

Read the label before opening the container.

For full particulars, see enclosed leaflet.

KEEP OUT OF REACH OF CHILDREN AND ANIMALS

OUTPACE FLOWABLE

South Africa Reg. No: L4760 Act No. 36 of 1947

HRAC HERBICIDE GROUP CODE: C1

OutPace FloWable suspension concentrate is a soil acting herbicide with prolonged action for the prevention of weed growth on industrial sites, other non-crop areas and apple and pear orchards.

ACTIVE INGREDIENT:

Terbutylazine (triazine).....	250g/ℓ
Simazine (triazine).....	250g/ℓ
Total active ingredients.....	500g/ℓ

Product Information: 072 678 8226
In case of poisoning: 082 446 8946

HAZARD STATEMENTS

- Harmful if swallowed
- Suspected of causing cancer
- May cause damage to organs through prolonged or repeated exposure.
- Very toxic to aquatic life with long lasting effects.

PRECAUTIONARY STATEMENTS

- Wash hands and face thoroughly after handling.
- Avoid release to the environment.



enviro
bio-chem

Registration holder: **Enviro Industries (Pty) Ltd**

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Expiry Date:

Batch No:

Date of Manufacture:

UN No. 3082

WARNINGS:

- Harmful if swallowed
- Suspected of causing cancer
- May cause damage to organs through prolonged or repeated exposure.
- Very toxic to aquatic life with long lasting effects.
- Store in a cool place away from food, feedstuffs, seed, fertilizers and other agricultural products.
- Keep out of reach of children, uninformed persons and animals.

Although this remedy has been extensively tested under a large variety of conditions, the registration holder does not warrant that it will be efficacious under all conditions because the action and effect thereof may be affected by factors such as abnormal soil, climatic and storage conditions, quality of dilution water, compatibility with other substances not indicated on the label and the occurrence of resistance of the weeds against the remedy concerned as well as by the method, time and accuracy of application. The registration holder furthermore does not accept responsibility for damage to crops, vegetation, the environment or harm to man or animal or for lack of performance of the remedy concerned due to failure of the user to follow the label instructions or to the occurrence of conditions which could not have been foreseen in terms of the registration. Consult the supplier in the event of any uncertainty.

PRECAUTIONS:

- Do not handle until all safety precautions have been read and understood.
- Do not breathe mist, vapours and spray.
- Wash hands and face thoroughly after handling.
- Do not eat, drink, or smoke when using this product.
- Avoid release to the environment.
- Wear impervious rubber gloves and boots, protective clothing and chemical safety goggles.
- If exposed or concerned: Get medical attention.
- Collect spillage
- Read the entire label before using the product and ensure that the requirements for its correct use are observed.
- Ensure that persons assigned to apply the products are adequately trained.
- Do not apply within the root zone of desirable vegetation, or where it could be washed to such areas, or into streams or dams.
- Do not apply to areas designated for future cultivation.
- Prevent the contamination of food, feeds, drinking water and eating utensils.
- Keep in original container, tightly closed and in a safe place.
- Triple rinse empty container in the following manner: Invert the empty container over the spray or mixing tank and allow to drain for at least 30 seconds after the flow has slowed down to a drip. Thereafter, rinse the empty container three times with a volume of water equal to a minimum of 10% of that of the container. Add the rinsings to the content of the spray tank. Empty containers should be taken for local recycling or waste disposal. Do not re-use empty containers.
- Do not mix and load within at least 15 meter from boreholes, streams, rivers and dams.
- Do not apply within at least 15 meter from boreholes, streams, rivers and dams.
- Do not apply within at least 60 meter of dams.

RELEVANT SUBSTANCES:

Simazine 22.9 %

Terbuthylazine 23 %

Formalin < 0.1 %

FIRST AID TREATMENT:

INHALATION: Remove person to fresh air and keep comfortable for breathing.

INGESTION: Immediately call a POISON CENTER or doctor/physician.

SKIN CONTACT: Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.

EYE CONTACT: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do – continue rinsing.

