352-573

8/29/2001

н. 1/13



# DuPont<sup>™</sup> Synchrony<sup>®</sup> STS<sup>®</sup> DF herbicide



"...... A Growing Partnership With Nature"

### DUPONT™ SYNCHRONY® STS® DF Highlights

- SYNCHRONY® STS® DF is available in a measurable form in containers.
- SYNCHRONY® STS® DF provides selective postemergence weed control of a large spectrum of broadleaf weeds.
- SYNCHRONY® STS® DF may be tank mixed with DuPont<sup>™</sup> ASSURE® II, or other products for increased weed control.
- · Include a crop oil concentrate or a nonionic surfactant and ammonium-based nitrogen fertilizer where required.
- SYNCHRONY® STS® DF may be applied by ground. 2 - 10 - 10 22 (broadcast or band) or by air,
- For ground application, apply in 10-25 gallons of water
- at 25-60 psi. Use flat fan nozzles to optimize
- SYNCHRONY® STS® DF performance.
- · Apply to actively growing weeds at the recommended sizes. See Rate. Certain crop. fotations apply.
- See Rotational Crop Guidelines.
- Certain environmental conditions, such as cool and dry,

- or hot and humid weather, affect the performance of SYNCHRONY® STS® DF. See Environmental
- Conditions, 1
- Consult label text for complete instructions. Always read and follow label directions for use.

### TABLE OF CONTENTS

Directions For Use	2
Application Information - All Uses	2
Timing To Crop Stage	2
Timing To Weeds	2
Tank Mix Restrictions	2
Cultivation	2
SYNCHRONY® STS® DF at 0.5 oz per acre -	
in season use on "STS" soybeans only	
Rate and Weeds Controlled	3
Sequential Applications	3
Spray Additives	3
Tank Mixes for 0.5 oz per acre in season use	3
SYNCHRONY® STS® DF at 0.5 oz per acre -	-
Burndown Application	
Application Timing	4
Spray Additives	4
Weeds Controlled - Burndown	4
Weeds Controlled - Limited Residual	4
SYNCHRONY® STS® DF at 0.25 oz per acre -	-
Reduced Rate Uses	
Postemergence Application Information	5
Timing to Weeds	5
Spray Additives	5
- "STS" soubeans	5
- Non-"STS" southeans	5
Weeds Controlled by 0.25 oz per sore	5
SVNCHRONY® STS® DF	5
Tank Mixes with 0.25 oz per sore	2
SYNCHRONY® STS® DF	5
Weeds Controlled by 0.25 oz per sore	2
SVNCHRONV® STS® DE preceded by	
DuPontIM ALITHOPITY®	5
Burndown tankmis with AUTHORITY®	5
Brecoutions for 0.25 or per acre	2
SVNCHRONVA STEA DE	5
Mixing Instructions	6
Application Equipment	6
Ground Application	6
A orial Application	. U 6
Environmental Conditions and Biological Activity	. U 6
Batational Crop Chidalines	7
The Importance of Soil pH	. / Q
Spraver Preparation and Cleanup	. 0 . 2
Spray Drift Management	. 0 
Important Precautions	. 0 0
Information on Resistant Weeds	ر . م
Integrated Dest Management	י א 10
Storage and Disposal	10
Notice of Warranty	10
LOUIVE UI TRAILMINT COMMANDATION COMMANDATION COMMANDATION	- 0

# **UPOND** DuPont<sup>™</sup> Synchrony<sup>®</sup> STS<sup>®</sup> DF

herbicide

### Dispersible Granules

Active IngredientsBy WeightChlorimuron ethylEthyl 2-[[[[(4-chloro-6-methoxypyrimidin-2-<br/>yl)amino]carbonyl]amino]sulfonyl]benzoate31.8%Thifensulfuron methyl<br/>Methyl 3-[[[[(4-methoxy-6-methyl-1,3,5-<br/>triazin-2-yl)amino]carbonyl]amino]<br/>sulfonyl]-2-thiophenecarboxylate10.2%Inert Ingredients58.0%TOTAL100.0%

EPA Reg. No. 352 - 573

### **KEEP OUT OF REACH OF CHILDREN**

### CAUTION

### FIRST AID

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 continue rinsing eye. Call a poison control center or doctor for treatment advice.

IF ON SKIN OR CLOTHING: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice.

IF INHALED: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then given artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-800-441-3637 for emergency medical treatment information.



### PRECAUTIONARY STATEMENTS

### HAZARDS TO HUMANS AND DOMESTIC ANIMALS

**Caution!** Causes moderate eye irritation. Harmful if absorbed through skin or inhaled.

Avoid contact with skin, eyes, and clothing. Avoid inhaling vapor or spray mist. Wash thoroughly with soap and water after handling.

### PERSONAL PROTECTIVE EQUIPMENT

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

### Applicators and other handlers must wear:

Long-sleeved shirt and long pants.

Chemical Resistant Gloves Category A (such as butyl rubber, natural rubber, neoprene rubber, or nitrile rubber), all  $\geq 14$  mls.

Shoes plus socks.

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

### ENGINEERING CONTROL STATEMENTS

When handlers use closed systems, enclosed cabs or aircraft in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR part 170 Section 170.240 (d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

### USER SAFETY RECOMMENDATIONS

USERS SHOULD: Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.

### ENVIRONMENTAL HAZARDS

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

### **DIRECTIONS FOR USE**

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

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

### AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment(PPE) and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted entry interval (REI) of 12 hours.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is:

Coveralls.

Chemical Resistant Gloves Category A (such as butyl rubber, natural rubber, neoprene rubber, or nitrile rubber), all  $\geq 14$  mls. Shoes plus socks.

Use only in the geographies identified in the "Rotational Crop Guidelines" section of this label.

DuPont<sup>™</sup> SYNCHRONY® STS® DF herbicide must be used only in accordance with recommendations on this label or in separately published DuPont recommendations.

