

# **SOYBEANS - WEEDS SUPPRESSED PREEMERGENCE**

## General Information

### PRODUCT INFORMATION

This product is used as a pre-plant burndown herbicide prior to planting soybeans in most states. This product provides burndown and residual control of labeled winter annuals, perennials, and spring annuals when applied after the fall-harvest, up to 7 to 14 days prior to soybean planting. Check with your state extension service or Department of Agriculture before use, to be certain that this product is registered in your state.

This product is a water-dispersible granule formulation uses at a rate of 1.1 to 3.3 ounces per acre for burndown and residual weed control prior to soybean planting in no-till or conservation tillage fields. Include an adjuvant as recommended in this label. Crop Oil Concentrate is recommended for best results. Refer to the SPRAY ADJUVANT section of this label for additional information.

This product is non-corrosive, non-flammable, non-volatile, and does not freeze. This product should be mixed in water and applied as a uniform broadcast spray.

This product may be applied by ground (broadcast or band) or by air. For ground application, apply a minimum of 15 gallons of water for best performance. Use a combination of nozzle and pressure settings that result in a medium to coarse spray droplet size. For aerial application, use nozzle types and arrangements that provide optimum spray distribution and maximum coverage at a minimum of 3 GPA.

For season-long control of all broadleaf and grass weeds following application of this product, a planned sequential program is required.

Consult label text for complete instructions. Always read and follow label directions for use.

### PRODUCT RESTRICTIONS

Do not apply to frozen ground.

Use only in the geographies identified in the ROTATIONAL CROP GUIDELINES section of this label.

Do not apply within 7 to 14 days of planting soybeans.

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

Do not graze, use for feed, hay or forage within 14 days after application.

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

- Do not apply this product or drain or flush application equipment on or near desirable trees or other plants, or 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.
- Do not contaminate any body of water.
- Do not mix/load, or use within 50 feet of all wells including abandoned wells, drainage wells, and sink holes.
- Do not allow this product to come in contact with fertilizers, insecticides, fungicides, and seeds during storage.
- Follow rotational crop interval directions listed elsewhere on this label.

#### PRODUCT PRECAUTIONS

This product should not be used on soils with a history of nutrient deficiency (such as iron chlorosis). Crop injury may occur.

Use caution when applying this product to land that has been treated with DuPont Glean, Alley, or Finesse herbicides in the states of Kansas or Nebraska; user must carefully observe the rotational crop intervals for those products.

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

- Prevent drift of spray to desirable plants.
- Avoid storage of pesticide near wells sites.
- Thoroughly clean application equipment immediately after use and prior to spraying other crops. Failure to remove even small amounts of this product from application equipment may result in injury to subsequently sprayed crops. (See the Sprayer Cleanup section of this label for instructions.)
- Calibrate sprayers only with clean water away from the well site.

#### Rainfast Interval

Do not apply this product if rain is expected within 2 hours or weed control may decrease.

#### PESTICIDE HANDLING

- Calibrate sprayers only with clean water away from the well site.

- Make scheduled checks of spray equipment.
- Ensure accurate measurement of pesticides by all operation employees.
- Mix only enough product for the job at hand.
- Avoid over-filling of spray tank.
- Do not discharge excess material on the soil at a single spot in the field/grove or mixing/loading station.
- Dilute and agitate excess solution and apply at labeled rates/uses.
- Avoid storage of pesticides near well sites.
- When triple rinsing the pesticide container, be sure to add the rinsate to the spray mix.

#### ENVIRONMENTAL CONDITIONS AND BIOLOGICAL ACTIVITY

This product is absorbed through the foliage and roots of plants where it rapidly inhibits growth of susceptible weeds. Leaves of susceptible plants appear chlorotic and the growing point subsequently dies. Weed species that are suppressed instead of controlled may remain green, but will be stunted and noncompetitive.

This product will provide the best results when applied to young, actively growing weeds. Degree of control depends on: rate used; weed spectrum; weed size (use adequate spray volume to get coverage); growing conditions at and following treatment; soil moisture; precipitation; and spray adjuvants. Treating weeds under stress or large weeds may result in only partial control.

Stress may be caused by:

- abnormal weather (hot or cold)
- mechanical injury from cultivation
- drought
- water-saturated soil
- disease
- insect injury
- prior herbicide injury

#### THE IMPORTANCE OF SOIL pH

Soil pH varies greatly, even within the same field. Variations in pH 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 to 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.

### RESISTANCE MANAGEMENT

When herbicides that affect the same biological site of action are used repeatedly over several years to control the same weed species in the same field, naturally-occurring resistant biotypes may survive a correctly applied herbicide treatment, propagate, and become dominant in that field. Adequate control of these resistant weed biotypes cannot be expected. If weed control is unsatisfactory, it may be necessary to retreat the problem area using a product affecting a different site of action.

To better manage herbicide resistance through delaying the proliferation and possible dominance of herbicide resistant weed biotypes, it may be necessary to change cultural practices within and between crop seasons such as using a combination of tillage, retreatment, tank-mix partners and/or sequential herbicide applications that have a different site of action. Weed escapes that are allowed to go to seed will promote the spread of resistant biotypes. It is advisable to keep accurate records of pesticides applied to individual fields to help obtain information on the spread and dispersal of resistant biotypes. Consult your agricultural dealer, consultant, applicator, and/or appropriate state agricultural extension service representative for specific alternative cultural practices or herbicide recommendations available in your area.

