in combination with a labeled fallow herbicide. Abnormally warm or wet winters will reduce the length of weed control observed in the spring.

Chateau Herbicide SW, at 1 to 2 oz/A, can be used in spring in combination with labeled burndown herbicides to control emerged weeds and provide residual weed control.

### DIRECTIONS FOR USE IN ESTABLISHED ALFALFA

### RESTRICTIONS AND LIMITATIONS

- Do not apply more than 4 oz of Chateau Herbicide SW per acre during a single application.
- Do not apply more than 8 oz of Chateau Herbicide SW per acre during a single growing season.
- Do not make a sequential Chateau Herbicide SW

- application within 60 days of the first *Chateau* Herbicide SW application.
- Do not apply to alfalfa with greater than 6 inches of growth. Application will result in burning of treated leaves and stems. Users should understand and accept this risk before using Chateau Herbicide SW on alfalfa.
- · Do not apply within 25 days of harvest or grazing.
- Do not use on alfalfa grown for seed unless approved by a State authority to support a Special Local Need (SLN) under FIFRA section 24(c).
- Only apply with an adjuvant or tank mix with products formulated as an emulsifiable concentrate "EC" when targeting control of emerged weeds (crop burn and/or stunting should be expected and accepted if *Chateau* Herbicide SW is used with an adjuvant, a tank mix partner formulated as an emulsifiable concentrate (EC) or a tank mix partner formulated with an adjuvant.)
- Application with paraquat can be used to burndown winter annuals prior to winter dormant period.
- Do not use on intended mixed alfalfa-grass stands.

### **TIMING TO ALFALFA**

Chateau Herbicide SW may be applied to established alfalfa with a maximum amount of growth of 6 inches or less for the preemergence control of the weeds listed in Table 7, Weeds Controlled by Residual Activity of Chateau Herbicide SW. Established alfalfa is defined as alfalfa planted in the fall or spring which has gone through a first cutting/mowing. Application to alfalfa with greater than 6 inches of growth may result in unacceptable crop injury.

For control of winter annual weeds: the best timing for preemergence control is in the fall immediately after the last cutting or sheeping-off has occurred.

For control of summer annual weeds: the best timing for preemergence control is in the spring prior to alfalfa growth and before 6 inches of growth.

### **TIMING TO WEEDS**

### **Preemergence – Preemergence To Weeds**

Apply *Chateau* Herbicide SW before alfalfa growth exceeds 6 inches in height for the preemergence control of weeds listed in Table 7, Weeds Controlled by Residual Activity of *Chateau* Herbicide SW. Applications should be made as soon as possible after cutting and removing alfalfa to minimize injury to alfalfa growth.

### **DIRECTIONS FOR USE IN ARTICHOKE**

- Do not apply more than 4 oz/A of Chateau Herbicide SW per acre during a single application on annual or perennial artichoke varieties after new planting.
- Do not apply more than 6 oz/A of Chateau Herbicide SW per acre during a single application on perennial artichoke varieties after cutback.
- Do not apply more than 6 oz/A of *Chateau* Herbicide SW per acre during a single growing season.
- Application to artichoke foliage may result in unacceptable crop injury.

### **TIMING TO ARTICHOKE**

Annual Varieties: Chateau Herbicide SW may be applied to artichoke beds prior to transplanting. Application of Chateau Herbicide SW must be made to the beds no later than 2 days prior to transplanting. Irrigation or rainfall after transplanting is necessary to activate the Chateau Herbicide SW. Do not irrigate the Chateau Herbicide SW before transplanting. Heavy irrigation or rainfall may result in crop injury. The injury is usually transitory and the plants will quickly grow out of the crop damage. Care should be taken to minimize soil disturbance during transplanting, as preemergence weed control will decrease as soil disturbance increases.

**Perennial Varieties:** Chateau Herbicide SW may applied to artichokes after planting of crown pieces or "cut back" of mature plants. Applications of Chateau Herbicide SW must be made within 2 days after planting or cut back and prior to artichoke emergence. Application after the artichokes have begun to crack, or are emerged, will result in crop injury. Application should not be made when artichokes have begun to emerge (cracking).

#### TIMING TO WEEDS

Pre-plant (annual)/Preemergence (perennial) to Artichokes – Preemergence to Weeds.

Apply Chateau Herbicide SW pre-plant to annual artichokes for preemergence control of the weeds. For perennial artichokes apply before cracking for preemergence control of the weeds. Application should be made prior to weed emergence. A postemergence herbicide may be necessary to control emerged weeds. Chateau Herbicide SW may be applied to annual or perennial artichokes as specified above for preemergence control of weeds listed in Table 7, Weeds Controlled by Residual Activity of Chateau Herbicide SW.

### DIRECTIONS FOR USE IN ESTABLISHED ASPARAGUS

### RESTRICTIONS AND LIMITATIONS

- Do not apply more than 6 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 6 oz of *Chateau* Herbicide SW per acre during a single growing season.
- Apply only to dormant asparagus no less than 14 days before spears emerge. Application to nondormant asparagus may result in unacceptable crop injury.
- Do not work soil within 60 days prior to application in the spring. Soil can be worked after spear harvest in preparation for *Chateau* Herbicide SW application prior to fern emergence. Treated soil that is splashed onto the ferns may result in spotting.

### **TIMING TO ASPARAGUS – Dormant**

Chateau Herbicide SW may be applied to dormant asparagus for preemergence control of the weeds listed in Table 8, Weeds Controlled by Preemergence Application of Chateau Herbicide SW. Application to non-dormant asparagus will result in unacceptable crop injury. Applications should be made no less

than two weeks prior to spear emergence and must be sprinkler or rainfall incorporated with 0.5 to 0.75 inches of water or some scoring may result.

### **TIMING TO ASPARAGUS – Post Harvest**

Apply Chateau Herbicide SW after the final harvest of the season, but prior to fern emergence, for preemergence control of the weeds listed in Table 8, Weeds Controlled by Preemergence Application of Chateau Herbicide SW. Application after fern emergence will result in unacceptable crop injury. Apply no less than two weeks prior to fern emergence and must be sprinkler or rainfall incorporated with 0.5 to 0.75 inches of water. Add a burndown tank mix partner for the control of emerged weeds labeled for asparagus in accordance with the most restrictive labeled limitations and precautions.

#### **TIMING TO WEEDS**

### Burndown — Dormant Asparagus, Postemergence to Weeds

Chateau Herbicide SW may be used for residual weed control, as well as to assist in postemergence burndown of many annual and perennial weeds where asparagus is dormant. For control of emerged weeds, tank mix Chateau Herbicide SW with paraquat. Refer to paraquat label for recommended rate and application parameters. To ensure thorough coverage, use a minimum of 15 gals of spray solution per acre. Chateau Herbicide SW tank mixes applied to assist in the control of emerged weeds must be applied with a non-ionic surfactant at 0.25% v/v. A spray grade nitrogen source (either ammonium sulfate at 2 to 2.5 lbs/A or 28 to 32% nitrogen solution at 1 to 2 qts/A) may be added to increase herbicidal activity.

### **Burndown – After Last Harvest of Season, Postemergence to Weeds**

Use *Chateau* Herbicide SW for residual weed control and to assist in postemergence burndown for many annual and perennial weeds where asparagus harvest has been completed for the year. For control of emerged weeds, use a labeled tank mix partner with activity on the emerged weeds.

