05-JUN-2007 Notification - Addition of label statement to primary panel.

**BASE** 

GROUP 4 5 HERBICIDE

**SHOTGUN®** 

FLOWABLE HERBICIDE

**COMMERCIAL** 

**CAUTION POISON** 



DANGER EYE IRRITANT CAUTION SKIN IRRITANT

KEEP OUT OF REACH OF CHILDREN
READ THE LABEL AND ATTACHED BOOKLET BEFORE USING DO NOT USE IN THE PROVINCE OF BRITISH COLUMBIA

REGISTRATION NO. 24608 PEST CONTROL PRODUCTS ACT

Notification Change

## **GUARANTEE:**

Atrazine 272 g/L Related triazines 8 g/L 2,4-D isomer specific (present as 2-ethylhexyl Ester) 120 g/L Contains 1,2-benzisothiazolin-3-one at 0.0096% as a preservative. IN CASE OF SPILLS, POISONING OR FIRE, TELEPHONE EMERGENCY RESPONSE NUMBER 1-800-561-8273 (24 HOURS A DAY)

UNITED AGRI PRODUCTS CANADA INC. 789 Donnybrook Drive Dorchester, Ontario N0L 1G5

**NET CONTENTS: 10 L** 

01/06

**FRONT** 

GROUP 4 5 HERBICIDE

## **SHOTGUN®**

FLOWABLE HERBICIDE

COMMERCIAL

**CAUTION POISON** 



DANGER EYE IRRITANT CAUTION SKIN IRRITANT

KEEP OUT OF REACH OF CHILDREN
READ THE LABEL AND ATTACHED BOOKLET BEFORE USING
DO NOT USE IN THE PROVINCE OF BRITISH COLUMBIA

**Notification Change** 

REGISTRATION NO. 24608 PEST CONTROL PRODUCTS ACT

## **GUARANTEE:**

Atrazine 272 g/L Related triazines 8 g/L 2,4-D isomer specific (present as 2-ethylhexyl Ester) 120 g/L Contains 1,2-benzisothiazolin-3-one at 0.0096% as a preservative. IN CASE OF SPILLS, POISONING OR FIRE, TELEPHONE EMERGENCY RESPONSE NUMBER 1-800-561-8273 (24 HOURS A DAY)

UNITED AGRI PRODUCTS CANADA INC. 789 Donnybrook Drive Dorchester, Ontario N0L 1G5

**NET CONTENTS: 10 L** 

01/06

#### **PRECAUTIONS**

#### KEEP OUT OF REACH OF CHILDREN

Harmful if swallowed. Avoid inhalation of vapours or spray mist. Corrosive, causes irreversible eye damage. Do not get in eyes. Avoid contact with skin or clothing. In case of contact, immediately flush eyes with plenty of water. Get medical attention if irritation persists.

If this pest control product is to be used on a commodity that may be exported to the U.S. and you require information on acceptable residue levels in the U.S., contact 1-866-375-4648 or www.cropro.org.

#### FIRST AID

IF SWALLOWED, call a physician or poison control centre immediately. Drink 1 to 2 glasses of water and induce vomiting. Do not induce vomiting or give anything by mouth to an unconscious person.

IF ON SKIN, promptly remove all contaminated clothing and wash skin thoroughly with soap and water. Get medical attention if irritation persists. Separately launder contaminated clothing before reuse.

IF IN EYES, immediately flush eyes with plenty of water for at least 15 minutes while holding eyelids open. Get medical attention if irritation persists.

IF INHALED, remove to fresh air and apply artificial respiration if indicated.

Take container, label or product name and Pest Control Product Registration Number with you when seeking medical attention.

TOXICOLOGICAL INFORMATION: Treat symptomatically.

#### DISPOSAL

- 1. Triple- or pressure-rinse the empty container. Add the rinsings to the spray mixture in the tank.
- 2. Follow provincial instructions for any required additional cleaning of the container prior to its disposal.
- 3. Make the empty container unsuitable for further use.
- 4. Dispose of the container in accordance with provincial requirements.
- 5. For information on disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

NOTICE TO USER: This control product is to be used only in accordance with the directions on this label. It is an offence under the Pest Control Products Act to use a control product under unsafe conditions.

NOTICE TO BUYER: Seller's guarantee shall be limited to the terms set out on the label and, subject thereto, the buyer assumes the risk to persons or property arising from the use or handling of this product and accepts the product on that condition.