### **APPLICATION INFORMATION - ALL USES**

- DuPont<sup>™</sup> SYNCHRONY® STS® DF herbicide is a dispersible granule formulation which readily dissolves in water.
- SYNCHRONY® STS® DF may be used in conventional, no-till, or conservation tillage soybean production.

### **Timing To Crop Stage**

- SYNCHRONY® STS® DF, for in-season use, may be applied any time after the first trifoliate has opened but no later than 60 days before soybean maturity.
- SYNCHRONY® STS® DF, for burndown use, may be applied up to 30 days before planting, or prior to soybean emergence after planting.

### Timing To Weeds

- Apply SYNCHRONY® STS® DF when weeds are young and actively growing (after the first true leaves have expanded, but before the weeds exceed the size indicated below).
- Applications made to weeds larger than the sizes indicated below, or to weeds under stress, may result in unsatisfactory control.
- Applications made after July 15 may result in less than satisfactory weed control due to the large sizes of the weeds and increased weather stress.

### Tank Mix Restrictions

When tank mixing SYNCHRONY® STS® DF with any other approved soybean pesticide, always read and follow all use directions, restrictions and precautions of both SYNCHRONY® STS® DF and the tank mix partner(s). When tank mixing, the most restrictive labeling applies.

### Cultivation

Do not cultivate within 7 days of application. Cultivation may put weeds under stress by pruning roots, thus diminishing control.

Cultivation approximately 14 days after application will help control suppressed weeds.

### SYNCHRONY® STS® DF AT 0.5 OZ PER ACRE - IN SEASON USE ON "STS" SOYBEANS ONLY

# FOR USE ONLY ON SOYBEAN VARIETIES DESIGNATED AS "STS"

- Application to soybean varieties not designated as "STS" will result in severe crop injury and/or yield loss.
- DuPont will not warrant the safety of this treatment to seed saved from previous year's production (bin ran seed).
  These "STS" varieties must be purchased from an authorized seed supplier seed.
- The "STS" designation indicates the soybean variety contains a proprietary trait that enhances the soybean's natural tolerance to DuPont soybean sulfonylurea herbicides. Information on "STS" soybean varieties may be obtained from your seed supplier or DuPont representative.

### Weeds Controlled at 0.5 oz/acre rate in season

Apply DuPont<sup>™</sup> SYNCHRONY® STS® DF at a rate of 0.5 ounce per acre for selective postemergence control of the following broadleaf weeds:

	Maximum
Weed	Height (in inches)
Beggarticks (Bidens sp)	6
Bristly Starbur	3
Burcucumber*	3
Cocklebur	8
Common Milkweed (above ground portion)	6
Cowpea	5
Dandelion (above ground portion)	4
Florida Beggarweed	5
Hemp Sesbania	5
Lambsquarters	4
Jerusalem Artichoke (above ground portion)	6
Jimsonweed	5
Marestail	5
Morningglory* (annual)	
Entireleaf	3
lvylcaf	3
Pitted	3
Smallflower	3
Tall	3
Mustard	5**
Pigweeds	
Redroot (Rough)	8
Others	8
Ragweed	
Common	4
Giant*	4
Sicklepod*	3
Smartweed	
Ladysthumb	8
Pennsylvania	8
Sunflower	8
Wild Poinsettia	_2
Yellow Nutsedge	3
Velvetleaf	8

\* See Sequential Applications section.

When applied as directed, SYNCHRONY® STS® DF will suppress the following weeds:

Maximum Height (in inches)		
6		
3		
6		
4		
6		
3		
4		
3		
3		

# Sequential Applications: 0.5 oz/acre rate in season

A follow up application of DuPont<sup>TM</sup> CLASSIC® herbicide or SYNCHRONY® STS® DF herbicide may be made 2-3 weeks after a SYNCHRONY® STS® DF application to control weeds with multiple germination flushes or weeds under stress such as burcucumber, cowpea, giant ragweed, morningglory, and sicklepod. See Rotational Crop Guidelines for intervals following sequential applications.

### Spray Additives: 0.5 oz/acre rate in season

Applications of SYNCHRONY® STS® DF must include a crop oil concentrate. Refer to the DuPont bulletin "Approved Adjuvants for Use with DuPont Row Crop and Cereal Herbicides" for a list of approved adjuvants and suggested use rates to: SYNCHRONY® STS® DF An animonium nitrogen fertilizer may also be required. Products that combine animonium fertilizers with surfactants or erop oils must meet all of the surfactafficrop oil and animonium nitrogen fertilizer requirements.

#### Crop Oil Concentrate

- Apply crop oil concentrate at 8 pt per 100 gal of spray solution (1.0% v/v).
- Use a good-quality, petroleum-based or methylated seed oilbased crop oil concentrate with at least 14% emulsifiers and 80% oil.

### Ammonium Nitrogen Fertilizer

In addition to a crop oil concentrate, an ammonium nitrogen fertilizer is recommended, and required where velvetleaf is present.

- Use a high-quality, liquid nitrogen fertilizer such as 28-0-0 or 30-0-0 at a rate of 4-8 pt per acre, or a 10-34-0 at a rate of 2-4 pt per acre.
- Alternatively, a high-quality, sprayable grade of ammonium sulfate (21-0-0) may be used at a rate of 2-4 lb per acre.
- Use the lower rate of fertilizer for spray volumes of less than 15 gal per acre.

#### Tank Mixes for 0.5 oz per acre rate in season

Do not tank mix SYNCHRONY® STS® DF with any other pesticide or spray adjuvant except as specified on this or other supplemental labeling.

SYNCHRONY® STS® DF and "Flexstar", "Reflex", "Blazer", or "Cobra" Herbicides

For control of up to 4" waterhemp, up to 2" eastern black nightshade and for improved common ragweed control, SYNCHRONY® STS® DF may be tankmixed with:

- 0.75 1.25 pt/acre "Flexstar"
- 0.75 1.5 pt/acre "Reflex"
- 0.5 1.5 pt/acre "Blazer", or
  - 4 6 fluid oz/acre "Cobra"

Refer to the "Flexstar", "Reflex", "Blazer" and "Cobra" labels for the appropriate rate based on the weed sizes to be controlled. Nonionic surfactant or crop oil concentrate must be added.