### Preemergence – Dormant Asparagus or After Last Harvest of Season, Preemergence to Weeds

Apply *Chateau* Herbicide SW to dormant asparagus for the preemergence control of weeds listed in Table 8, Weeds Controlled by Preemergence Application of *Chateau* Herbicide SW.

### **DIRECTIONS FOR USE IN CELERY**

For Use in the States of California, Michigan and Wisconsin Only

- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a pre-transplant application.
- In the state of California, use as pre-transplant application only.
- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a post-transplant application.
- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a single growing season.

- Do not use with an adjuvant.
- Post transplant applications must be made between 3 to 7 days following transplanting.
- Do not apply as part of a tank mix.

### **TIMING TO CELERY**

Apply *Chateau* Herbicide SW at 3 oz/A prior to transplanting, or between 3 and 7 days following transplanting, for preemergence control of the weeds listed in Table 1, Broadleaf Weeds Controlled by Residual Activity of *Chateau* Herbicide SW.

### **TIMING TO WEEDS**

Use *Chateau* Herbicide SW prior to weed emergence for residual control.

Read tank mix product label for rates and weeds controlled. Always read and follow label directions for all tank mix products before using. The most restrictive labeling of any tank mix product must be followed. *Chateau* Herbicide SW, when applied according to label use directions, will control the weeds listed in Table 1, Broadleaf Weeds Controlled by Residual Activity of *Chateau* Herbicide SW. This label makes no claims concerning control of other weed species.

### DIRECTIONS FOR USE IN COTTON

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Do not apply more than 2 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 4 oz of *Chateau* Herbicide SW per acre during a single growing season.
- Do not make a sequential Chateau Herbicide SW application within 30 days of the first Chateau Herbicide SW application.
- Do not apply within 60 days of harvest.

### ENVIRONMENTAL CONDITIONS AND BIOLOGICAL PERFORMANCE

**Hooded, Shielded and Layby Application** 

For best results, *Chateau* Herbicide SW should be applied to actively growing weeds within the growth stages indicated in this label. Applying *Chateau* Herbicide SW under conditions that do not promote active weed growth will reduce herbicide effectiveness. Do not apply *Chateau* Herbicide SW when the crop or weeds are under stress due to drought, excessive water, extremes in temperature, disease or low humidity. Weeds under stress tend to become less susceptible to herbicidal action. *Chateau* Herbicide SW is most effective when applied under sunny conditions at temperatures above 65°F.

Chateau Herbicide SW is rainfast one hour after application. Applications should not be made if rain is expected within one hour of application or postemergence efficacy may be reduced. Rainfall within one hour of application will not adversely affect residual activity.

### **HERBICIDE RATE**

**Hooded, Shielded and Layby Application** 

For postemergence weed control, *Chateau* Herbicide SW should be applied through a hooded or shielded sprayer or at layby, at 2 oz/A, in combination with MSMA or at 1 to 2 oz/A in combination with glyphosate, to assist in the control of weeds listed in Table 4. Residual weed control can also be obtained through hooded, shielded and layby application of *Chateau* Herbicide SW. Weeds that are controlled through residual activity of *Chateau* Herbicide SW are listed in Table 1. Weeds that are suppressed by residual activity of *Chateau* Herbicide SW are listed in Table 2.

Table 4. Emerged Broadleaf Weeds Controlled by Hooded, Shielded and Layby Application of Chateau Herbicide SW Tank Mixes With Glyphosate or MSMA in Cotton

<b>BROADLEAF WEED SPECIES</b>	WEED HEIGHT	
COMMON NAME SCIENTIFIC NAME		(inches) 2 oz/A
Bindweed, Field <sup>1</sup>	Convolvulus arvensis	4
Carpetweed	Mollugo verticillata	4
Chickweed, Common	Stellaria media	4
Cocklebur, Common	Xanthium strumarium	4
Florida Beggarweed	Desmodium tortuosum	2
Hemp Sesbania	Sesbania exaltata	6
Jimsonweed	Datura stramonium	4
Lambsquarters, Common	Chenopodium album	4
Morningglories	·	
Entireleaf	lpomoea hederacea var. integriuscula	4
lvyleaf	Ipomoea hederacea	4
Pitted	İpomoea lacunose	4
Red	İpomoea coccinea	4
Tall	İpomoea purpurea	2

<sup>&</sup>lt;sup>1</sup>Chateau Herbicide SW tank mixes will control the above ground portion of field bindweed. Repeated applications will be needed to control regrowth.

Table 4. Emerged Broadleaf Weeds Controlled by Hooded, Shielded and Layby Application of *Chateau* Herbicide SW Tank Mixes With Glyphosate or MSMA in Cotton (continued)

BROADLEAF WEED SPECIES		WEED HEIGHT
COMMON NAME	SCIENTIFIC NAME	(inches) 2 oz/A
Mustard, Wild	Brassica kaber	6
Nightshades		
Black	Solanum nigrum	4
Eastern Black	Solanum ptycanthum	4
Hairy	Solanum sarrachoides	4
Pigweeds		
Palmer Amaranth	Amaranthus palmeri	4
Redroot	Amaranthus retroflexus	4
Smooth	Amaranthus hybridus	4
Plaintain, Broadleaf	Plantago major	6
Prickly Sida (Teaweed)	Sida spinosa	4
Purslane, Common	Portulaca oleracea	2
Ragweeds		
Common	Ambrosia artemisiifolia	2
Giant	Ambrosia trifida	4
Rice Flatsedge	Cyperus iria	2
Sicklepod	Senna obtusifolia	4
Smartweeds .		
Ladysthumb	Polygonum persicaria	4
Pale	Polygonum lapathifolium	4
Pennsylvania	Polygonum pensylvanicum	4
Spotted Spurge	Euphorbia maculata	4
Velvetleaf	Abutilon theophrasti	4
Venice Mallow	Hibiscus trionum	2
Waterhemps		
Common	Amaranthus rudis	2
Tall	Amaranthus tuberculatus	2

### CARRIER VOLUME AND SPRAY PRESSURE Hooded, Shielded and Layby Application

To ensure thorough coverage in hooded, shielded and layby applications, use 15 to 30 gals spray solution per treated acre. Use 20 to 30 gals per treated acre under heavy weed pressure. Nozzle selection should meet manufacturer's gallonage and pressure recommendations for application method being used. Do not use "Flood Jet" nozzles, as they tend to increase the chance of crop injury.

### **ADDITIVES**

### **Hooded, Shielded and Layby Application**

Weed control from hooded, shielded or layby application of *Chateau* Herbicide SW in cotton requires the addition of an agronomically approved non-ionic surfactant to the spray mixture. Non-ionic surfactant must contain at least 80% active ingredient. Mixing compatibility qualities should be verified by a jar test. The use of crop oil concentrates, methylated seed oils, organo-silicant surfactants or products containing these ingredients, may result in severe crop injury and should not be used.

### **APPLICATION EQUIPMENT**

Apply *Chateau* Herbicide SW tank mixes, with ground equipment using standard commercial sprayers equipped with nozzles designed to deliver the desired

spray pressure and spray volume. Application equipment should be clean and in good repair. Nozzles should meet manufacturer's recommendations for spray pattern and placement on spray boom and should be checked frequently for accuracy.