DATAPAK

GROUP 4 5 HERBICIDE

**SHOTGUN®** 

FLOWABLE HERBICIDE

COMMERCIAL

**CAUTION POISON** 



DANGER EYE IRRITANT CAUTION SKIN IRRITANT

KEEP OUT OF REACH OF CHILDREN
READ THE LABEL AND ATTACHED BOOKLET BEFORE USING
DO NOT USE IN THE PROVINCE OF BRITISH COLUMBIA

Notification Change

REGISTRATION NO. 24608 PEST CONTROL PRODUCTS ACT

## **GUARANTEE:**

Atrazine 272 g/L Related triazines 8 g/L 2,4-D isomer specific (present as 2-ethylhexyl Ester) 120 g/L Contains 1,2-benzisothiazolin-3-one at 0.0096% as a preservative. IN CASE OF SPILLS, POISONING OR FIRE, TELEPHONE EMERGENCY RESPONSE NUMBER 1-800-561-8273 (24 HOURS A DAY)

UNITED AGRI PRODUCTS CANADA INC. 789 Donnybrook Drive Dorchester, Ontario NOL 1G5

**NET CONTENTS: 10 L** 

01/06

#### **GENERAL INFORMATION**

SHOTGUN FLOWABLE HERBICIDE will control certain annual broadleaf weeds in field corn. SHOTGUN is intended for use as an overlay application in fields previously treated with a grass herbicide. SHOTGUN herbicide may also be used in tank mixes with certain grass herbicides to control annual grassy weeds.

For resistance management, please note that SHOTGUN herbicide is both a Group 4 and a Group 5 herbicide. Any weed population may contain plants naturally resistant to Group 4 and/or Group 5 herbicides. The resistant biotypes may dominate the weed population if these herbicides are used repeatedly in the same field.

#### **PRECAUTIONS**

#### KEEP OUT OF REACH OF CHILDREN

Harmful if swallowed. Avoid inhalation of vapours or spray mist. Corrosive, causes irreversible eye damage. Do not get in eyes. Avoid contact with skin or clothing. In case of contact, immediately flush eyes with plenty of water. Get medical attention if irritation persists.

If this pest control product is to be used on a commodity that may be exported to the U.S. and you require information on acceptable residue levels in the U.S., contact 1-866-375-4648 or www.cropro.org.

#### PROTECTIVE CLOTHING AND EQUIPMENT:

Handling the concentrate (mixing and loading): Wear a coverall over a long-sleeved shirt, long pants, chemical-resistant gloves, socks, chemical-resistant boots and a face shield. Rinse gloves before removal.

Handling the Dilute Spray Solution (during application or repairing or cleaning equipment): Wear a coverall over a long-sleeved shirt, long pants, chemical-resistant gloves, socks and chemical-resistant boots. Rinse gloves before removal.

#### **OPERATOR USE PRECAUTIONS:**

- Wear freshly laundered clothing and clean protective clothing daily.
- · Rinse gloves before removal.
- Wash hands and face before eating, drinking, using tobacco or using the toilet.
- If herbicide penetrates clothing remove immediately; then wash thoroughly and put on clean clothing. Throw away
  clothing and other absorbent materials that have been drenched or heavily contaminated with this product's
  concentrate.
- After using this product, remove clothing and launder separately and promptly, and thoroughly wash hands and
  exposed skin with soap and water. Follow manufacturer's instructions for cleaning personal protective clothing and
  equipment. If no such instructions for washables are provided, use detergent and hot water. Keep and wash personal
  protective equipment separate from household laundry.
- · After work, remove all clothing and shower using soap and water.

GRAZING RESTRICTION: Do not graze the treated immature crop or cut for fodder; sufficient data are not available to support such use. In the case of corn, immature means before ear emergence.

This product should not be mixed / loaded within 30 meters of any wells, lakes, streams, ponds or sink holes in order to avoid the potential of well or surface water contamination. Do not use this product within 10 meters of the above mentioned water sources. Avoid contamination of food and feed, domestic or irrigation water supplies, lakes, streams and ponds. Do not apply this product through any type of irrigation system.

## TRANSFER SYSTEM:

FOR CONTAINERS LARGER THAN 20 L: Use a transfer system that avoids open pouring when transferring the liquid concentrate from such containers into the spray tank.

Bulk sites must be diked around and under the bulk tank with an impermeable non- earthen dike. The dike must be large enough to hold and contain 110 percent of the capacity of the largest tank.

#### **DIRECTIONS FOR USE**

#### MIXING PROCEDURE

This herbicide is a flowable liquid formulation for dilution with water. Do not add adjuvants, surfactants, oils, fertilizers or other pesticides to SHOTGUN herbicide spray mixtures. Shake well before using.

To prepare the spray mixture, fill clean spray tank 1/2 to 2/3 full with clean water. Start hydraulic or mechanical agitation and add the required amount of SHOTGUN herbicide. Finish filling tank with water. Continuous agitation is needed to maintain product in suspension. Whenever possible, prepare only as much spray as can be applied on the day of mixing. All screens and strainers should be no finer than 50 mesh. Clean sprayer thoroughly immediately after use by flushing system with water and a heavy duty detergent such as All Clear Liquid Tank Cleaner.

#### APPLICATION PROCEDURES

For all types of applications, calibrate spray equipment to deliver the required spray volume. Use sufficient spray volume within the ranges specified to obtain good coverage of weeds.

Better weed control will result if there is no rainfall or irrigation within at least 6 hours following application. It is preferable to have at least 24 hours following application without rainfall or irrigation.