### INTEGRATED PEST MANAGEMENT

This product may be used as part of an Integrated Pest Management (IPM) program that can include biological, cultural, and genetic practices aimed at preventing

economic pest damage. IPM principles and practices include 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 systems in your area.

## APPLICATION EQUIPMENT

### SPRAYER PREPARATION

It is important that spray equipment is clean and free of existing pesticide deposits before using this product. Start with clean, well maintained application equipment. Clean all application equipment before applying this product. Follow the spray tank cleanout procedures specified on the label of the product previously sprayed. If no cleanout procedure is provided, follow the cleanout procedure below for all application equipment. Immediately following applications of this product, thoroughly clean all mixing and spray equipment to avoid subsequent crop injury.

STEP 1. Thoroughly rinse sprayer, tanks, booms, nozzles, and hoses with clean water. Loosen and physically remove visible deposits.

STEP 2. Partially fill the tank with clean water and add household ammonia (one gallon of 3% active for every 100 gallons of water). A similar sprayer cleaner may also be used by following the label directions for that purpose. Complete filling the tank with water and flush the cleaning solution through the boom and hoses. Let stand for 15 minutes with agitation or recirculation and then drain the tank after flushing the hoses, boom and nozzles.

STEP 3. Thoroughly rinse the sprayer, hoses, boom and nozzles with clean water.

STEP 4. Follow label directions of the product previously sprayed for rinsate disposal.

Notes: During an extended period where spraying or mixing equipment will be used to apply multiple loads of this product, at the end of each day of spraying partially fill the tank with fresh water, flush the boom and hoses and allow to sit overnight. A steam cleaning of aerial spray tanks is recommended to dislodge any visible pesticide deposits.

## EQUIPMENT / SPRAY VOLUMES

Many crops are highly sensitive to this product. All direct or indirect contact (such as spray drift) with crops other than fallow fields should be avoided (see also SPRAY DRIFT MANAGEMENT).

For all application systems, use 50-mesh or larger strainer screens.

#### GROUND APPLICATION

Broadcast Application:

- Use a minimum of 20 gallons of water per acre (GPA) to ensure uniform coverage of soil and the best performance.
- For best performance, select nozzles and pressure combinations that deliver medium spray droplets, as indicated, for example, by ASAE standard S572. Nozzles that deliver coarse spray droplets may be used to reduce drift, provided spray volume is increased to maintain coverage on small weeds. For optimal product performance and minimal spray drift, adjust the spray boom to the lowest possible spray height recommended in manufacturers' specifications.
- Overlaps or starting, stopping, slowing, and turning while spraying may result in crop injury.

#### AERIAL APPLICATION

Use nozzle types and arrangements that will provide optimum spray distribution and maximum coverage in a minimum of 3 GPA.

Do not apply during a temperature inversion, when winds are gusty, or when conditions favor poor coverage and/or off-target spray movement.

Do not apply this product by air in the state of New York.

#### PRODUCT MEASUREMENT

This product is measured using the CLOAK EX volumetric measuring cylinder. The degree of accuracy of this cylinder varies by  $\pm 7.5\%$ . For more precise measurement, use scales calibrated in ounces.

#### APPLICATION INFORMATION

##### GEOGRAPHIC USE REGIONS

The geographical use regions for this product are defined below:

##### Northern Region

The states of Iowa (west of State Route 63 and north of I-80), Minnesota, Nebraska (fields north of route 30 and west of Route 281), New York (fields north of Interstate 90), South Dakota and Wisconsin (fields north of Interstate 90 between Lacrosse

and Madison and fields north of Interstate 94 between Madison and Milwaukee). Do not use CLOAK EX in the Northern Region.

## Limitations, Restrictions, and Exceptions

### Weeds Controlled - Preemergence

Fall through early Spring applications of 1.5 to 3.3 ounces per acre CLOAK EX will provide acceptable preemergence control, or partial control (suppression), of the following weeds through normal planting dates.

Morningglory, Annual, Prickly Sida: With 1.1 ounces per acre applications of CLOAK EX, heavy weed pressure, delayed planting, or adverse environmental conditions may require additional burndown control measures at planting. For enhanced residual control, products such as 2 to 4 ounces per acre Sencor, or other metribuzin containing pesticides labeled for this use, may be tank mixed with 1.1 ounces per acre CLOAK EX.

In addition to the weeds noted in the lists above, this product has activity on a range of other weeds. Consult fact sheets, technical bulletins, and service policies for information on other weeds controlled.

### Method

[Broadcast/Foliar Air](#)

[N. A.](#)

[Broadcast/Foliar Air](#)

[N. A.](#)

[Broadcast/Foliar Air](#)

[N. A.](#)

### Rates

[field\\_rates 0](#)

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### Restricted Entry Interval

12 hours

### Timings

[Preplant](#)

[Preemergence \(Weed\)](#)

[Fall through early Spring.](#)