### **TIMING TO COTTON**

### **Hooded and Shielded Application**

Chateau Herbicide SW tank mixes may be applied with a hooded or shielded sprayer after cotton has reached a minimum of 6 inches in height. All nozzles must be under the hood or behind the shield to ensure no spray solution comes in contact with the cotton. Care must be taken to ensure the spray solution or drift does not come in contact with the cotton or severe crop injury can occur.

### **Layby Application**

Layby application of *Chateau* Herbicide SW tank mixes may be made once cotton has reached a minimum of 16 inches in height. Cotton that is smaller than 16 inches in height may be injured by *Chateau* Herbicide SW applications. *Chateau* Herbicide SW application must be directed to the lower 2 inches of the cotton stem to avoid crop injury.

#### **TIMING TO WEEDS**

Chateau Herbicide SW tank mix applications must be made to weeds within the height range given in Table 4.

### **TANK MIXES**

Chateau Herbicide SW must be tank mixed with one of the herbicides listed in Table 5 for postemergence control of the weeds listed in Table 4.

Table 5. Tank Mixes with Chateau Herbicide SW for Hooded, Shielded and/or Layby Use in Cotton

TANK MIX PARTNER	TARGET WEEDS	HOODED AND SHIELDED	LAYBY
glyphosate	Perennial Grasses and Broadleaves	Х	X <sup>1</sup>
MSMA	Annual Grasses Yellow Nutsedge	Χ	Χ

<sup>&</sup>lt;sup>1</sup> For use only in cotton with the Roundup Ready® gene.

### **DIRECTIONS FOR USE IN FIELD CORN**

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Use only on no-till or minimum tillage fields where last year's crop residue has not been incorporated into the soil.
- Corn must be planted between 14 and 30 days after application unless the application is made as part of a Fall burndown program.
- Corn can be planted 7 days after an application of 2 oz/A if a minimum of 25% of the soil surface is covered with the residue of the preceding crop and a minimum of 1/4 inch of rainfall has occurred between application and planting.
- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a single growing season.
- Do not irrigate between emergence and 2-leaf corn.
- Do not use on popcorn, sweet corn or corn grown for seed.

### **TIMING TO FIELD CORN**

- Apply Chateau Herbicide SW, at 2 to 3 oz/A, between 7 and 30 days prior to planting field corn, for the preemergence control of the weeds listed in Table 1, Broadleaf Weeds Controlled by Residual Activity of Chateau Herbicide SW.
- Apply Chateau Herbicide SW at 2 oz/A between 7 and 30 days prior to planting field corn if a minimum of 25% of the soil surface is covered with the residue of the preceding crop and a minimum of 1/4 inch of rainfall has occurred between application and planting.
- Apply Chateau Herbicide SW at 3 oz/A between 14 and 30 days prior to planting field corn.

### Burndown Use Directions – For Preplant Applications in Field Corn

Chateau Herbicide SW, applied as part of a burndown program, may be used for residual weed control, as well as to assist in postemergence burndown of many weeds where field corn will be planted directly into the residue of the previous year. See Directions for Use in Fall and Spring Preplant Burndown and Fallow Seedbed Programs in Field Corn for rates and timing of applications. For control of emerged weeds, *Chateau* Herbicide SW must be applied with an appropriate burndown tank mix partner listed in Table 6. To ensure thorough coverage, use a minimum of 15 gallons of spray solution per acre. Refer to tank mix partner's label for recommended application pressure and recommended adjuvant systems.

### INCREASING SPEED OF GLYPHOSATE BURNDOWN ACTIVITY

Chateau Herbicide SW, at 1 oz/A, may be tank mixed with glyphosate (Roundup®) to increase the speed of burndown activity compared to glyphosate applied alone. Residual weed control will not be provided at rates lower than 2 oz/A; however, suppression of the weeds in Table 2 may occur at Chateau Herbicide SW rates as low as 1 oz/A. Applications of Chateau Herbicide SW at 1 oz/A must be made a minimum of 14 days prior to planting field corn.

### **TANK MIXES**

Chateau Herbicide SW may be tank mixed with the herbicides listed in Table 6 for pre-plant burndown applications. Refer to tank mix partner's label for adjuvant recommendations.

Table 6. Tank Mix Partners for Burndown and/or Residual Control of Weeds in Field Corn

TANK MIX PARTNERS <sup>1</sup>				
2,4-D LVE atrazine Basis® dicamba Express® glyphosate Hornet®	metribuzin paraquat Python® Resolve® simazine Weedmaster®			

Refer to tank mix product labels for specific recommendations.

### **TANK MIX RESTRICTIONS**

Tank mixes with flufenacet (Axiom or Domain), meto-lachlor or s-metolachlor (Dual Magnum or Dual II Magnum), dimethenamid or dimethenamid-p (Frontier or Outlook), alachlor (Lasso), or acetochlor (Surpass or Harness) may result in injury to field corn when application is followed by prolonged periods of cool wet weather and should not be used with *Chateau* Herbicide SW, unless supplemental labeling, provided by Valent U.S.A. Corporation, is followed.

### **DIRECTIONS FOR USE IN GARLIC**

- Do not apply more than 6 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 6 oz of *Chateau* Herbicide SW per acre during a single growing season.

#### **TIMING TO GARLIC**

Chateau Herbicide SW may be applied, at 6 oz/A, to garlic prior to garlic emergence. Application should be made within 3 days after planting garlic.

### **TIMING TO WEEDS**

### Preemergence – Preemergence To Weeds

Apply *Chateau* Herbicide SW to weed free garlic for preemergence control of the weeds listed in Table 8, Weeds Controlled by Preemergence Application of *Chateau* Herbicide SW.

### DIRECTIONS FOR USE IN HOPS

Not For Use in California or New York

### RESTRICTIONS AND LIMITATIONS

- Do not apply more than 6 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 6 oz of Chateau Herbicide SW per acre during a single growing season.
- Do not allow spray to contact green stem (unless used for sucker control), foliage, flowers or cones or unacceptable injury may occur.
- Do not apply within 30 days of harvest.
- Do not use with an adjuvant.

Chateau Herbicide SW can be used in hops for preemergence weed control as well as sucker control.

### TIMING TO HOPS FOR SUCKER CONTROL

Apply *Chateau* Herbicide SW at 6 oz/A as a directed application after hops have reached a minimum of 6 feet in height for sucker control. Application should be directed to the lower 2 feet of the hops.

### TIMING TO HOPS FOR PREEMERGENCE WEED CONTROL

Apply *Chateau* Herbicide SW at 6 oz/A as a 1 to 1.5 foot band to each side of the hop row, to dormant hops November through February to ensure time for rain incorporation and activation. If weeds are emerged at the time of application, tank mix *Chateau* Herbicide SW with a labeled burndown herbicide such as paraquat or glyphosate to assist with control of emerged weeds. Do not mow or rake over treated areas, as dust created by mowing may drift onto sensitive crops or vegetation resulting in injury.

### **TIMING TO WEEDS**

Chateau Herbicide SW applications must be made prior to weed emergence for control of weeds listed in Table 8, Weeds Controlled by Preemergence Application of Chateau Herbicide SW.

Read tank mix product label for rates and weeds controlled. Always read and follow label directions for all tank mix products before using. The most restrictive labeling of any tank mix product must be followed. *Chateau* Herbicide SW, when applied according to label use directions, will control the weeds listed in Table 8, Weeds Controlled by Preemergence Application of *Chateau* Herbicide SW. This label makes no claims concerning control of other weed species.