This product should be applied when the temperature is about 10° - 28° C for optimum results. Cooler temperatures delay or reduce its effectiveness and higher temperatures increase the risk of vapour movement to susceptible crops. Do not apply when there is a risk of severe fall in night temperature.

Weed control and crop tolerance will be best when plants are not subjected to excessive moisture or drought stress before and after application.

Broadcast Treatment: Apply this product in 100 - 200 L of spray solution/ha using a boom type sprayer. Use appropriate flat fan nozzles (rated for pressure/volume used) and an operating pressure of 240 - 280 kPa at the boom.

Band Treatment: Determine band equivalent application rate and spray volume based on row width, spray band width and broadcast application rate per hectare using the following formulas:

Band width in cm Row width in cm	Х	Broadcast rate (L/ha)	=	Band application rate (L/ha)
Band width in cm Row width in cm	x	Broadcast volume (L/ha)	=	Band application volume (L/ha)

Even flat fan nozzles should be used for band applications.

## SPRAY DRIFT MANAGEMENT FOR GROUND APPLICATIONS: GENERAL INFORMATION

Use good pesticide practices and apply only when the potential for drift to areas of human habitation or areas of human activity such as houses, cottages, schools and parks is minimal. Take into consideration wind speed, wind direction, temperature, application equipment and sprayer settings used for application.

For the protection of non-target habitats, over-spray or drift to any body of water or other environmentally sensitive habitat must be avoided. The interaction of equipment and weather-related factors determines the potential for spray drift. The applicator is responsible for considering all these factors when making application decisions.

#### **GROUND APPLICATION**

Avoid over-spray or drift to sensitive aquatic habitats. An appropriate buffer zone is required between the downwind point of direct application and the closest edge of sensitive aquatic habitats including sloughs, coulees, ponds, prairie potholes, lakes, rivers, streams, reservoirs and wetlands that are situated on the periphery of the treated area. Do not apply during periods of dead calm or when winds are gusty or when winds are in excess of 8 km/h. Avoid spraying under conditions of high humidity or fog to prevent drift to adjacent non-target areas, sensitive areas and/or sensitive crops.

Do not apply SHOTGUN herbicide directly to, or otherwise permit it to come into contact with vegetables, flowers, grapes, fruit trees, ornamentals or other desirable plants and do not permit spray mist containing SHOTGUN herbicide to drift onto them since even minute quantities of the spray may cause severe injury during both growing and dormant periods. (Coarse sprays are less likely to drift).

Vapours from this product may cause injury to susceptible plants growing nearby. Do not apply SHOTGUN herbicide in the vicinity of non-target areas, sensitive areas and/or sensitive crops when the temperature on the day of application is expected to exceed 28/C due to the increased possibility that vapour drift may occur. Local conditions may affect the use of herbicides. Provincial agricultural authorities issue recommendations to fit local conditions. For ground spray booms, a buffer zone of 30 m is required for protection of aquatic habitats (as indicated above) when mixing or loading, and 10 m when spraying.

### SPRAYING:

Protect sprayer operators from drift or mist. Additional information on spray drift management for GROUND APPLICATION is provided in the section "SPRAY DRIFT MANAGEMENT FOR GROUND APPLICATIONS." When low volumes of spray are applied, complete coverage and thorough application are essential for the most effective results. Schedule applications in accordance with local conditions. Consult your local agricultural authorities for specific use information.

#### WEEDS CONTROLLED IN FIELD CORN

SHOTGUN herbicide provides season-long control of broadleaf weeds in field corn grown in conventional, reduced and no-tillage systems.

SHOTĞUN herbicide can be used to control existing and germinating broadleaf weeds in the seedling stage. Annual broadleaf weeds are controlled most effectively if they are in the 1 to 6 leaf stage.

Broadleaf Weeds Controlled	Coarse Textured Soils (Light and Sandy) 2.4 L/ha	Medium and Fine Textured Soils (Loams and Clays) 3.6 L/ha Rate
Stage of Crop	Spil	ce to 4 leaf
Stage of Annual Broadleaves	1 to 6 leaf	
Common Lamb's-quarters*	X	X
Redroot Pigweed	Х	X
Common Ragweed*	X	X
Lady's-thumb	X	X
Eastern Black Nightshade	X	X
Smartweed	X	X
Velvetleaf	X	X
Wild Mustard*	X	X
Wild Buckwheat		Х

<sup>\*</sup>Including triazine tolerant biotypes.

EARLY POST-EMERGENCE APPLICATION: Apply early post-emergence from spike to 4-leaf stage of crop, but before 15 cm high (leaf outstretched) in height is exceeded. Rate: Apply 2.4 L/ha on coarse textured soils (sand, loamy sand and sandy loam) and 3.6 L/ha on medium and fine textured soils. Weeds and crop should be actively growing and not under stress. Do not add adjuvants, surfactants, oils, fertilizers or other pesticides to the spray mixture.

NOTE: The 2,4-D component of this product may cause the treated corn to become brittle and subject to breaking by wind and/or cultivation equipment, especially in the two weeks following application. Avoid cultivation for two weeks following

spraying. In case of very dry conditions, delay spraying until one week following rain. Users are advised to confirm variety tolerance to 2,4-D with seed supplier.