- For best results with SYNCHRONY® STS® DF plus "Reflex" or "Flexstar", use a methylated seed oil-based or petroleum oil-based crop oil concentrate at 8 pt per 100 gallon spray solution (1% v/v).
- For best results with SYNCHRONY® STS® DF plus "Blazer", use nonionic surfactant at 2 pt per 100 gallon spray

<sup>\*\*</sup> Diameter

solution. Use of crop oil concentrate is not recommended, as severe injury may occur.

• For best results with DuPont<sup>™</sup> SYNCHRONY® STS® DF plus "Cobra", use crop oil concentrate at 4 pt per 100 gallon scray solution (0.5% v/v).

#### For control of Prickly Sida and Hemp Sesbania, tank mix 0.5 oz SYNCHRONY® STS® DF with 8-12.5 fl oz "Cobra".

Use the higher "Cobra" rate when Prickly Sida or Hemp Sesbania are heavy or if Prickly Sida and Hemp Sesbania approach the maximum size of 1" or 4", respectively. Include a nonionic surfactant at 1-2 pt per 100 gallons of spray solution (.125-.25% vv). Do not use crop oil concentrate when tankmixing SYNCHRONY® STS® DF and "Cobra" at these rates.

#### Precautions for tankmixes of SYNCHRONY® STS® DF plus "Flexstar", "Reflex", "Blazer", or "Cobra"

Tank mix applications of SYNCHRONY® STS® DF plus "Flexstar", "Reflex", "Blazer", or "Cobra" may not control weeds listed on the SYNCHRONY® STS® DF label as completely as applications of SYNCHRONY® STS® DF alone.

#### SYNCHRONY® STS® DF and Postemergence Grass Herbicides

SYNCHRONY® STS® DF and SYNCHRONY® STS® DF tankmixes may be tank mixed with postemergence grass herbicides such as DuPont<sup>™</sup> ASSURE® II herbicide. For best results, apply SYNCHRONY® STS® DF seven days before or one day after the grass herbicide. Refer to the grass herbicide label for precautions and specific use information.

### SYNCHRONY® STS® DF and "FirstRate" Herbicide

For improved Ragweed and Cocklebur control, add between 0.075 - 0.3 oz per acre to 0.5 oz per acre SYNCHRONY® STS® DF. These tankmixes will control up to 10" Cocklebur or Common Ragweed and up to 12" Giant Ragweed. Use a lower amount of "FirstRate" when weeds are less than the maximum size and under good growing conditions. Use a higher amount of "FirstRate" when weeds are approaching the maximum size and/or under unfavorable growing conditions.

A good quality petroleum-based or methylated seed oil-based crop oil concentrate must be added to the tank mix at the rate of 8 pints per 100 gallons of spray solution or at 1% v/v. An ammonium nitrogen fertilizer may be added as directed under the "Spray Additives" section.

#### SYNCHRONY® STS® DF and 2,4-DB

- In soybeans at least 8" tail, SYNCHRONY® STS® DF may be tank mixed with 1-2 fl oz per acre of 2,4-DB for improved control of giant ragweed up to 4" tall, annual morningglory and other broadleaf weeds.
- Applications of SYNCHRONY® STS® DF and 2,4-DB must include a nonionic surfactant at the rate of 2 pints per 100 gal or crop oil concentrate at 8 pints per 100 gal of spray solution (1.0% v/v). See Spray Additives.
- Apply a tank mix of SYNCHRONY® STS® DF and 2,4-DB by ground only.
- In Kansas and Missouri (except the bootheel area), when conditions are excessively hot and dry (> 90°F and < 30% relative humidity), make applications at the rate of 2 fl oz of 2,4-DB and SYNCHRONY® STS® DF.

• The use of crop oil concentrate may increase temporary injury to soybeans.

Some crop response may occur 5-7 days after application of SYNCHRONY® STS® DF and 2,4-DB to soybeans under stress. Temporary yellowing, leaf crinkling, and/or soybean growth retardation may occur following application of SYNCHRONY® STS® DF and 2,4-DB. Under favorable growing conditions, the crop will quickly recover.

### SYNCHRONY® STS® DF AT 0.5 OZ PER ACRE - BURNDOWN APPLICATION

SYNCHRONY® STS® DF at 0.5 oz per acre may be tankmixed with 1-3 pints per acre "Roundup Ultra", 0.5-2.0 pints per acre "Touchdown 5", or equivalent rates of glyphosate-containing herbicides registered for soybeans for burndown of existing summer and winter annual weeds and limited residual control of certain summer annual broadleaf weeds.

### **Application Timing - Burndown**

SYNCHRONY® STS® DF tankmixed with "Roundup Ultra" or "Touchdown 5" can be applied up to 30 days before planting or prior to soybean emergence after planting.

#### Spray Additives - Burndown

- · Always include 0.25% non-ionic surfactant.
- The addition of 1 2 percent dry Ammonium Sulfate by weight or 8.5 17 pounds per 100 gallons of water may increase performance of this tank mix.
- For enhanced burndown control, 1 pint of 2,4-D LVE (0.5 lbs a.e./A) may be added up to seven days prior to planting.

#### Weeds Controlled - Burndown

SYNCHRONY® STS® DF tank mixed with "Roundup Ultra" or "Touchdown" applied prior to planting will provide burndown control of the weeds listed on page three of this label as well as control of most winter and summer annual broadleaf and grass weeds. Consult the "Roundup Ultra" and/or "Touchdown" specimen labels for specific use instructions including all weeds controlled or suppressed, the suggested use rates, maximum weed size at application, restrictions, limitations and precautions. The addition of SYNCHRONY® STS® DF to "Roundup Ultra" or "Touchdown" will increase the burndown control of the following weeds versus "Roundup Ultra" or "Touchdown" applied alone:

Dandelion, Common	Nutsedge, Yellow
Dock, Curly	Primrose, cutleaf evening
Hemp Sesbania	Ragweed, Common and Giant
Henbit	Sicklepod
Marestail	Smartweed, Annual
Morningglory Spp., Annual	Velvetleaf

# 7/13

#### Weeds Controlled - Limited Preemergence

When used according to this label, DuPont<sup>TM</sup> SYNCHRONY® STS® DF at 0.5 oz/A can provide limited preemergence control of the weeds listed below to contribute to a clean seedbed at planting. For season-long control, a planned PRE or POST sequential program is required.