### DIRECTIONS FOR USE IN MINT (Peppermint and Spearmint)

### **RESTRICTIONS AND LIMITATIONS**

- Do not apply more than 4 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 8 oz of Chateau Herbicide SW per acre during a single growing season.
- Do not make a sequential Chateau Herbicide SW application within 60 days of the first Chateau Herbicide SW application.
- Apply only to dormant mint. Application to non-dormant mint may result in unacceptable crop injury.
- Do not apply within 80 days of harvest.

### **PRECAUTIONS**

### To avoid crop injury:

- Do not apply a Fall application if roots and rhizomes are weak, thin or damaged.
- Do not apply Chateau Herbicide SW on mint in Southern Union County (south of Ladd Canyon) or Baker County in Oregon.
- Do not apply to row or baby mint, use only on established meadow mint.
- Do not apply to mint that has been weakened by diseases, insects (example mint root borer), nematodes, drought, soil salts, high soil pH, previous pesticides, winter injury or double cutting, as severe injury may occur. Apply only to healthy vigorous mint with undamaged rhizomes.
- Do not apply before November 25 or after March 1.

Many weather related factors, including high wind, splashing or heavy rains or cool conditions at or near mint emergence, may result in mint injury in fields treated with *Chateau* Herbicide SW. User should assume these risks before using *Chateau* Herbicide SW.

Tank mixes with labeled rates of paraquat are recommended to control emerged weeds and increase crop safety.

### **TIMING TO MINT**

As a spray, *Chateau* Herbicide SW may be applied only to established, dormant mint for preemergence control of the weeds listed in Table 7 as well as to assist in the postemergence control of emerged weeds. Application to non-dormant mint or to baby (row) mint (time from planting of mint roots through the first cutting), may result in unacceptable crop injury. As a bulk fertilizer application, *Chateau* Herbicide SW may be applied at least 80 days prior to harvest. Leaves must be dry at the time of applications or severe injury may occur.

#### TIMING TO WEEDS

### Burndown – Dormant Mint, Postemergence To Weeds

Chateau Herbicide SW may be used for residual weed control, as well as to assist in postemergence burndown of many annual and perennial weeds where established mint is dormant. For control of emerged weeds, tank mix Chateau Herbicide SW with paraquat. Refer to paraquat label for recom-

mended rate and application parameters. To ensure thorough coverage, use a minimum of 15 gals of spray solution per acre. *Chateau* Herbicide SW tank mixes applied to assist in the control of emerged weeds must be applied with a non-ionic surfactant at 0.25% v/v. A spray grade nitrogen source (either ammonium sulfate at 2 to 2.5 lbs/A or 28 to 32% nitrogen solution at 1 to 2 qts/A) may be added to increase herbicidal activity.

### $\begin{array}{ll} \textbf{Preemergence} & - \textbf{Dormant Mint, Preemergence To} \\ \textbf{Weeds} \end{array}$

Apply *Chateau* Herbicide SW to dormant mint for the preemergence control of weeds listed in Table 7. Fall

applications of *Chateau* Herbicide SW, followed by a sequential application in the Spring, have resulted in better Summer annual weed control than a single Fall or single Spring application.

Fall application is most effective for Fall germinating weeds such as groundsel. Fields plowed or harrowed after a *Chateau* Herbicide SW application will result in less effective preemergence activity. In furrow irrigated fields, corrugating that is done after a *Chateau* Herbicide SW application will expose untreated soil and break the herbicide barrier resulting in poor weed control.

Table 7. Weeds Controlled by Residual Activity of Chateau Herbicide SW

BROADLEAF WEED SPECIES				CHATEAU	
COMMON NAME	SCIENTIFIC NAME	ORGANIC Matter		HERBICIDE SW RATE	
Bristly Starbur	Acanthospermum hispidum	Up to 5%	All	4 oz/A	
Carpetweed	Mollugo verticillata	•	Soil		
Chickweeds	-		Types		
Common	Stellaria media				
Mouseear	Cerastium vulgatum				
Coffee Senna	Cassia occidentalis				
Copperleaf, Hophornbeam	Acalypha ostryifolia				
Dandelion	Taraxacum officinale				
Eclipta	Eclipta prostrata				
Eveningprimrose, Cutleaf	Oenothera laciniata				
Florida Beggarweed	Desmodium tortuosum				
Florida Pušley	Richardia scabra				
Golden Crownbeard	Verbesina encelioides				
Groundsel, Common	Senecio vulgaris				
Hairy Indigo	Indigofera hirsuta				
Hemp Sesbania	Sesbania exaltata				
Henbit	Lamium amplexicaule				
Jimsonweed	Datura stramonium				
Kochia	Kochia scoparia				
Lambsquarters, Common	Chenopodium album				
Little Mallow	Malva <sup>'</sup> parviflora				
Marestail/Horseweed	Conyza canadensis				
Morningglories	,				
Entireleaf	Ipomoea hederacea var.				
	integriuscula				
lvyleaf	Ipomoea hederacea				
Red/Scarlet	Ipomoea coccinea				
Smallflower	Jacquemontia tamnifolia				
Tall	Ipomoea purpurea				
Mustard, Wild	Brassica kaber				
Nightshades					
Black	Solanum nigrum				
Eastern Black	Solanum ptycanthum				
Hairy	Solanum sarrachoides				

(continued)

Table 7. Weeds Controlled by Residual Activity of Chateau Herbicide SW (continued)

BROADLEAF WEED SPECIES CHATEAU				
COMMON NAME	SCIENTIFIC NAME	ORGANIC MATTER	SOIL Type	HERBICIDE SW RATE
Pigweeds		Up to 5%	All	4 oz/A
Palmer Amaranth	Amaranthus palmeri	•	Soil	
Redroot	Amaranthus retroflexus		Types	
Smooth	Amaranthus hybridus			
Spiny Amaranth	Amaranthus spinosus			
Tumble	Amaranthus albus			
Prickly Lettuce	Lactuca serriola			
(China Lettuce)				
Prickly Sida (Teaweed)	Sida spinosa			
Puncturevine	Tribulus terrestris			
Purslane				
Common	Portulaca oleracea			
Radish, Wild	Raphanus raphanistrum			
Ragweed, Common	Ambrosia artemisiifolia			
Redmaids	Calandrinia ciliata var. menziessii			
Russian Thistle	Salsola iberica			
Shepherd's-purse	Capsella bursa-pastoris			
Smartweeds	Polygonum persicaria			
Ladysthumb	, ,			
Pennsylvania	Polygonum pensylvanicum			
Spotted Spurge	Euphorbia maculata			
Spurred Anoda	Anoda cristata			
Tropic Croton	Croton glandulosus			
Velvetleaf	Abutilon theophrasti			
Venice Mallow	Hibiscus trionum			
Waterhemps				
Common	Amaranthus rudis			
Tall	Amaranthus tuberculatus			
Wild Poinsettia	Euphorbia heterophylla			
Wormwood, Biennial	Artemisia biennis			
GRASS WEED SPECIES				
Barnyardgrass	Echinochloa crus-galli	Up to 5%	All	4 oz/A
Bluegrass, Annual	Poa annua	- F - 5 0 / 0	Soil	. 55,71
Crabgrass, Large	Digitaria sanguinalis		Types	
Foxtail, Giant	Setaria faberi			
Goosegrass	Eleusine indica			
Lovegrass, California	Eragrostis diffusa			
Panicums				
Fall	Panicum dichotomiflorum			
Texas	Panicum texanum			
Signalgrass, Broadleaf	Brachiaria platyphylla			

### **DIRECTIONS FOR USE IN ONION (DRY BULB)**

For Use in the States of Michigan, New York, North Dakota and Wisconsin Only

- Do not apply more than 2 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a single growing season.
- Do not make sequential application within 14 days of the first application.
- Do not apply more than 1 oz of *Chateau* Herbicide SW per season on soils that contain greater than 90% sand plus gravel.
- Do not apply as part of a tank mix, other than with Prowl® H2O, or unacceptable injury may result. Other formulations of pendimethalin should not be tank mixed with *Chateau* Herbicide SW for use in onions.
- Do not apply with any type of adjuvant.
- Do not apply within 45 days of harvest.