#### ANNUAL GRASS AND BROADLEAF WEED CONTROL

Use a herbicide like DUAL, DUAL II, DUAL MAGNUM, DUAL II MAGNUM, FRONTIER (900 g/L) and PROWL 400 EC pre-plant or pre-emerge to the corn for annual grass control. Then use SHOTGUN herbicide as a post-emerge treatment as above. Follow all directions on the DUAL, DUAL II, DUAL MAGNUM, DUAL II MAGNUM, FRONTIER (900 g/L) or PROWL 400 EC label.

DO NOT tank mix SHOTGUN herbicide with DUAL, DUAL II, DUAL MAGNUM, DUAL II MAGNUM or FRONTIER (900 g/L).

#### SHOTGUN HERBICIDE TANK MIXES

Water volume for the tank mixes should be at 200-240 L/ha.

Observe all restrictions on the labels for both this product and its tank mix partners.

Do not apply tank mixes with PROWL in consecutive years.

When a tank mixture is used, consult the label of the tank-mix partners and observe the largest (most restrictive) buffer zone of the products involved in the tank mixture.

## SHOTGUN HERBICIDE TANK MIX WITH PROWL 400 EC and ELIM EP 25 DF TO CONTROL ANNUAL GRASS AND BROADLEAF WEEDS.

Apply SHOTGUN herbicide with the following herbicides - PROWL 400 EC and ELIM EP 25 DF to provide grass control. Follow the directions for use and precautions including the use of a recommended non-ionic surfactant on the PROWL 400 EC and ELIM EP 25 DF labels.

The tank mixture will control the broadleaf weeds controlled by SHOTGUN herbicide alone plus additional weeds listed below. If the correct leaf stage of annual grasses does not coincide with the correct leaf stage of broadleaf weeds, separate applications of SHOTGUN herbicide and grass herbicide will be required.

Grass Weeds Controlled	SHOTGUN HERBICIDE@3.6 L/ha +PROWL 400 EC@2.5 L/ha +ELIM EP 25DF@50 g/ha
Stage of Crop	Spike to 3 leaf
Stage of Annual Grasses	1 to 4 leaf
Barnyard Grass	Х
Green Foxtail	Х
Yellow Foxtail	Х

## SHOTGUN HERBICIDE TANK MIXES WITH ACCENT 75DF, ELIM EP 25 DF, ULTIM 37.4DF or ULTIM 75DF TO CONTROL ANNUAL GRASS AND BROADLEAF WEEDS.

Apply SHOTGUN herbicide with the following herbicides - ACCENT 75DF, ELIM EP 25 DF, ULTIM 37.4DF OR ULTIM 75DF to provide grass control. Follow the directions for use and precautions including the use of recommended non-ionic surfactant on the tank mix partner labels.

The tank mixtures will control the broadleaf weeds controlled by SHOTGUN herbicide alone plus additional weeds listed below. If the correct leaf stage of annual grasses does not coincide with the correct leaf stage of broadleaf weeds, separate applications of SHOTGUN herbicide and grass herbicide will be required.

Grass Weeds Controlled	SHOTGUN herbicide@2.4 L/ha +ACCENT 75DF@33.4 g/ha	SHOTGUN herbicide@3.6 L/ha +ACCENT 75DF@33.4 g/ha
Stage of Crop	1 to 4	1 leaf
Stage of Annual Grasses	1 to 6 leaf	
Barnyard Grass		+
Fall Panicum	X	X
Green Foxtail	+	+
Yellow Foxtail		+

<sup>+</sup> suppression only

Grass Weeds Controlled	SHOTGUN herbicide@2.4 L/ha +ELIM EP 25DF@60 g/ha	SHOTGUN herbicide@3.6 L/ha +ELIM EP 25DF@60 g/ha
Stage of Crop	Spike to 3 leaf	
Stage of Annual Grasses	1 to 4 leaf	
Barnyard Grass	X	X
Fall Panicum	X	X
Green Foxtail		x
Yellow Foxtail	+	+

<sup>+</sup> suppression only

Grass Weeds Controlled	SHOTGUN herbicide@2.4 L/ha +ULTIM 37.4DF@66.7 g/ha or ULTIM 75DF@33.7 g/ha	SHOTGUN herbicide@3.6 L/ha +ULTIM 37.4DF@66.7 g/ha or ULTIM 75DF@33.7 g/ha
Stage of Crop	1 to	4 leaf
Stage of Annual Grasses	1 to 6 leaf	
Barnyard Grass		X
Fall Panicum		X
Green Foxtail	X	X
Yellow Foxtail		+

<sup>+</sup> suppression only

Weed suppression is a visual reduction in weed competition (reduced population or vigour) as compared to an untreated area

Degree of suppression will vary with size of weed and environmental conditions prior to and following treatment.

NOTE: Weeds which emerge after application of the tank mix will not be controlled.