Jimsonweed	Pigweeds (Redroot, Smooth	
Lambsquarter	Palmer)	
Marestail	Smartweeds, Annual	
Nutsedge, yellow	Ragweeds	

Due to heavy weed pressure, delayed planting or adverse environmental conditions, additional burndown control measures may be required at planting.

### SYNCHRONY® STS® DF 0.25 OZ PER ACRE - REDUCED RATE USES

### (NON-"STS" SOYBEANS)

- SYNCHRONY® STS® DF at 0.25 oz/acre may be applied to any soybean type (which includes non-"STS", "STS" and "Roundup Ready") for broadleaf weed control.
- SYNCHRONY® STS® DF at 0.25 oz/acre may be used:
  - postemergence, or
  - tankmixed with DuPont AUTHORITY® preplant or preemergence for improved burndown control, or
  - in a planned program following a preemergence, preplant incorporated or preplant burndown application of AUTHORITY®.

# SYNCHRONY® STS® DF at 0.25 oz per acre - postemergence application information

### Timing to Weeds

Apply SYNCHRONY® STS® DF to 1 - 4" weeds that are actively growing. Applications made to weeds that are in the cotyledon stage, larger than the size indicated, or to weeds under stress may result in unsatisfactory control.

## Spray Additives with 0.25 oz/acre SYNCHRONY® STS® DF

"STS" soybeans: When using SYNCHRONY® STS® DF in soybeans designated as "STS", add crop oil concentrate at 8 pt per 100 gal of spray solution (1.0% v/v).

**Non-"STS" Soybeans:** When using SYNCHRONY® STS® DF in soybeans that are NOT designated as "STS", add nonionic surfactant at a rate of 2 pt per 100 gal of spray solution (0.25% v/v) unless directed by other supplemental labeling.

Ammonium nitrogen fertilizer: Use a high quality, liquid nitrogen fertilizer such as:

28-0-0 or 30-0-0	4 - 8 pts per acre or
10-34-0	2 - 4 pts per acre or
AMS:	sprayable grade ammonium sulfate
	(21-0-0) at 2 - 4 lb per acre

Weeds controlled by 0.25 oz per acre SYNCHRONY® STS® DF alone:

Cocklebur Pigweed species (including triazine resistant) Wild sunflower And suppress growth of the following weed species:

Lambsquarters Jimsonweed Milkweed, common (above ground portions only) Ragweed, common Smartweeds, annual Velvetleaf

### Tankmixes with 0.25 oz/acre SYNCHRONY® STS® DF

Add 0.75 - 1.25 pt/acre "Flexstar" for control of emerged 4" waterhemp and 2" eastern black nightshade, or improved control of velvetleaf and common ragweed.

Add up to 0.15 oz/acre "FirstRate" for improved control of emerged common ragweed and velvetleaf.

Add up to 0.125 oz/acre DuPont<sup>™</sup> PINNACLE® or up to 9.042 oz/acre DuPont<sup>™</sup> HARMONY® GT for improved control of emerged lambsquarters, common milkweed, annual smartweeds and velvetleaf.

Refer to the "Flexstar", "FirstRate", HARMONY® GT and PINNACLE® labels for other weeds controlled and for the appropriate rate based on the weed sizes. Read and follow all use directions, restrictions and precautions of both SYNCHRONY® STS® DF and the tankmix partners. When tankmixing, the most restrictive labeling applies.

### Weeds controlled by 0.25 oz per acre SYNCHRONY® STS® DF preceded by 4 - 5.3 oz per acre AUTHORITY®:

Cocklebur Jimsonweed Kochia Lambsquarters Milkweed, Common (above ground portions only) Morningglory, Ivyleaf Nightshade, Eastern Black Pigweed species (including triazine resistant) Ragweed, Common Smartweeds, Annual Velvetleaf Waterhemp, Common and Tall Wild sunflower

### SYNCHRONY® STS® DF at 0.25 oz per acre -Burndown tankmix with AUTHORITY®

For improved burndown with AUTHORITY®, a tankmix of 0.25 oz/acre SYNCHRONY® STS® DF + AUTHORITY® + 1% v/v COC may be applied to burndown broadleaf weeds up to 3" in height and annual grasses up to 1" in height. See the Pre-plant Burndown section of the AUTHORITY® label for weeds burned down by AUTHORITY®. Addition of 0.25 oz/acre SYNCHRONY® STS® DF will improve burndown of dandelion, marestail, prickly lettuce, giant ragweed, common ragweed, pennycress, small-flowered bittercress, shepherd's purse and tansy mustard. One pint of 2,4-D LVE (0.5 lbs a.e./acre) may be tankmixed with AUTHORITY® + 0.25 oz/acre SYNCHRONY® STS® DF up to 7 days prior to planting.

### Precautions for 0.25 oz SYNCHRONY® STS® DF uses

• A temporary crop response may occur following an application of SYNCHRONY® STS® DF to soybeans not designated "STS" in the variety name.

8/13

- Applications made when the crop and weeds are under stress from moisture, cold, heat, high humidity, disease, insect pressure and prior herbicide stress may result in excessive crop response and/or reduced weed control effectiveness.
- Do not tankmix "Poast Plus" with 0.25 oz/acre DuPont<sup>TM</sup> SYNCHRONY & STS® DF unless the soybean is designated as an "STS" variety.

### **MIXING INSTRUCTIONS**

- 1. Fill the tank 1/4 to 1/3 full of water.
- 2. While agitating, add the required amount of SYNCHRONY® STS® DF.
- 3. Continue adequate agitation.
- 4. SYNCHRONY® STS® DF should be thoroughly mixed with water in the spray tank before adding any other material. As the tank is filling, add (in order): other herbicide(s), the required spray adjuvant, and the nitrogen fertilizer where required.
- 5. Apply SYNCHRONY® STS® DF spray preparation within 24 hours of mixing to avoid product degradation.
- 6. If the mixture has settled, thoroughly reagitate before using.