Use of *Chateau* Herbicide SW may result in necrotic spotting of onion leaves that come in contact with the spray. User should assume this potential crop response before using Chateau Herbicide SW.

### **Microrate Application**

Sequential applications of *Chateau* Herbicide SW may be applied to onions (dry bulb), between the 2-leaf and 6-leaf stage, at rates of 0.5 to 1 oz/A, on a 7 day interval.

### TIMING TO ONIONS (dry bulb)

Apply *Chateau* Herbicide SW to transplanted onions (dry bulb) between the 2-leaf and 6-leaf stage and on direct seed onions (dry bulb) between the 3-leaf and 6-leaf stage.

### **TIMING TO WEEDS**

### Preemergence — Emerged Onions (dry bulb), Preemergence To Weeds

Apply *Chateau* Herbicide SW to weed free onions (dry bulb) for preemergence control of the weeds listed in Table 1, Section A.

### **DIRECTIONS FOR USE IN STRAWBERRY**

- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre per application.
- Do not apply more than 3 oz of *Chateau* Herbicide SW per acre during a single growing season.
- Chateau Herbicide SW, at 3 oz per acre, can be applied to the soil a minimum of 30 days prior to transplanting strawberries provided the strawberries will be transplanted through a plastic mulch.
- Chateau Herbicide SW at 3 oz per acre can be applied to dormant (established or newly planted) strawberries for the preemergence control of the weeds listed in Table 1, Broadleaf Weeds Controlled by Residual Activity of Chateau Herbicide SW.
- Chateau Herbicide SW, at 3 oz per acre, can be applied in strawberry row middles with a shielded or hooded sprayer for the preemergence control of the weeds listed in Table 1, Broadleaf Weeds Controlled by Residual Activity of Chateau Herbicide SW.

Application Method	Minimum Time From Application to Harvest (PHI)	Use Rate Per Acre Per Application (oz)	Use Rate Per Acre Per Year (oz)	Special Use Instructions
Pre-transplant	Not applicable	3	3	Apply a minimum of 30 days prior to transplanting and prior to plastic mulch being laid.  Apply as part of a tank mix to control emerged weeds.
Preemergence to dormant straw- berries	Not applicable	3	3	Crop oil concentrate, at 1% v/v, or non- ionic surfactant, at 0.25% v/v, may be added to help control emerged broad- leaf weeds.
Hooded or shielded sprayer application to row middles	Do not apply after fruit set	3	3	Apply only to row middles – do not apply over strawberries. Apply prior to weed emergence. Crop spotting may occur if an adjuvant is added. Application after fruit set may result in spotting of fruit and should be avoided. Do not allow spray drift to come in contact with fruit or foliage.

Table 8. Weeds Controlled by Preemergence Application of Chateau Herbicide SW

BROADLEAF WEED SPECIES			_ CHATEAU	
COMMON NAME	SCIENTIFIC NAME	ORGANIC MATTER	SOIL Type	HERBICIDE SW RATE
Bristly Starbur Carpetweed Chickweeds	Acanthospermum hispidum Mollugo verticillata	Up to 10% <sup>1</sup>	All Soil Types²	Asparagus, Garlic, Hops 6 oz/A
Common Mouseear Coffee Senna Dandelion Eclipta Eveningprimrose, Cutleaf Filaree	Stellaria media Cerastium vulgatum Cassia occidentalis Taraxacum officinale Eclipta prostrata Oenothera laciniata			Bushberries, Grapes, Nut Trees (including Pistachio), Olive, Pome Fruit, Pomegranate, Stone Fruit and Non-Bearing Fruit Trees 6 to 12 oz/A <sup>2</sup>
Redstem Whitestem Fleabane, Hairy Florida Beggarweed	Erodium cicutarium Erodium moschatum Conyza bonariensis Desmodium tortuosum			To Maintain Bare Ground on Non-Crop Areas of Farms, Orchards & Vineyards 6 to 12 oz/A
Florida Pusley Golden Crownbeard Groundsel, Common	Richardia scabra Verbesina encelioides Sonosia vykaria			
Hairy Indigo	Senecio vulgaris Indigofera hirsuta			
Hemp Sesbania Henbit	Sesbania exaltata Lamium amplexicaule			
Jimsonweed Kochia Lambsquarters, Common Mallow	Datura stramonium Kochia scoparia Chenopodium album			
Common (Cheeseweed)	Malva neglecta			
Little	Malva parviflora			
Horseweed/ Marestail Morningglories	Conyza canadensis			
Entireleaf	lpomoea hederacea var. integriuscula			
lvyleaf Red/Scarlet Smallflower Tall	Ipomoea hederacea Ipomoea coccinea Jacquemontia tamnifolia Ipomoea purpurea			
Mustards Tumble Wild	Sisymbrium altissimum Brassica kaber			
Nightshades Black	Solanum nigrum			
Eastern Black Hairy	Solanum ptycanthum Solanum sarrachoides			

<sup>&</sup>lt;sup>1</sup> Chateau Herbicide SW can be used on soils with greater than 10% organic matter; however, length of residual control may be shorter than on soils with lower organic matter content.

<sup>2</sup> A maximum Chateau Herbicide SW rate of 6 oz/A per application should be used on any soil that has a sand plus gravel content over 80% if bushes, trees or vines are under 3 years of age.

Table 8. Weeds Controlled by Preemergence Application of Chateau Herbicide SW (continued)

<b>BROADLEAF WEED SPE</b>	CIES			_ CHATEAU
COMMON NAME	SCIENTIFIC NAME	ORGANIC MATTER	SOIL TYPE	HERBICIDE SW RATE
Pigweeds Palmer Amaranth Redroot	Amaranthus palmeri Amaranthus	Up to 10% <sup>1</sup>	All Soil Types²	Asparagus, Garlic, Hops 6 oz/A
Smooth Spiny Amaranth Tumble Prickly Lettuce (China Lettuce) Prickly Sida (Teaweed)	retroflexus Amaranthus hybridus Amaranthus spinosus Amaranthus albus Lactuca serriola Sida spinosa			Bushberries, Grapes, Nut Trees (including Pistachio), Olive, Pome Fruit, Pomegranate, Stone Fruit and Non-Bearing Fruit Trees 6 to 12 oz/A <sup>2</sup>
Puncturevine Purslane, Common Radish, Wild Ragweed, Common Redmaids	Tribulus terrestris Portulaca oleracea Raphanus raphanistrum Ambrosia artemisiifolia Calandrinia ciliata var. menziesii			To Maintain Bare Ground on Non-Crop Areas of Farms, Orchards & Vineyards 6 to 12 oz/A
Redweed Shepherd's-purse Sowthistle, Annual <sup>3</sup> Spotted Spurge Spurred Anoda Thistle, Russian Tropic Croton Venice Mallow	Melochia corchorifolia Capsella bursa-pastoris Sonchus oleraceus Euphorbia maculata Anoda cristata Salsola iberica Croton glandulosus Hibiscus trionum			
Waterhemps Common Tall Wild Poinsettia Wormwood, Biennial	Amaranthus rudis Amaranthus tuberculatus Euphorbia heterophylla Artemisia biennis			

<sup>&</sup>lt;sup>1</sup> Chateau Herbicide SW can be used on soils with greater than 10% organic matter; however, length of residual control may be shorter than on soils with lower organic matter content.

