



Dimension™

Turf Herbicide

GROUP	3	HERBICIDE
-------	---	-----------

For sale for use in Ontario and Quebec only.

COMMERCIAL

READ THE LABEL AND BOOKLET BEFORE USING
KEEP OUT OF REACH OF CHILDREN

GUARANTEE: Dithiopyr 124 grams per litre
Liquid

REGISTRATION NO. 23003 PEST CONTROL PRODUCTS ACT

WARNING - EYE AND SKIN IRRITANT

NET CONTENTS: 4 L - bulk

Dow AgroSciences Canada Inc.
Suite 2100, 450 - 1 Street S.W.
Calgary, Alberta
T2P 5H1
1-800-667-3852

™Trademark of Dow AgroSciences LLC

PRECAUTIONS

KEEP OUT OF REACH OF CHILDREN

CAUSES SUBSTANTIAL BUT TEMPORARY EYE INJURY

CAUSES SEVERE, BUT REVERSIBLE, SKIN IRRITATION

HARMFUL IF SWALLOWED

MAY CAUSE RESPIRATORY TRACT IRRITATION

MAY CAUSE ALLERGIC SKIN REACTION

Do not get in eyes, on skin, or on clothing. Avoid breathing vapors or spray mist. Protective clothing should include long-sleeved shirt, chemical resistant shoes and gloves, and eye goggles or face shield. In addition, a plastic or rubber apron should be worn during mixing/loading. Wash thoroughly with soap and water after handling and before smoking or eating.

For all uses, except golf courses, **DO NOT** enter or allow worker entry into treated areas during the restricted-entry interval (REI) of 12 hours. For golf courses, **DO NOT** enter or allow worker entry until after the spray has dried.

PHYSICAL OR CHEMICAL HAZARDS

Do not use or store near heat or flame. Use only with adequate ventilation. In case of FIRE, use water spray, foam, dry chemical or CO₂. Wear a self-contained breathing apparatus and full protective clothing.

FIRST AID

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

If swallowed: Call a poison control centre or doctor immediately for treatment advice. Do not induce vomiting unless told to do so by a poison control centre or doctor. Do not give any liquid to the person. Do not give anything by mouth to an unconscious person.

If on skin or clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control centre or doctor for treatment advice.

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

If in eyes: Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control centre or doctor for treatment advice.

TOXICOLOGICAL INFORMATION

No specific antidote. Employ supportive care. Treatment should be based on judgment of the physician in response to reactions of the patient. Contains petroleum distillates.

AGRICULTURAL CHEMICAL

Do not ship or store with food, feeds, drugs or clothing.

ENVIRONMENTAL HAZARDS

Do not contaminate any body of water by direct application, cleaning of equipment or disposal of wastes. Overspray, drift or run-off to aquatic environments or important wildlife habitats such as shelter belts, wetlands, woodlots, vegetated ditchbanks or the edges of treated areas should be avoided. Leave a 15m buffer zone between the last spray swath and the edge of significant wildlife habitats. This product contains a petroleum distillate which is moderately to highly toxic to aquatic organisms. Avoid contamination of aquatic systems during application. Do not contaminate these systems through direct application, disposal of waste or cleaning equipment.

TOXIC to aquatic organisms and non-target terrestrial plants. Observe buffer zones specified under **DIRECTIONS FOR USE.**

STORAGE

Store this product above 5°C to avoid crystallization. If crystals form or the product freezes, move to an area above 5°C and shake well or re-circulate until the crystals have redissolved. Store the product in its original container, in a secure, well ventilated storage area away from heat or flame.

DISPOSAL

Recyclable Containers:

Do not reuse this container for any purpose. This is a recyclable container, and is to be disposed of at a container collection site. Contact your local distributor/dealer or municipality for the location of the nearest collection site. Before taking the container to the collection site:

1. Triple- or pressure-rinse the empty container. Add the rinsings to the spray mixture in the tank.
2. Make the empty, rinsed container unsuitable for further use.

If there is no container collection site in your area, dispose of the container in accordance with provincial requirements.

Returnable Containers:

Do not reuse this container for any purpose. For disposal, this empty container may be returned to the point of purchase (distributor/dealer).

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.

GENERAL INFORMATION

This product is a selective product for preemergence and early postemergence control of crabgrass in turf. This product will not harm nearby established ornamentals when used according to label directions.

GENERAL USE PRECAUTIONS

For best results, cultural practices that disturb the soil, such as core-, spike-, or hydro-aerification, verticutting or topdressing, should be done before applications of Dimension Turf Herbicide. This product should not be applied until turfgrasses have fully recovered from stresses related to these and other mechanical operations. This product does not require irrigation or watering-in after an application. Immediate irrigation or watering-in within two hours after an application may increase the potential for injury to golf putting greens.

Use of this product on turfgrass that is not well established, or is weakened by lack of moisture, chemical injury, insect damage, disease, or temperature extremes that cause stress will increase the potential for turf injury. Allow turfgrass weakened by these stresses to recover before application of this product.