### APPLICATION EQUIPMENT

### Ground Application (See Also Spray Drift Management)

#### **Broadcast Application**

- Postemergence in soybeans, use a minimum of 10 gal water per acre. Under heavy weed pressure or dense crop foliage, increase minimum spray volume to 15-25 gal per acre.
- Use flat fan nozzles at 25-60 psi for SYNCHRONY® STS® DF applications.
- For burndown applications of existing vegetation, flat fan nozzles and a minimum of 20 gallons per acre are recommended so as to thoroughly wet the foliage to be burned down.
- Do not use flood, rain drop, whirl chamber, or controlled droplet applicator (CDA) type nozzles. Unacceptable crop injury, excessive spray drift, or poor weed control may result.
- For proper spray coverage adjust the boom and nozzle height according to the specifications listed by the nozzle manufacturer.

#### **Band** Application

- Because band applicators spray a narrower area than broadcast applicators, use proportionately less spray solution for band applications.
- Carefully calibrate the band applicator to not exceed the labeled rate.
- · Flat fan nozzles are recommended.
- Carefully follow the nozzle manufacturer's instructions for nozzle orientation, distance of the nozzles from the crop and weeds, spray volumes, calibration, and spray pressure for band applications.
- For additional information on row banders, see DuPont bulletin, "Application Accuracy Row Banders."

### Aerial Application (See Also Spray Drift Management)

- Use nozzle types and arrangements that will provide optimum spray distribution and maximum coverage at 3-5 gal per acre.
- Use a minimum of 3 gal water per acre. Under heavy weed pressure or dense crop foliage, increase the minimum spray volume to 5 gal per acre.
- Do not apply during a temperature inversion, when winds are gusty, or when other conditions could produce poor coverage and/or off-target spray movement.

### ENVIRONMENTAL CONDITIONS AND BIOLOGICAL ACTIVITY

SYNCHRONY® STS® DF rapidly inhibits the growth of susceptible weeds. Leaves of susceptible plants yellow 3-5 days after application, followed, in controlled plants, by the death of the growing point. SYNCHRONY® STS® DF will provide complete control of susceptible weeds in 7-21 days. Suppressed plants may remain green but will be stunted and noncompetitive.

SYNCHRONY® STS® DE will provide best resultered	cu .
applied to young, actively growing, woods. Depice of pop	нi
depends on; weed spectrum; weed specific fit weeds are large	
nse higher spray volume); growing grouditions at ane	
following treatment; soft moisture; precipitation; and spra	y 16
adjuvants. Treating weeds under stress or large weeds may,	
result in only partial control. Stress may be caused by:	
<ul> <li>abnormal weather (hot or cold)</li> </ul>	
<ul> <li>mechanical injury from cultivation</li> </ul>	
• drought	
• water-saturated soil	
• disease	6. 1 1
• insect injury	
prior herbicide injury	

Stress affects some weeds, such as pigweed, more than others. Delay application until stress passes and weeds start to grow again.

Severe stress (drought, disease, insect damage, or nutrient deficiency such as iron chlorosis) following application may also result in poor weed control.

Do not apply SYNCHRONY® STS® DF if rain is expected within

1 hour or weed control may decrease.

### **ROTATIONAL CROP GUIDELINES**

- Important: Crops other than soybeans following a DuPont<sup>™</sup> SYNCHRONY® STS® DF application can vary in their sensitivity to low concentrations of SYNCHRONY® STS® DF remaining in the soil. Rotational crop guidelines must be followed.
- When SYNCHRONY® STS® is applied in sequence with DuPont<sup>™</sup> CANOPY®, DuPont<sup>™</sup> CANOPY® SP or DuPont<sup>™</sup> CANOPY XL® follow rotational crop guidelines listed on the corresponding label.

Region A: The states of Delaware, Illinois, Indiana, Iowa (fields located outside the boundaries of the Clarion-Nicollet-Webster and Hamburg-Ida-Monona soil associations and fields located outside the historic flood plain of the Missouri River), Kansas, Kentucky, Maryland, Michigan (fields south of Interstate 96 or per supplemental labeling), Missouri (except the Bootheel), Nebraska (fields south of Route 30 and east of Route 281), New Jersey, Ohio, Pennsylvania and West Virginia.

**Region B:** The states of Alabama (except the "Black Belt" where soil pH must be less than 7.0), Arkansas, Florida, Georgia, Louisiana, Missouri (Bootheel region only), Mississippi (except the "Black Belt" where soil pH must be less than 7.0), North Carolina, Oklahoma, South Carolina, Tennessee, Texas (fields east of Route 183), and Virginia.

**Region C:** The states of Minnesota, South Dakota, Wisconsin, Iowa (fields inside the boundaries of the Clarion-Nicollet-Webster and Hamburg-Ida-Monona soil associations and fields located inside the historic floodplain of the Missouri River) and Nebraska (fields north of route 30 and west of Route 281). <u>Do</u> not exceed 0.25 oz/acre per season in region C states.

#### Follow Recrop Interval 1 if:

- The field is located in a "Region A" state (all pH soils) AND, EITHER
- A maximum of 1/2 oz/acre of SYNCHRONY® STS® DF was applied for the use season, OR
- A maximum of 1/2 oz/acre of SYNCHRONY® STS® DF in sequence with 1/3 oz/acre of DuPont<sup>™</sup> CLASSIC® was applied for the use season.

#### Follow Recrop Interval 1 if:

- The field is located in a "Region A" state with soil pH 7.0 or less AND
- ANI
- A maximum of 1/2 oz/acre of SYNCHRONY® STS® DF was applied in sequence with a maximum rate of 3/4 oz/acre of CLASSIC®, or a maximum of two applications of SYNCHRONY® STS® DF at a rate of 1/2 oz/acre per application was applied.