<sup>2</sup> A maximum Chateau Herbicide SW rate of 6 oz/A per application should be used on any soil that has a sand plus gravel content over 80% if bushes, trees or vines are under 3 years of age.

<sup>3</sup> Except California.

Table 8. Weeds Controlled by Preemergence
Application of Chateau Herbicide SW (continued)

<b>GRASS WEED SPECIES</b>				_ CHATEAU	
COMMON NAME	SCIENTIFIC NAME	ORGANIC MATTER	SOIL Type	HERBICIDE SW RATE	
Barnyardgrass Bluegrass, Annual Crabgrass	Echinochloa crus-galli Poa annua	Up to 10% <sup>1</sup>	All Soil Types²	Asparagus, Garlic, Hops 6 oz/A	
Large Smooth Foxtails	Digitaria sanquinalis Digitaria ischaemum			Bushberries, Grapes, Nut Trees (including Pistachio), Olive, Pome Fruit,	
Bristly Giant Green Yellow	Setaria verticillata Setaria faberi Setaria viridis Setaria glauca			Pomegranate, Stone Fruit and Non-Bearing Fruit Trees 6 to 12 oz/A <sup>2</sup>	
Goosegrass Guineagrass Johns	Eleusine indica Panicum maximum			To Maintain Bare Ground on Non-Crop Areas of Farms, Orchards & Vineyards	
Seedling Lovegrass, California	Sorghum halepense  Eragrostis diffusa			6 to 12 oz/A	
Panicum Fall	Panicum dichotomiflorum				
Texas Signalgrass Broadleaf	Panicum texanum Brachiaria platyphylla				

<sup>&</sup>lt;sup>1</sup> Chateau Herbicide SW can be used on soils with greater than 10%; however, length of residual control may be shorter than on soils with lower organic matter content.

### **DIRECTIONS FOR USE IN SWEET POTATO**

For Use in the States of Arizona, California and Hawaii Only

### RESTRICTIONS AND LIMITATIONS

- Do not apply more than 3 oz of Chateau Herbicide SW per acre during a single growing season.
- Do not apply postemergence to sweet potatoes.
- Do not use greenhouse grown transplants.
- Do not use transplants harvested more that 2 days prior to transplanting.
- Do not use on any sweet potato variety other than "BEAUREGARD", unless user has tested *Chateau* Herbicide SW on other variety and has found crop tolerance to be acceptable.
- Do not apply as a part of any tank mix, except with labeled rates of Command®, if tank mix is applied prior to transplanting.

### **TIMING TO SWEET POTATOES**

Chateau Herbicide SW must be applied prior to transplanting sweet potatoes.

### **TIMING TO WEEDS**

### **Preemergence To Weeds**

Apply *Chateau* Herbicide SW to soil prior to transplanting sweet potato slips for the preemergence control of the weeds listed in Table 1.

### DIRECTIONS FOR USE IN BUSHBERRIES, GRAPE, NUT TREES (INCLUDING PISTACHIO), OLIVE, POME FRUIT, POMEGRANATE, STONE FRUIT AND NON-BEARING FRUIT TREES

- Do not apply more than 12 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 24 oz of Chateau Herbicide SW per acre during a 12 month period, except bushberries; for bushberries do not apply more than 12 oz of Chateau Herbicide SW per acre during a 12 month period.
- Do not make a sequential application within 30 days of the first application, except nut trees, do not make a sequential application within 60 days of the first application.
- A maximum Chateau Herbicide SW rate of 6 oz/A per application should be used on any soil that has a sand plus gravel content over 80% if bushes, trees or vines are less than 3 years of age. (Two applications of 6 oz/A in a 12 month period can still be made as long as there have been 60 days between applications).
- Do not apply to farm alleys or roads where traffic may result in treated dust settling onto crops or other desirable vegetation.

<sup>&</sup>lt;sup>2</sup> A maximum *Chateau* Herbicide SW rate of 6 oz/A per application should be used on any soil that has a sand plus gravel content over 80% if bushes, trees or vines are under 3 years of age.

- Do not apply within 300 yards of non-dormant pears.
- Raise mower height during all mowing to reduce dust. Dust created by mowing can drift onto desirable vegetation resulting in injury.
- Do not apply to powdery soils or soils that are susceptible to wind displacement unless irrigation can be applied immediately after application.
- Do not mow treated areas between bud break and final harvest. Dust created by mowing may drift onto desirable vegetation resulting in injury.
- Follow the most restrictive label limitations and precautions of the tank mix product(s) being used.
- Avoid direct or indirect spray contact to foliage and green bark (non-barked trunk and non-barked vines with the exception of undesirable suckers).

For bushberries, grape, nut trees (including pistachio), olive, pomegranate and non-bearing fruit trees, *Chateau* Herbicide SW should be applied as a uniform broadcast application to the orchard or vineyard floor or as a uniform band directed at the base of the bush, trunk or vine. For pome fruit and stone fruit, *Chateau* Herbicide SW can only be applied as a uniform band directed at the base of the trunk prior to "pink bud" in apples and "bud break" in stone fruit and pear. The preferred application timing for *Chateau* Herbicide SW is in the fall to maximize the potential for rainfall to activate and set the herbicide. Do not apply over the top of crop or allow spray to come in contact with crop as a result of application or drift.

**Preemergence Application** 

Apply 6 to 12 oz (0.188 to 0.38 lb ai/A) of *Chateau* Herbicide SW per broadcast acre as a preemergence application. Preemergence (to weed emergence) applications of *Chateau* Herbicide SW should be made to a weed-free soil surface. Preemergence applications of *Chateau* Herbicide SW must be completed prior to weed emergence. Moisture is necessary to activate *Chateau* Herbicide SW on soil for residual weed control. Dry weather following application of *Chateau* Herbicide SW may reduce effectiveness. However, when adequate moisture is received after dry conditions, *Chateau* Herbicide SW will control susceptible germinating weeds.

**Postemergence Application** 

Apply 6 to 12 oz (0.188 to 0.38 lb ai/A) of *Chateau* Herbicide SW per broadcast acre plus an adjuvant (0.25% v/v non-ionic surfactant or 1 qt/A crop oil concentrate). The addition of an adjuvant enhances *Chateau* Herbicide SW activity on emerged weeds. Thorough spray coverage is necessary to maximize the postemergence activity of *Chateau* Herbicide SW.