- Do not apply to desirable flowers, vegetables, shrubs or trees.
- Do not use clippings from treated areas for mulching around vegetables and fruit trees.
- Do not allow domestic animals to feed on the treated turf.
- Do not apply this product to putting greens during the first year of establishment.
- **DO NOT apply by air.**

Reseeding: Reseeding or overseeding of treated areas within 3 months after application of this product may inhibit the establishment of desirable turfgrass. When reseeding or overseeding, proper cultural practices such as soil cultivation, irrigation and fertilization should be followed. For best results, use mechanical or power seeding equipment (slit seeders) designed to give good seed and soil contact.

Newly seeded or sodded areas: This product may be used on seeded or sodded turfgrass that is well established. Allow the turf to develop a good root system and uniform stand before application of this product.

Golf course putting greens: DO NOT apply this product to colonial bentgrass. DO NOT apply this product to greens during their first year of establishment. Use of this product on non-amended (high clay content) or poorly drained putting greens may result in undesirable turfgrass injury. Greens must have a well-aerated rooting zone to promote development of adequate rooting systems and allow for proper drainage. DO NOT tank mix this product with other products for application to putting greens. Immediate irrigation or watering-in of this product within two hours of application to greens will increase the potential for turf injury.

DIRECTIONS FOR USE

READ ALL DIRECTIONS CAREFULLY BEFORE APPLYING. FAILURE TO FOLLOW LABEL INSTRUCTIONS MAY RESULT IN ERRATIC WEED CONTROL OR CROP DAMAGE.

Only one application per year is permitted.

Field sprayer application

DO NOT apply during periods of dead calm. Avoid application of this product when winds are gusty. **DO NOT** apply with spray droplets smaller than the American Society of Agricultural Engineers (ASAE) medium classification. Boom height must be 60 cm or less above the crop or ground.

DO NOT apply by air.

Application Directions

Apply in a sufficient amount of water or fluid fertilizer solution to provide uniform spray distribution. DO NOT apply this product through high carrier volume liquid application equipment that uses cluster spray nozzles due to variability in application use rates and spray patterns. Calibrate application equipment prior to usage. Avoid streaking, skips, or overlaps during application. The use of marker dyes or foams will assist accuracy of applications. Do not apply this product through any type of irrigation system.

Tolerant Turfgrass Species

When applied as directed under the conditions described, the following established turfgrasses are tolerant to this product:

Bentgrass, creeping¹
Agrostis palustris

Fescue, tall
Festuca arundinacea

Bluegrass, Kentucky
Poa pratensis

Ryegrass, perennial
Lolium perenne

Fescue, fine²
Festuca rubra

¹Use of this product on certain older varieties of creeping bentgrass, such as "Cohansey" and "Seaside" will result in undesirable turfgrass injury. DO NOT apply this product to Colonial bentgrass varieties.

²Use of this product on certain varieties of Chewings fine fescue may result in undesirable turf injury. The following fine fescue varieties have been found sensitive to this product: Atlanta, Banner, Beauty, Bilgart, CF-2, Enjoy, HF-93. Highlight, Ivalo, Jamestown, Koket, Majenta, Mary, Pennlawn, Tamara, Tatjana, Waldorf, and Waldina. Not all varieties of fine fescue have been tested.

Weeds Controlled

When applied as directed under the conditions described this product will control the following weeds:

Crabgrass, smooth

Digitaria ischaemum

Crabgrass, large

Digitaria sanguinalis

For "**preemergence crabgrass control**" in established turfgrass, apply this product at 3.5 litres per hectare (35 mL per 100 square metres) before the crabgrass emerges.

For "**post emergence crabgrass control**" in established turfgrass, apply this product at 3.5 to 4.5 litres per hectare (35 to 45 mL per 100 square metres) when the crabgrass is in the 1 to 3 leaf stage (prior to tillering). Use the higher rates as the crabgrass gets larger and/or when the crabgrass infestation is high.

Applications made when crabgrass is under stress or in the tillering growth stage may result in reduced control.

Postemergent applications of this product will provide residual control of crabgrass germinating after the application is made as well as controlling the established crabgrass plants.

Mixing Instructions

Dimension Turf Herbicide Alone

If fluid fertilizer is used as the carrier, always predetermine compatibility (see "Compatibility Test" section on this label). Fill the spray tank to about three-fourths of the desired volume with the desired carrier. Add the recommended amount of this product. Complete the filling process while maintaining agitation. Remove the hose from the mixing tank immediately after filling to avoid siphoning back into the carrier source.

Tank Mixtures

READ THE LABEL OF THE TANK MIX PRODUCT USED AND FOLLOW THE PRECAUTIONARY STATEMENTS, DIRECTIONS FOR USE, AND OTHER RESTRICTIONS. DO NOT TANK MIX (other than marker dyes or foams) for applications to golf putting greens. Do not apply this product with any other additive, pesticide or fertilizer except as specifically recommended on this label.