#### Follow Recrop Interval 2 if:

- The field is located in a "Region B" state (all pH soils except those with pH greater than 7.0 in Virginia and the Black Belt region of Alabama and Mississippi) AND
- A maximum of 1/2 oz/acre of SYNCHRONY® STS® DF was applied in sequence with 3/4 oz/acre of CLASSIC®, or a maximum of two applications of SYNCHRONY® STS® DF at a rate of 1/2 oz/acre per application was applied.

#### Follow Recrop Interval 3 if:

- The field is located in a "Region A, B or C" state AND
- A maximum of 1/4 oz/acre SYNCHRONY & STS® DF was applied during the use season.

### Rotational Interval (months) Following the Use of SYNCHRONY® STS® DF\*

Сгор	Interval 1	Interval 2	Interval 3		
Soybeans	Anytime	Anytime	Anytime		
Cereal Grains. Pasture Grasses					
(such as Fescue and Ryegrass)	3	3	3		
Dry Beans, Kidney Beans					
Peas, Snap Beans	9	9	9		
Field Corn (IR)	8	7	8		
Field Corn** (States in Regions A &	C) 9		9		
Field Corn**(States of AR, MO [Bo	otheel				
only], NC, OK, TN, and TX)		8			
Field Com**(States of AL, FL, GA,	LA,				
MS, and SC)		7			
Popcorn	9	9	9		
Sorghum	9	9	9		
Tobacco (transplant)	9	9	9		
Tomato (transplant)	9	9	9		
Peanuts	15	6	6		
Rice	15	9	9		
Cotton	9	8	9		
Alfalfa	12	9	9		
Clover	12	9	9		
Cabbage	18	18	18		
Canola (Rapeseed)	18	18	18		
Cucumber	18	18	9		
Flax	18	18	18		
Lentils	18	18	18		
Mustard	18	18	18		
Pumpkins	18	18	9		
Sunflower	18	18	9		
Sweet Com	18	18	9†		
Watermelon	18	18	9		
Carrots	30	30	30		
Onions	30	30	30		
Potatoes (including Sweet Potatoes)	30	30	30		
Potatoes, irish		8††			
Sugar Beets	30	30	30		
Any crop not listed	30	30	30		

 If SYNCHRONY® STS® DF or the latter part of a sequential treatment containing chlorimuron ethyl (such as CLASSIC®) is applied after August 1, extend rotational crop intervals 2 months for alfalfa, clover, corn (non-IR), cotton, popcorn, rice, sorghum, tobacco, and tomato.

- \*\*The term "Field Corn" is defined to include only that corn grown for grain or silage or for seed corn relative to the Rotational Crop Guidelines section of this label.
- † Rotational crop intervals are for processing Sweet Corn varieties only. The rotational crop interval for other Sweet Corn varieties is 18 months.
- ††States of NC and VA in soils with organic matter greater than 1%.

10/13

### THE IMPORTANCE OF SOIL PH

Soil pH varies greatly, even within the same field. pH variations as much as 2 pH units are common. Composite soil samples taken across an entire field, such as those samples taken for soil fertility recommendations, may not detect areas of high pH. Subsampling is recommended for areas likely to have pH values higher than the field average. The following is a non-inclusive list of potential high pH areas where subsampling is recommended.

- Where different soil types are evident within a field, sample soil types separately.
- Where conditions vary within a field, sample areas separately, such as:
  - areas bordered by limestone gravel roads,
  - river bottoms subject to flooding,
  - low areas in hardpan soils where evaporative ponds may occur,
  - eroded hillsides,
  - along drain tile lines, and
  - areas where drainage ditch spoil has been spread.
- Where lime has not been deeply incorporated, soil may exhibit significantly higher pH values in the upper 3 inches of soil. Composite soil samples taken at a 6-8 inch depth may not reflect the elevated pH near the surface. In these cases shallow sampling, the upper 3 inches, is advised.

Determine soil pH by laboratory analysis using a 1:1 soil:water suspension.

### SPRAYER PREPARATION AND CLEANUP

Prior to application of DuPont<sup>™</sup> SYNCHRONY® STS® DF, start with clean, well maintained application equipment. Immediately following application, thoroughly clean all application equipment. Postponing action, even for a few hours, only makes effective cleanup more difficult. Failure to clean spraying equipment thoroughly may result in injury to subsequently sprayed crops.

When spraying multiple loads of SYNCHRONY® STS® DF over an extended period of time, rinse the equipment with clean water at the end of the day. Leave water in the equipment overnight to prevent deposits from drying on surfaces.

When applications of SYNCHRONY® STS® DF are completed and prior to using the sprayer and associated equipment for other products or for crops other than soybeans, thoroughly clean the equipment using the procedure below.

- STEP 1. Drain spray equipment. Thoroughly rinse sprayer, and flush hoses, boom and nozzles with clean water. Loosen and physically remove visible deposits.
- STEP 2. Fill the sprayer with clean water and add household ammonia (one gallon of 3% active for every 100 gallons of water) or correct amount of a DuPont approved cleaner\*. Flush hoses, boom and nozzles. Turn off the boom and top off the tank with clean water. Circulate through the spraying system for 15 minutes. Flush the hoses, boom and nozzles with the cleaning solution. Drain the tank.
- STEP 3. Remove and clean nozzle, screens and strainers in a bucket of fresh cleaner and water.
- STEP 4. Repeat STEP 2.

STEP 5. Thoroughly rinse the sprayer, hoses, boom and nozzles with clean water, several times.

Clean all other associated application equipment. Take all necessary safety precautions when cleaning equipment. Do not clean near wells, water sources or near desirable vegetation. Dispose of waste rinse water in accordance with local regulations.

\* For additional information on sprayer cleanup and a listing of DuPont-approved cleaners, see DuPont Bulletin "A Guide To Application Equipment Cleanout For DuPont Sulfonylurea Herbicides".