Refer to Table 8 for weeds controlled by the residual activity of *Chateau* Herbicide SW. *Chateau* Herbicide SW should be tank mixed with a labeled burndown herbicide for control of the emerged weeds listed in Table 9. Refer to tank mix partner's label for additional weed species and increased weed heights claimed. Refer to tank mix partner's label for additional restrictions, including minimum carrier volume

and crops in which tank mix partner may be used. Burndown tank mix partners include glyphosate, paraquat, 2,4-D and RELY®. Tank mixes with glyphosate or 2,4-D containing products are not recommended during the period after bloom through final harvest to ensure crop safety from drift.

Residual weed control will be reduced if vegetation prevents the *Chateau* Herbicide SW from reaching the soil surface. If vegetation is heavy, it is recommended to use a burndown herbicide with *Chateau* Herbicide SW and make a sequential *Chateau* Herbicide SW application prior to the emergence of new weeds.

### **Carrier Volume and Spray Pressure**

To ensure thorough coverage in burndown applications, use a minimum of 15 gallons of spray solution per acre. Use higher gallonage if dense vegetation or heavy crop residue is present.

Nozzle selection should meet manufacturer's gallonage and pressure recommendations.

### **Banded Application**

Rates listed in Table 9, Weeds Controlled by Postemergence Activity of *Chateau* Herbicide SW Tank Mixes, refer to a broadcast application covering the entire acre. Refer to the Band Application table in Use Information section to calculate amount needed per acre when making a banded application.

### **USE PRECAUTIONS FOR BUSHBERRIES**

Bushberries: Blueberry (Highbush)

 Do not use in the states of Idaho, Oregon or Washington except west of the Cascade Mountains in the following counties:

**Oregon:** Benton, Clackamas, Clatsop, Columbia, Coos, Curry, Douglas, Jackson, Josephine, Lane, Lincoln, Linn, Marion, Multnomah, Polk, Tillamook, Umatilla, Yamhill and Washington

Washington: Benton, Clallam, Clark, Cowlitz, Franklin, Grant, Grays Harbor, King, Jefferson, Kitsap, Lewis, Pacific, Pierce, Skagit, Snohomish, Thurston, Wahkiakum, Walla Walla and Whatcom

- Do not apply to bushberries established less than 2 years unless they are protected from spray contact by non-porous wrap, grow tubes or waxed containers.
- Do not apply within 7 days of harvest.

### **USE PRECAUTIONS FOR GRAPES**

- Do not apply within 60 days of harvest.
- Do not apply to grapes established less than 2 years unless they are trellised at least 3 ft from the soil surface or are protected from spray contact by nonporous wrap, grow tubes or waxed containers.
- Do not apply to grapes that are not trellised or staked unless they are free standing.
- Avoid direct or indirect spray contact to foliage and green bark (non-barked vines, with the exception of undesirable suckers).
- New plantings of "own-rooted varieties", such as Concord, should be planted so that all roots are a minimum 8 inches below the soil surface to be treated. In some situations, this may require hilling

soil around newly planted vines so that the settled depth of the hill will be 4 to 5 inches above the vineyard floor.

### **Juice, Raisin and Wine Grapes**

 Do not apply during the period after bud break through final harvest, unless using shielded application equipment and applicator can ensure spray drift will not come in contact with crop fruit or foliage. Shielded applications during this time period should not be made with glyphosate or products containing glyphosate.

### **Table Grapes**

- Chateau Herbicide SW may be applied during the period following final harvest up to bud break.
- Do not apply after bud break.

# USE PRECAUTIONS FOR NUT TREES (INCLUDING PISTACHIO), OLIVE, POME FRUIT, POMEGRANATE AND STONE FRUIT

Nut Trees: Almond, Beechnut, Betelnut, Black Walnut, Brazil Nut, Butternut, Cashew, Chestnut, Chinquapin, Coconut, English Walnut, Filbert (Hazelnut), Ginkgo, Heartnut, Hickory Nut, Macadamia Nut, Oak, Pecan, Pili Nut, Pine Nut, Pistachio and Tropical Almond

Pome Fruit: Apple, Crabapple, Loquat, Mayhaw, Pear, Pear (Oriental) and Quince

Stone Fruit: Apricot, Cherries (Sweet and Tart), Nectarine, Peach, Plum (Chickasaw, Damson, Japanese), Plumcot and Prune

- California only: For almonds and stone fruit in the counties of Merced, San Joaquin and Stanislaus, follow supplemental labeling provided by Valent U.S.A. Corporation.
- For pome fruit and stone fruit, Chateau Herbicide SW can only be applied as a uniform band directed at the base of the trunk prior to silver tip in apples and bud break in stone fruit.
- Do not apply to pears in the states of Oregon or Washington.
- For pome fruit and stone fruit do not apply to row middles (area between berms).
- For nut trees (including pistachio), olive and pomegranate apply after bud break through final harvest using shielded application equipment if the applicator can ensure the spray drift will not come into contact with non-target vegetation, crop fruit and/ or foliage. Shielded application equipment is not required if the following application parameters are followed:
- Application pressure (at boom) < 30 PSI.
- Application speed < 5 MPH.</li>
- Applicator can ensure the spray drift will not come into contact with non-target vegetation, crop fruit and/or foliage.
- Do not apply within 60 days prior to harvest.
- Do not apply to trees established less than one year, unless protected from spray contact by nonporous wraps, grow tubes, paint or waxed containers.

- Do not use in the states of Oregon or Washington except in the following counties unless the additional restrictions listed below are followed:
  - **Oregon:** Benton, Clackamas, Clatsop, Columbia, Coos, Curry, Douglas, Jackson, Josephine, Lane, Lincoln, Linn, Marion, Morrow, Multnomah, Polk, Tillamook, Umatilla, Yamhill and Washington
  - **Washington:** Clallam, Cowlitz, Grays Harbor, King, Jefferson, Kitsap, Lewis, Pacific, Pierce, Skagit, Snohomish, Thurston, Wahkiakum and Whatcom
- For apples east of the Cascade Mountains in Washington (counties not listed above), follow the restrictions above plus:
- Apply between final harvest and January 1.
- Apply only to apple blocks with an established (2 years or older) permanent cover crop that covers a minimum of 60% of the surface area in the block.
- Application must be incorporated with a minimum of one half inch of water within 48 hours after application.
- Do not apply to powdery soils or soils susceptible to wind displacement.
- Apply only to orchard berms.
- Do not mow the treated berm areas of the orchard.

### USE PRECAUTIONS FOR NON-BEARING FRUIT TREES

Non-Bearing Avocado, Fig, Grapefruit, Lemon, Olive, Orange, Pomegranate and Tangerine

- Do not apply more than 12 oz of *Chateau* Herbicide SW per acre during a single application.
- Do not apply more than 24 oz of Chateau Herbicide SW per acre during a 12 month period.
- Do not harvest fruit from treated trees within one year of application.
- Do not apply to trees established less than one year, unless protected from spray contact by nonporous wraps, grow tubes or waxed containers.
- Do not apply during the period after flowering through leaf drop, unless using shielded application equipment and the applicator can ensure spray drift will not come in contact with the crop foliage.