Application should be made when the majority of weeds have emerged.

Annual grasses and pigweed are most sensitive when young and actively growing.

Early crop establishment and a good crop stand (minimum of 50,000 plants per hectare) are important in providing competition for weeds and effective post-emergence control of annual grasses.

Apply atrazine at a maximum of 1.5 kg a.i./ha per year either as a pre- or post-emergent application before corn reaches 30 cm in height. Treatments can be made once or twice per year, but the maximum amount of atrazine used in a year cannot exceed 1.5 kg a.i./ha. Atrazine may be applied alone or as a registered tank mix partner. Refer to the tank mix partners for further instructions. Do not harvest within 45 days of application on sweet corn and 60 days for field corn.

#### WARNING

Do not use on sweet corn or corn grown for seed.

#### DO NOT APPLY BY AIR.

Injury may occur if land treated with SHOTGUN herbicide is planted to any crop other than corn in the same season. One year after application most rotational crops may be planted following SHOTGUN herbicide application. Tobacco and sugar beets are sensitive and should not be planted on land treated the previous year. When extended periods of dry weather occur during the year of treatment, there can be some injury to succeeding crops such as white beans, onions, peas, tomatoes and turnips. Injury is most likely to occur when the seedling crop is subjected to periods of stress, eg: during periods of abnormally hot, dry weather. When the directions outlined on the SHOTGUN herbicide label are followed, injury to these crops is unlikely to occur under normal weather conditions.

Under conditions of heavy rainfall sufficient to cause erosion, soil containing SHOTGUN herbicide may wash to lower areas of land and injury to existing or subsequent crops may result. Trees, ornamentals, or crops are likely to be damaged if their roots extend into the treated zone.

#### FIRST AID

IF SWALLOWED, call a physician or poison control centre immediately. Drink 1 to 2 glasses of water and induce vomiting. Do not induce vomiting or give anything by mouth to an unconscious person.

IF ON SKIN, promptly remove all contaminated clothing and wash skin thoroughly with soap and water. Get medical attention if irritation persists. Separately launder contaminated clothing before reuse.

IF IN EYES, immediately flush eyes with plenty of water for at least 15 minutes while holding eyelids open. Get medical attention if irritation persists.

IF INHALED, remove to fresh air and apply artificial respiration if indicated.

Take container, label or product name and Pest Control Product Registration Number with you when seeking medical attention.

TOXICOLOGICAL INFORMATION: Treat symptomatically.

#### **STORAGE**

Keep away from water, food or feed. Do not store below -10°C. If frozen, warm to 5°C or more and reconstitute by shaking or rolling container.

#### REFILLABLE CONTAINER

For disposal, this container may be returned to the point of purchase (distributor/dealer). It must be refilled by the distributor/dealer with the same product. Do not reuse container for any other purpose.

For information on disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

### DISPOSAL

- 1. Triple- or pressure-rinse the empty container. Add the rinsings to the spray mixture in the tank.
- 2. Follow provincial instructions for any required additional cleaning of the container prior to its disposal.
- 3. Make the empty container unsuitable for further use.
- 4. Dispose of the container in accordance with provincial requirements.
- 5. For information on disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

NOTICE TO USER: This control product is to be used only in accordance with the directions on this label. It is an offence under the Pest Control Products Act to use a control product under unsafe conditions.

NOTICE TO BUYER: Seller's guarantee shall be limited to the terms set out on the label and, subject thereto, the buyer assumes the risk to persons or property arising from the use or handling of this product and accepts the product on that condition.

® ACCENT is a registered trademark of duPont de Nemours and Company.
ELIM EP and ULTIM are registered trademarks of Dupont Canada Inc.
DUAL and MAGNUM are registered trademarks of Syngenta Crop Protection Canada Inc.
FRONTIER and PROWL are registered trademarks of BASF Corporation.

GROUP 4 5 HERBICIDE

## SUPPLEMENTAL LABEL

For the Tank Mix with PROWL to control Barnyard Grass, Fall Panicum, Green Foxtail and Yellow Foxtail in Corn.

# **SHOTGUN®**

FLOWABLE HERBICIDE

## COMMERCIAL



CAUTION

**POISON** 

DANGER EYE IRRITANT CAUTION SKIN IRRITANT

KEEP OUT OF REACH OF CHILDREN
READ THE LABEL AND ATTACHED BOOKLET BEFORE USING
DO NOT USE IN THE PROVINCE OF BRITISH COLUMBIA

REGISTRATION NO. 24608 PEST CONTROL PRODUCTS ACT GUARANTEE:

Notification Change

ATRAZINE, 272 g/L RELATED TRIAZINES, 8 g/L

2,4-D Isomer specific (present as 2-ethylhexyl Ester, 120 g/L Contains 1,2-benzisothiazolin-3-one at 0.0096% as a preservative.