### SPRAY DRIFT MANAGEMENT

The interaction of many equipment and weather-related factors determines the potential for spray drift. The applicator is responsible for considering all these factors when making application decisions. AVOIDING SPRAY DRIFT IS THE RESPONSIBILITY OF THE APPLICATOR.

### **IMPORTANCE OF DROPLET SIZE**

The most effective way to reduce drift potential is to apply large droplets (>150 - 200 microns). The best drift management strategy is to apply the largest droplets that provide sufficient coverage and control. The presence of sensitive species nearby, the environmental conditions, and pest pressure may affect how an applicator balances drift control and coverage. APPLYING LARGER DROPLETS REDUCES DRIFT POTENTIAL, BUT WILL NOT PREVENT DRIFT IF APPLICATIONS ARE MADE IMPROPERLY OR UNDER UNFAVORABLE ENVIRONMENTAL CONDITIONS! See Wind, **Temperature and Humidity**, and **Temperature Inversions** sections of this label.

### **Controlling Droplet Size - General Techniques**

- Volume Use high flow rate nozzles to apply the highest practical spray volume. Nozzles with higher rated flows produce larger droplets.
- Pressure Use the lower spray pressures recommended for the nozzle. Higher pressure reduces droplet size and does not improve canopy penetration. WHEN HIGHER FLOW RATES ARE NEEDED, USE A HIGHER-CAPACITY NOZZLE INSTEAD OF INCREASING PRESSURE.
- Nozzle Type Use a nozzle type that is designed for the intended application. With most nozzle types, narrower spray angles produce larger droplets. Consider using low-drift nozzles.

### **Controlling Droplet Size - Aircraft**

- Number of Nozzles Use the minimum number of nozzles with the highest flow rate that provide uniform coverage.
- Nozzle Orientation Orienting nozzles so that the spray is emitted backwards, parallel to the airstream will produce larger droplets than other orientations.
- Nozzle Type Solid stream nozzles (such as disc and core with swirl plate removed) oriented straight back produce larger droplets than other nozzle types.
- Boom Length The boom length should not exceed 3/4 of the wing or rotor length longer booms increase drift potential.
- Application Height Application more than 10 ft above the canopy increases the potential for spray drift.

### **BOOM HEIGHT**

Setting the boom at the lowest labeled height (if specified) which provides uniform coverage reduces the exposure of droplets to evaporation and wind. For ground equipment, the boom should remain level with the crop and have minimal bounce.

### WIND

Drift potential increases at wind speeds of less than 3 mph (due to inversion potential) or more than 10 mph. However, many factors, including droplet size and equipment type determine drift potential at any given wind speed. AVOID GUSTY OR WINDLESS CONDITIONS.

Note: Local terrain can influence wind patterns. Every applicator should be familiar with local wind patterns and how they affect spray drift.

### **TEMPERATURE AND HUMIDITY**

When making applications in hot and dry conditions, set up equipment to produce larger droplets to reduce effects of evaporation.

### **TEMPERATURE INVERSIONS**

Drift potential is high during a temperature inversion. Temperature inversions restrict vertical air mixing, which causes small suspended droplets to remain close to the ground and move laterally in a concentrated cloud. Temperature inversions are characterized by increasing temperature with altitude and are common on nights with limited cloud cover and light to no wind. They begin to form as the sun sets and often continue into the morning. Their presence can be indicated by ground fog; however, if fog is not present, inversions can also be identified by the movement of smoke from a ground source or an aircraft smoke generator. Smoke that layers and moves laterally in a concentrated cloud (under low wind conditions) indicates an inversion, while smoke that moves upward and rapidly dissipates indicates good vertical air mixing.

### SHIELDED SPRAYERS

Shielding the boom or individual nozzles can reduce the effects of wind. However, it is the responsibility of the applicator to verify that the shields are preventing drift and not interfering with uniform deposition of the product.

### AIR ASSISTED (AIR BLAST) FIELD CROP SPRAYERS

Air assisted field crop sprayers carry droplets to the target via a downward directed air stream. Some may reduce the potential for drift, but if a sprayer is unsuitable for the application and/or set up improperly, high drift potential can result. It is the responsibility of the applicator to determine that a sprayer is suitable for the intended application, is configured properly, and that drift is not occurring. Note: Air assisted field sprayers can affect product performance by affecting spray coverage and canopy penetration. Consult the application equipment section of this label to determine if use of an air assisted sprayer is recommended.

### AIR ASSISTED (AIR BLAST) TREE AND VINE SPRAYERS

Air assisted tree and vine sprayers carry droplets into the canopy of trees and vines via a radially or laterally directed air stream. These sprayers are not suitable for applying herbicides.

In addition to the general drift management principles already described, the following specific practices will further reduce the potential for drift.:

- Adjust deflectors and aiming devices so that spray is only directed into the canopy.
- Block off upward pointed nozzles when there is no overhanging canopy.
- Use only enough air volume to penetrate the canopy and provide good coverage.
- Do not allow spray to go beyond the edge of the cultivated area. Spray the outside row only from outside the planting.

### **IMPORTANT PRECAUTIONS**

Do not graze treated fields or havest for forage on havest

# Do not apply this product through any type of irrigation is equipment.

Injury to or loss of desirable trees or vegetation may result from failure to observe the following:

- Do not apply DuPont<sup>TM</sup> SYNCHRONY® STS® DF or drain or flush equipment on or near desirable trees or other plants, on areas where their roots may extend, or in locations where the chemical may be washed or moved into contact with their roots.
- Do not use on lawns, walks, driveways, tennis courts or similar areas.
- Many crops are sensitive to SYNCHRONY® STS® DF. All direct or indirect contact (such as spray drift) with crops other than soybeans should be avoided.
- Thoroughly clean all application equipment immediately after use and prior to spraying crops other than soybeans.

### INFORMATION ON RESISTANT WEEDS

When herbicides with the same mode of action are used repeatedly over several years to control the same weed species in the same field, naturally-occurring resistant weed biotypes may survive a correctly applied herbicide treatment, propagate, and become dominant in that field. These resistant weed biotypes may not be adequately controlled. Cultural practices such as tillage, preventing weed escapes from going to seed, and using herbicides with different modes of action within and between crop seasons can aid in delaying the proliferation and possible dominance of herbicide resistant weed biotypes.