For control of many broadleaved weeds, as well as crabgrass, this product may be tank-mixed with Killex™ or other broadleaf herbicide formulations. See labels of these products for directions on rates, weeds controlled, etc. This product may also be tank mixed with fluid turf fertilizers.

A compatibility test (see 'COMPATIBILITY TEST' section) is recommended before tank mixing of this product with other pesticides or with fluid fertilizers.

Compatibility Test

Pesticide Formulation	Pesticide Rate	Amount of Pesticide to add per 500 mL of the Carrier Solution (assuming a spray volume of 250 L/ha)
Solid	1.0 kg/ha	2 g
Liquid	3.0 L/ha	6 mL
	6.0 L/ha	12 mL

Before mixing this product with fluid fertilizers and/or other pesticides, it is advisable to test compatibility by mixing all the components in a small jar in proportionate quantities. This compatibility test is designed for 250 litres of spray solution per hectare. The table above gives general guidelines for use rate ratios of pesticides to be tank mixed with this product. Determine the amount of pesticide to tank mix by referring to their label(s). Then, calculate the amount to add to the jar based on use rate ratios in table. For example, for a use rate of 1.0 kg/ha, add 2 g of product to the jar; for a use rate of 3.0 L/ha, add 6 mL to jar. This product should be added based on use rates for liquid pesticides (for use of 4.5 L/ha, add 9 mL to the jar). For changes in spray volume or herbicide rate, make appropriate changes in the ingredients for the test. Shake well after mixing.

If pesticide(s) does not form flakes, sludge, gels, oily films or layers, then the tested components are compatible. Incompatibility in any of the above described forms will usually occur within 5 minutes after mixing.

If components are incompatible, the use of a compatibility agent is recommended. Repeat the above test with a suitable compatibility agent (add 1.25 mL per 500 mL of spray solution which is equivalent to 2.5 L per 1000L of spray solution)

Always predetermine the compatibility of the tank-mix components with the water or fluid fertilizer carrier by mixing small proportional quantities in advance (See the "Compatibility Test" section on this label).

Mix the products with the appropriate carrier as follows:

1. Place a 20 to 30 mesh screen or wetting basket over the filling port.
2. Fill the sprayer one-half full with the appropriate carrier. Start agitation and continue through the mixing and spraying operations.
3. Add a compatibility agent if needed. Read and follow all the information found on the product label for the selected compatibility agent. Check for adequate agitation.
4. If a wettable powder or dry flowable pesticide formulation is used, make a slurry with water and add it SLOWLY to the tank.
5. If a flowable pesticide formulation is used, premix with one part water and add SLOWLY to the tank.
6. Add this product or emulsifiable concentrate pesticide formulations to the tank.
7. Add water soluble liquid pesticide formulations followed by surfactants or drift control additives while continuing the filling process.
8. Maintain good agitation at all times until the contents of the tank are sprayed. If the spray mixture is allowed to settle, thorough agitation is required to resuspend the mixture before spraying is resumed.

BUFFER ZONES TO PROTECT SENSITIVE HABITATS

The buffer zones specified in the table below are required between the point of direct application and the closest downwind edge of sensitive terrestrial habitats (such as grasslands, forested areas, shelter belts, woodlots, hedgerows, riparian areas and shrublands), sensitive freshwater habitats (such as lakes, rivers, sloughs, ponds, prairie potholes, creeks, marshes, streams, reservoirs and wetlands) and estuarine/marine habitats.

Method of Application	Buffer Zones (metres) Required for the Protection of:		
	Terrestrial Habitat	Aquatic Habitats of Water Depths:	
		Less than 1 m	Greater than 1m
Field sprayer*	4	1	1

* For field sprayer application, buffer zones can be reduced with the use of drift reducing spray shields. When using a spray boom fitted with a full shield (shroud, curtain) that extends to the crop canopy, the

labelled buffer zone can be reduced by 70%. When using a spray boom where individual nozzles are fitted with cone-shaped shields that are no more than 30 cm above the crop canopy, the labelled buffer zone can be reduced by 30%.

RESISTANCE MANAGEMENT RECOMMENDATIONS

For resistance management, Dimension Turf Herbicide is a Group 3 herbicide. Any weed population may contain or develop plants naturally resistant to Dimension Turf Herbicide and other Group 3 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 Dimension Turf Herbicide or other Group 3 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 Dow AgroSciences Canada Inc. at 1-800-667-3852 or at www.dowagro.ca.

NOTICE TO USER: This pest control product is to be used only in accordance with the directions on the label. It is an offence under the *Pest Control Products Act* to use this product in a way that is inconsistent with the directions on the label. The user assumes the risk to persons or property that arises from any such use of this product.

TMKillex is a trademark of Monsanto Company Inc.

022610

Label Code: CN-23003-002-E

Replaces: CN-23003-001-E

Specimen Label notes:

Label changes due to reevaluation of dithiopyr