IN CASE OF SPILLS, POISONING OR FIRE, TELEPHONE EMERGENCY RESPONSE NUMBER 1-800-561-8273 (24 HOURS A DAY)

**NET CONTENTS: 10 L** 

UNITED AGRI PRODUCTS CANADA INC. 789 DONNYBROOK DRIVE DORCHESTER, ONTARIO NOL 1G5

## GENERAL INFORMATION

SHOTGUN Flowable herbicide will control certain annual broadleaf weeds in field corn. SHOTGUN Flowable herbicide is intended for use as an overlay application in fields previously treated with a grass herbicide or as a tank mix with grass herbicides as directed. Do not use on sweet corn or corn grown for seed. DO NOT APPLY BY AIR.

## **PRECAUTIONS**

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

Harmful if swallowed. Avoid inhalation of vapours or spray mist. Corrosive, causes irreversible eye damage. Do not get in eyes. Avoid contact with skin or clothing. In case of contact, immediately flush eyes with plenty of water. Get medical attention if irritation persists.

## PROTECTIVE CLOTHING AND EQUIPMENT:

Handling the concentrate (mixing and loading): Wear a coverall over a long-sleeved shirt, long pants, chemical-resistant gloves, socks, chemical-resistant boots and a face shield. Rinse gloves before removal.

Handling the Dilute Spray Solution (during application or repairing or cleaning equipment): Wear a coverall over a long-sleeved shirt, long pants, chemical-resistant gloves, socks and chemical-resistant boots. Rinse gloves before removal.

## **OPERATOR USE PRECAUTIONS:**

- Wear freshly laundered clothing and clean protective clothing daily.
- Rinse gloves before removal.
- Wash hands and face before eating, drinking, using tobacco or using the toilet.
- If herbicide penetrates clothing remove immediately; then wash thoroughly and put on clean clothing. Throw away clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate.
- After using this product, remove clothing and launder separately and promptly, and thoroughly wash hands and exposed skin with soap and water. Follow manufacturer's instructions for cleaning personal protective clothing and equipment. If no such instructions for washables are provided, use detergent and hot water. Keep and wash personal protective equipment separate from household laundry.
- After work, remove all clothing and shower using soap and water.

**GRAZING RESTRICTION:** Do not graze the treated immature crop or cut for fodder; sufficient data are not available to support such use. In the case of corn, immature means before ear emergence.

This product should not be mixed / loaded within 30 meters of any wells, lakes, streams, ponds or sink holes in order to avoid the potential of well or surface water contamination. Do not use this product within 10 meters of the above mentioned water sources. Avoid contamination of food and feed, domestic or irrigation water supplies, lakes, streams and ponds. Do not apply this product through any type of irrigation system.

## TRANSFER SYSTEM:

<u>FOR CONTAINERS LARGER THAN 20 L</u>: Use a transfer system that avoids open pouring when transferring the liquid concentrate from such containers into the spray tank. Bulk sites must be diked around and under the bulk tank with an impermeable non-earthen dike. The dike must be large enough to hold and contain 110 percent of the capacity of the largest tank.

## **DIRECTIONS FOR USE**

## **MIXING PROCEDURE**

This herbicide is a flowable liquid formulation for dilution with water. Do not add adjuvants, surfactants, oils, fertilizers or other pesticides to SHOTGUN Flowable herbicide spray mixtures unless specified in this booklet. Shake well before using.

To prepare the spray mixture, fill clean spray tank 1/2 to 2/3 full with clean water. Start hydraulic or mechanical agitation and add the required amount of SHOTGUN Flowable herbicide. Finish filling tank with water. Continuous agitation is needed to maintain product in suspension. Whenever possible, prepare only as much spray as can be applied on the day of mixing. All screens and strainers should be no finer than 50 mesh. Clean sprayer thoroughly immediately after use by flushing system with water and a heavy duty detergent such as All Clear Liquid Tank Cleaner.

## **APPLICATION PROCEDURES**

For all types of applications, calibrate spray equipment to deliver the required spray volume. Use sufficient spray volume within the ranges specified to obtain good coverage of weeds.

Better weed control will result if there is no rainfall or irrigation within at least 6 hours following application. It is preferable to have at least 24 hours following application without rainfall or irrigation.

This product should be applied when the temperature is about 10° - 28° C for optimum results. Cooler temperatures delay or reduce its effectiveness and higher temperatures increase the risk of vapour movement to susceptible crops. Do not apply when there is a risk of severe fall in night temperature.

Weed control and crop tolerance will be best when plants are not subjected to excessive moisture or drought stress before and after application. Broadcast Treatment: Apply this product in 100 - 200 L of spray solution/ha using a boom type sprayer. Use appropriate flat fan nozzles (rated for pressure/volume used) and an operating pressure of 240 - 280 kPa at the boom.

Band Treatment: Determine band equivalent application rate and spray volume based on row width, spray band width and broadcast application rate per hectare using the following formulas:

Band width in cm x Broadcast rate (L/ha) = Band application rate (L/ha)

Row width in cm

Band width in cm x Broadcast volume (L/ha) = Band application volume (L/ha)

Row width in cm

Even flat fan nozzles should be used for band applications.