### INTEGRATED PEST MANAGEMENT

DuPont recommends the use of Integrated Pest Management (IPM) programs to control pests. This product may be used as part of an Integrated Pest Management (IPM) program which can include biological, cultural, and genetic practices aimed at preventing economic pest damage. Application of this product should be based on IPM principles and practices including field scouting or other detection methods, correct target pest identification, population monitoring, and treating when target pest populations reach locally determined action thresholds. Consult your state cooperative extension service, professional consultants or other qualified authorities to determine appropriate action treatment threshold levels for treating specific pest/crop or site systems in your area.

### STORAGE AND DISPOSAL

**Storage:** Store product in original container only. Do not contaminate water, other pesticides, fertilizer, food or feed in storage. Store in a cool, dry place.

**Product Disposal:** Do not contaminate water, food, or feed by disposal. Waste resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Disposal: For Plastic Containers: Triple rinse (or equivalent). Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or incineration, or, if allowed by State and local authorities, by burning. If burned, stay out of smoke. For Fiber Sacks: Completely empty fiber sack by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into manufacturing or application equipment. Then dispose of sack in a sanitary landfill or by incineration if allowed by State and local authorities. For Fiber Drums With Liners: Completely empty liner by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application equipment. Then dispose of liner in a sanitary landfill or by incineration if allowed by State and local authorities. If drum is contaminated and cannot be reused, dispose of in the same manner. For Bags Containing Water Soluble Packets: Do not reuse the outer box or the resealable plastic bag. When all water-soluble packets are used, the outer packaging should be clean and may be disposed of in a sanitary landfill or by incineration, or if allowed by State and local authorities, by open burning. If burned, stay out of smoke. If the resealable plastic bag contacts the formulated product in any way, the bag must be triplerinsed with clean water. Add the rinsate to the spray tank and dispose of the outer wrap as described above. For Metal Containers (non aerosol): Triple rinse (or equivalent) the container. Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or by other procedures approved by State and local authorities. For Paper and Plastic Bags: Completely empty bag into application equipment. Then dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by State and local authorities, by burning. If burned, stay out of smoke.

Notice to Buyer: Purchase of these materials does not confer any rights under patents of countries outside of the United States. Use of this quantity of purchased DuPont<sup>™</sup> SYNCHRONY STS® DF herbicide is permitted under claim 24 of U.S. Patent 5,084,082.

The DuPont Oval Logo, DuPont<sup>™</sup>, SYNCHRONY® STS®, ASSURE®, CANOPY®, CANOPY XL®, CLASSIC®, PINNACLE® and HARMONY® are trademarks or registered trademarks of E.I. duPont de Nemours and Company

AUTHORITY® is a registered trademark of FMC Corp.

"Blazer" and "Poast Plus" are registered trademarks of BASF Corporation "Cobra" is a registered trademark of Valent USA Corporation

"Flexstar", "Reflex", "Touchdown" are registered trademarks of Syngenta

Crop Protection Inc. "FirstRate" is a registered trademark of Dow AgroSciences

"Roundup" is a registered trademark of Monsanto Co.

D - 802 071201

13/13

### LIMITATION OF WARRANTY AND LIABILITY

NOTICE: Read This Limitation of Warranty and Liability Before Buying or Using This Product. If the Terms Are Not Acceptable, Return the Product at Once, Unopened, and the Purchase Price Will Be Refunded.

It is impossible to eliminate all risks associated with the use of this product. Such risks arise from weather conditions, soil factors, off target movement, unconventional farming techniques, presence of other materials, the manner of use or application, or other unknown factors, all of which are beyond the control of DuPont. These risks can cause: ineffectiveness of the product; crop injury, or; injury to non-target crops or plants.

DuPont does not agree to be an insurer of these risks. WHEN YOU BUY OR USE THIS PRODUCT, YOU AGREE TO ACCEPT THESE RISKS.

DuPont warrants that this product conforms to the chemical description on the label thereof and is reasonably fit for the purpose stated in the Directions for Use, subject to the inherent risks described above, when used in accordance with the Directions for Use under normal conditions.

DUPONT MAKES NO OTHER EXPRESS OR IMPLIED WARRANTY OF FITNESS OR OF MERCHANTABILITY OR ANY OTHER EXPRESS OR IMPLIED WARRANTY.

IN NO EVENT SHALL DUPONT OR SELLER BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL OR SPECIAL DAMAGES **RESULTING FROM THE USE OR HANDLING OF** THIS PRODUCT. BUYER'S OR USER'S **BARGAINED-FOR EXPECTATION IS CROP** PROTECTION. THE EXCLUSIVE REMEDY OF THE USER OR BUYER AND THE EXCLUSIVE LIABILITY OF DUPONT OR SELLER, FOR ANY AND ALL CLAIMS, LOSSES, INJURIES OR DAMAGES (INCLUDING CLAIMS BASED ON BREACH OF WARRANTY OR CONTRACT. NEGLIGENCE, TORT OR STRICT LIABILITY), WHETHER FROM FAILURE TO PERFORM OR INJURY TO CROPS OR OTHER PLANTS, AND RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, SHALL BE THE RETURN OF THE PURCHASE PRICE OF THE PRODUCT, OR AT THE ELECTION OF DUPONT OR SELLER, THE REPLACEMENT OF THE PRODUCT.

DuPont or its Ag Retailer must have prompt notice of any claim so that an immediate inspection of buyer's or user's growing crops can be made. Buyer and all users shall promptly notify DuPont or a DuPont Ag Retailer of any claims, whether based on contract, negligence, strict liability, other tort or otherwise or be barred from any remedy.

This Limitation of Warranty and Liability may not be amended by any oral or written agreement.

For product information call: 1-888-6-DUPONT Internet address: www.dupont.com/ag/us © 2000-2001 E. I. du Pont de Nemours and Company, Crop Protection, Wilmington, Delaware 19898. All rights reserved.