Table 9. Weeds Controlled by Postemergence Activity of *Chateau* Herbicide SW Tank Mixes

BROADLEAF WEED SPECIES		WEED HEIGHT/LENGTH	CHATEAU Th Herbicide	
COMMON NAME	SCIENTIFIC NAME	(inches)	SW RATE	
Bindweed, Field <sup>1</sup>	Convolvulus arvensis	8	6 to 12	
Carpetweed	Mollugo verticillata	4	oz/A	
Chickweeds	· ·			
Common	Stellaria media	4		
Mouseear	Cerastium vulgatum	4		
Cocklebur, Common	Xanthium strumarium	4		
Eveningprimrose, Cutleaf <sup>2</sup>	Oenothera laciniata	12		
Filaree				
Broadleaf	Erodium botrys	4		
Redstem	Erodium cicutarium	4		
Florida Beggarweed	Desmodium tortuosum	2		
Hemp Sesbania	Sesbania exaltata	8		
Jimsonweed	Datura stramonium	4		
Lambsquarters, Common	Chenopodium album	4		
Morningglories	Спенорошит авит	4		
Entireleaf	Ipomoea hederacea	4		
Littieleai	var. <i>integriuscula</i>	4		
hadoof	Ipomoea hederacea	4		
lvyleaf Pitted		6		
	Ipomoea lacunosa			
Red/Scarlet	Ipomoea coccinea	4		
Tall	Ipomoea purpurea	4		
Mustard, Wild	Brassica kaber	6		
Pigweeds	A	2		
Palmer Amaranth	Amaranthus palmeri	6		
Redroot	Amaranthus retroflexus	6		
Smooth	Amaranthus hybridus	6		
Plaintain, Broadleaf	Plantago major	6		
Prickly Sida (Teaweed)	Sida spinosa	6		
Purslanes				
Common	Portulaca oleracea	4		
Rock	<i>Calandrinia</i> spp.	2		
Ragweeds				
Common	Ambrosia artemisiifolia	2		
Giant	Ambrosia trifida	4		
Rice Flatsedge	Cyperus iria	4		
Sicklepod	Senna obtusifolia	4		
Smartweeds				
Ladysthumb	Polygonum persicaria	4		
Pale	Polygonum lapathifolium	4		
Pennsylvania	Polygonum pensylvanicum	4		
Spotted Spurge	Euphorbia maculata	4		
Velvetleaf	Abutilon theophrasti	4		
Venice Mallow	Hibiscus trionum	4		
Waterhemps	bioodo dionam	Т		
Common	Amaranthus rudis	2		
Tall	Amaranthus tuberculatus	2		

<sup>&</sup>lt;sup>1</sup> Chateau Herbicide SW will only provide control of the above ground portion of bindweed. Repeated applications will be needed to control regrowth.

<sup>2</sup> For acceptable control, cutleaf eveningprimrose should be 12 inches or less and in the rosette stage. Crop oil concentrate, at 1 pt/A, or non-ionic surfactant at 0.25% v/v, should be added to glyphosate tank mixes for cutleaf eveningprimrose control, including glyphosate formulations that contain a built-in adjuvant system.

### ADDITIONAL RESIDUAL WEED CONTROL

Chateau Herbicide SW maybe tank mixed with oryzalin (Surflan®), simazine or diuron for additional residual weed control. Always read and follow label use directions for all products being used.

# DIRECTIONS FOR USE TO MAINTAIN BARE GROUND ON NON-CROP AREAS OF FARMS, ORCHARDS AND VINEYARDS

### **RESTRICTIONS AND LIMITATIONS**

- Do not apply to farm alleys or roads where traffic may result in treated dust settling onto crops or other desirable vegetation.
- Do not apply to ditch banks.

Chateau Herbicide SW, when used as directed, can be used on farms, orchards and vineyards for non-selective vegetation control to maintain bare ground on non-crop areas that must be kept weed free. Follow all applicable directions as outlined above under "USE INFORMATION".

Chateau Herbicide SW offers residual and postemergence control of susceptible broadleaf and grass weeds as well as an additional mode of action to assist in the control of ALS (acetolactate synthase) resistant weeds. Chateau Herbicide SW can be tank mixed with the herbicides listed in Table 10 for increased residual or postemergence control. The length of residual control is dependent on the rate applied as well as on rainfall and temperature conditions. Length of residual control will decrease as temperature and precipitation increase. Chateau Herbicide SW rates of 6 to 12 oz/A are required to provide residual control of the weeds listed in Table 8.

### PREEMERGENCE APPLICATION

Apply 6 to 12 oz (0.188 to 0.38 lb ai/A) of *Chateau* Herbicide SW per broadcast acre as a preemergence application. Preemergence (to weed emergence) applications of *Chateau* Herbicide SW should be made to a weed-free soil surface. Preemergence applications of *Chateau* Herbicide SW must be completed prior to weed emergence. Moisture is necessary to activate *Chateau* Herbicide SW on soil for residual weed control. Dry weather following application of *Chateau* Herbicide SW may reduce effectiveness. However, when adequate moisture is received after dry conditions, *Chateau* Herbicide SW will control susceptible germinating weeds.

### **POSTEMERGENCE APPLICATION**

Apply 6 to 12 oz (0.188 to 0.38 lb ai/A) of *Chateau* Herbicide SW per broadcast acre plus an adjuvant (0.25% v/v non-ionic surfactant or 1 qt/A crop oil concentrate). The addition of an adjuvant enhances *Chateau* Herbicide SW activity on emerged weeds. Thorough spray coverage is necessary to maximize the postemergence activity of *Chateau* Herbicide SW. Emerged weeds are controlled postemergence with *Chateau* Herbicide SW, however, translocation of *Chateau* Herbicide SW within a weed is limited, and control is affected by spray coverage and by the addition of an adjuvant. The most effective

postemergence weed control with *Chateau* Herbicide SW occurs when applied in combination with a surfactant to weeds less than 2 inches in height. A tank mix partner should be used in combination with *Chateau* Herbicide SW for the postemergence control of weeds larger than 2 inches. Recommended tank mix partners are listed in Table 10.

**IMPORTANT:** Completely read and follow the label of any potential tank mix partner with *Chateau* Herbicide SW. When using tank mixtures, use conditions must be in accordance with the most restrictive of the label limitations and precautions on either herbicide label.

Table 10. Tank Mix Combinations to Maintain Bare Ground on Non-Crop Areas

glyphosate 2,4-D	Rely	paraquat
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### STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage, disposal or cleaning of equipment.

### **PESTICIDE STORAGE**

Keep pesticide in original container. Store in a cool, dry, secure place.

Do not put formulation or dilute spray solution into food or drink containers.

Do not contaminate food or foodstuffs.

Do not store or transport near feed or food.

Not for use or storage in or around the home.

For help with any spill, leak, fire or exposure involving this material, call day or night (800) 892-0099.

### **PESTICIDE DISPOSAL**

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

### **CONTAINER DISPOSAL**

Nonrefillable container. Do not reuse or refill this container. Offer for recycling, if available. Clean container promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then offer for recycling, if available or puncture and dispose of in a sanitary landfill.

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### Manufactured for:

### **Valent U.S.A. Corporation**

P.O. Box 8025 Walnut Creek CA 94596-8025 Made in U.S.A. Form 1522-H EPA Reg. No. 59639-99 EPA Est. 11773-IA-01®, 39578-TX-01® Superscript is first letter in lot number.

Information contained in this booklet is accurate at the time of printing. Since product testing is a continuous process, please read and follow the directions on the product label for the most current directions and precautionary statements.

Always check with your state to verify state registration status or call 800-6-VALENT (682-5368).



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