## WEEDS CONTROLLED IN FIELD CORN

**WEEDS CONTROLLED IN FIELD CORN**: SHOTGUN Flowable herbicide provides season -long control of broadleaf weeds in field corn grown in conventional, reduced and no-tillage systems. SHOTGUN Flowable herbicide can be used to control existing and germinating broadleaf weeds in the seedling stage. Annual broadleaf weeds are controlled most effectively if they are in the 1 to 6 leaf stage.

Broadleaf Weeds Controlled	Coarse Textured Soils (Light and Sandy) 2.4 L/ha	Medium & Fine Textured Soils (Loams and Clays) 3.6 L/ha
Stage of Crop	Spike to 4 leaf	
Stage of Annual Broadleaves	1 to 6 leaf	
Common Lamb's-quarters*	X	X
Redroot Pigweed	X	X
Common Ragweed*	X	X
Lady's-thumb	X	X
Eastern Black Nightshade	X	X
Smartweed	X	X
Velvetleaf	X	X
Wild Mustard*	X	X
Wild Buckwheat		X

<sup>\*</sup>Including triazine tolerant biotypes

**EARLY POST-EMERGENCE APPLICATION**: Apply early post-emergence from spike to 4-leaf stage of crop, but before 15 cm high (leaf outstretched) in height is exceeded. Rate: Apply 2.4 L/ha on coarse textured soils (sand, loamy sand and sandy loam) and 3.6 L/ha on medium and fine textured soils. Weeds and crop should be actively growing and not under stress. Do not add adjuvants, surfactants, oils, fertilizers or other pesticides to the spray mixture unless specified in this booklet.

NOTE: The 2,4-D component of this product may cause the treated corn to become brittle and subject to breaking by wind and/or cultivation equipment, especially in the two weeks following application. Avoid cultivation for two weeks following spraying. In case of very dry conditions, delay spraying until one week following rain. Users are advised to confirm variety tolerance to 2,4-D with seed supplier.

## SHOTGUN FLOWABLE HERBICIDE TANK MIXES

Water volume for the tank mixes should be at 200-240 L/ha.

Observe all restrictions on the labels for both this product and its tank mix partners.

Do not apply tank mixes with PROWL 400 EC in consecutive years.

When a tank mixture is used, consult the label of the tank-mix partners and observe the largest (most restrictive) buffer zone of the products involved in the tank mixture.

## SHOTGUN FLOWABLE HERBICIDE TANK MIX WITH PROWL 400 EC TO CONTROL ANNUAL GRASS AND BROADLEAF WEEDS.

## GROUND APPLICATION ONLY

Apply SHOTGUN Flowable herbicide with PROWL 400 EC to provide annual grass control. Follow the directions for use and precautions on the PROWL 400 EC label.

The tank mixture will control the broadleaf weeds controlled by SHOTGUN Flowable herbicide alone plus additional weeds listed below. If the correct leaf stage of annual grasses does not coincide with the correct leaf stage of broadleaf weeds, separate applications of SHOTGUN Flowable herbicide and grass herbicide will be required.

Grass Weeds Controlled	SHOTGUN @ 3.6 L/ha + PROWL 400 EC @ 4.2 L/ha on medium and fine textured soils ONLY with more than 3% organic matter
Stage of Crop	Spike to 3 leaf
Stage of Annual Grasses	1 to 2 leaf
Barnyard Grass	X
Green Foxtail	X
Yellow Foxtail	X
Fall Panicum	X

<u>NOTE</u>: Weeds which emerge after application of the tank mix will not be controlled. Application should be made when the majority of weeds have emerged. Annual grasses and pigweed are most sensitive when young and actively growing. Early crop establishment and a good crop stand (minimum of 50,000 plants per hectare) are important in providing competition for weeds and effective post-emergence control of annual grasses.

## WARNING

Injury may occur if land treated with SHOTGUN Flowable herbicide is planted to any crop other than corn in the same season. One year after application most rotational crops may be planted following SHOTGUN Flowable herbicide application. Tobacco and sugar beets are sensitive and should not be planted on land treated the previous year. When extended periods of dry weather occur during the year of treatment, there can be some injury to succeeding crops such as white beans, onions, peas, tomatoes and turnips. Injury is most likely to occur when the seedling crop is subjected to periods of stress, eg: during periods of abnormally hot, dry weather. When the directions outlined on the SHOTGUN Flowable herbicide label are followed, injury to these crops is unlikely to occur under normal weather conditions.

Under conditions of heavy rainfall sufficient to cause erosion, soil containing SHOTGUN Flowable herbicide may wash to lower areas of land and injury to existing or subsequent

crops may result. Trees, ornamentals, or crops are likely to be damaged if their roots extend into the treated zone.

Do not apply SHOTGUN Flowable herbicide directly to, or otherwise permit it to come into contact with vegetables, flowers, grapes, fruit trees, ornamentals or other desirable plants and do not permit spray mist containing SHOTGUN Flowable herbicide to drift onto them since even minute quantities of the spray may cause severe injury during both growing and dormant periods. (Coarse sprays are less likely to drift). Accordingly, applications should be carried out only when there is no hazard from drift. Do not spray near sensitive crops when winds are gusty or in excess of 8 km/h and moving towards sensitive crops. Leave an adequate buffer zone between areas to be treated and sensitive plants. Avoid spraying under conditions of high humidity or fog to prevent drift to adjacent sensitive crops. Vapours from this product may cause injury to susceptible plants growing nearby. Do not apply SHOTGUN Flowable herbicide in the vicinity of sensitive crops when the temperature on the day of application is expected to exceed 28°C due to the increased possibility that vapour drift may occur. Local conditions may affect the use of herbicides. Provincial agricultural authorities issue recommendations to fit local conditions.

## RESISTANCE MANAGEMENT

For resistance management, Shotgun Flowable Herbicide contains a Group 4 and Group 5 herbicide. Any weed population may contain or develop plants naturally resistant to Shotgun Flowable Herbicide and other Group 4 and Group 5 herbicides. The resistant biotypes may dominate the weed population if these herbicides are used repeatedly in the same field. Other resistance mechanisms that are not linked to site of action, but specific for individual chemicals, such as enhanced metabolism, may also exist. Appropriate resistance-management strategies should be followed.

To delay herbicide resistance:

- Where possible, rotate the use of Shotgun Flowable Herbicide or other Group 4 and Group 5 herbicides with different herbicide groups that control the same weeds in a field.
- Use tank mixtures with herbicides from a different group when such use is permitted.
- Herbicide use should be based on an IPM program that includes scouting, historical information related to herbicide use and crop rotation, and considers tillage (or other mechanical), cultural, biological and other chemical control practices.
- Monitor treated weed populations for resistance development.
- Prevent movement of resistant weed seeds to other fields by cleaning harvesting and tillage equipment and planting clean seed.
- Contact your local extension specialist or certified crop advisors for any additional pesticide resistance-management and/or integrated weed-management recommendations for specific crops and weed biotypes.
- For further information or to report suspected resistance, contact United Agri Products Canada Inc. at 1-800-265-4624 or at <a href="https://www.uap.ca">www.uap.ca</a>.

## **FIRST AID**

**IF SWALLOWED,** call a physician or poison control centre immediately. Drink 1 to 2 glasses of water and induce vomiting. Do not induce vomiting or give anything by mouth to an unconscious person.

**IF ON SKIN,** promptly remove all contaminated clothing and wash skin thoroughly with soap and water. Get medical attention if irritation persists. Separately launder contaminated clothing before reuse.

**IF IN EYES,** immediately flush eyes with plenty of water for at least 15 minutes while holding eyelids open. Get medical attention if irritation persists.

**IF INHALED**, remove to fresh air and apply artificial respiration if indicated.

Take container, label or product name and Pest Control Product Registration Number with you when seeking medical attention.

## **STORAGE**

Keep away from water, food or feed. Do not store below -10°C. If frozen, warm to 5°C or more and reconstitute by shaking or rolling container.

## RETURNABLE-REFILLABLE CONTAINERS

After use, return the container to the point of purchase or designated locations. This container must only be refilled with SHOTGUN Flowable herbicide. Do not reuse container for any other purpose. Prior to refilling inspect thoroughly for damage such as cracks, punctures, abrasions, and damaged or worn out threads on closure devices. Check for leaks after refilling and before transportation. Do not refill or transport damaged or leaking containers. If the container is not being refilled, return to point of purchase.

## **DISPOSAL**

- 1. Triple- or pressure-rinse the empty container. Add the rinsings to the spray mixture in the tank.
- 2. Follow provincial instructions for any required additional cleaning of the container prior to its disposal.
- 3. Make the empty container unsuitable for further use.
- 4. Dispose of the container in accordance with provincial requirements.
- 5. For information on the disposal of unused, unwanted product, contact the manufacturer or the provincial regulatory agency. Contact the manufacturer and the provincial regulatory agency in case of a spill, and for clean-up of spills.

**NOTICE TO USER:** This control product is to be used only in accordance with the directions on this label. It is an offence under the *Pest Control Products Act* to use a control product under unsafe conditions.

**NOTICE TO BUYER:** Seller's guarantee shall be limited to the terms set out on the label and, subject thereto, the buyer assumes the risk to persons or property arising from the use or handling of this product and accepts the product on that condition.

® ACCENT is a registered trademark of duPont de Nemours and Company.

ELIM EP and ULTIM are registered trademarks of Dupont Canada Inc. DUAL and MAGNUM are registered trademarks of Syngenta Crop Protection Canada Inc.

FRONTIER and PROWL are registered trademarks of BASF Corporation.

\*\*\*\*\*\*\*\*\*

This label transcript service is offered by the Pest Management Regulatory Agency to provide efficient searching for label information. This service and this information do not replace the official hard-copy label. The PMRA does not provide any guarantee or assurance that the information obtained through this service is accurate, current or correct, and is therefore not liable for any loss resulting, directly or indirectly, from reliance upon this service.