RESISTANCE WARNING:

For resistance management, **OUTPACE FLOWABLE** is a group code C1 herbicide. Any weed population may contain individuals naturally resistant to **OUTPACE FLOWABLE** and other group code C1 herbicides. The resistant individuals can eventually dominate the weed population if these herbicides are used repeatedly. These resistant weeds may not be controlled by **OUTPACE FLOWABLE** or any other group code C1 herbicide.

To delay herbicide resistance:

- Avoid the exclusive repeated use of herbicides from the same herbicide group code.
- Alternate or tank mix with products from different herbicide group codes.
- Integrate other control methods (chemical, cultural, biological) into weed control programmes.

For specific information on resistance management contact the registration holder of this product.

DIRECTIONS FOR USE: Use only as directed.

OUTPACE FLOWABLE is a long lasting spray applied herbicide which acts in the soil to control the germination of weed seeds on such sites as security fences, electrical sub-station, rail tracks, yards, roadsides, kerb edging, apple orchards and pear orchards. It should be applied prior to the emergence of the weed to the clean soil or surface, where weeds have been removed by prior chemical or mechanical means. Should weeds have already emerged, use an appropriate herbicide before, after or in combination with **OUTPACE FLOWABLE** (Refer to combinations below). **OUTPACE FLOWABLE** does not control emerged weeds. Rainfall is necessary to leach **OUTPACE FLOWABLE** into the soil before its action can take place.

Tank Mix Combinations With Other Herbicides:

In order to control existing weeds a combination of a systemic or suitable knockdown herbicide may be used in combination with **OUTPACE FLOWABLE**. The label recommendations for these products should be followed, and compatibility of the mixture should be established in each case.

OUTPACE FLOWABLE may be used in combination with **TUMBLEWEED** (Reg. No. L 4781), **ENVIRO GLYPHOSATE 360** (Reg. No. L 4767) or **GRAMOXONE** in order to control established weeds, but should be mixed as prescribed. Consult the labels of these respective products to determine the dosage rate. Do not use less than 4.5ℓ **TUMBLEWEED** or 6ℓ **ENVIRO GLYPHOSATE 360**, per hectare in combination with **OUTPACE FLOWABLE**.

OUTPACE FLOWABLE may be added to a spray mix containing **TUMBLEWEED** or **ENVIRO GLYPHOSATE 360** to provide residual weed control. In industrial situations **OUTPACE FLOWABLE** may also be used in combination with arsenal to improve residuality or to control weeds which may not be controlled by these herbicides used alone. Always consult the respective labels and follow the directions for use.

MIXING INSTRUCTIONS:

- Shake well before use
- Replace cap after pouring.
- Half-fill the spray tank with water then pour the required quantity of **OUTPACE FLOWABLE** through a 50 mesh sieve into the tank.
- Top up the tank with water to the final volume required.
- Ensure thorough agitation during filling and spraying operations.
- When used in tank mixture with either **TUMBLEWEED**, **ENVIRO GLYPHOSATE 360** or **gramoxone**, first add the **OUTPACE FLOWABLE** and mix well and finally add either the **TUMBLEWEED**, **ENVIRO GLYPHOSATE 360** or **gramoxone** whilst the spray tank is filled to its final volume with water.
- After each day's spraying flush spray equipment thoroughly with clean water.

SPRAY WATER MODIFIERS:

The addition of ammonium sulphate at 1 to 2kg per 100ℓ spray water, or bladbuff 5 may improve the action when hard waters are used to apply combinations of **OUTPACE FLOWABLE** and **TUMBLEWEED** or **ENVIRO GLYPHOSATE 360**. The addition of herbicidal spray oils is not recommended with combination mixtures.

A compatibility test, with the proposed combination should be made, using the spray water intended for use, to determine if flocculation (rapid settling-out of chemicals) occurs, in which case special precautions should be taken to ensure adequate agitation in the spray tank.

APPLICATION:

OUTPACE FLOWABLE may be applied by means of knapsack sprayers, tractor operated boom sprayers, or by hand-held spray guns. Calibrate the equipment to determine the volume applied and ensure that the spray is evenly distributed over the target area. Use a minimum of 200ℓ/ha, at a nozzle pressure of 200 - 300kPa. The mixture should be gently agitated at all times prior to and during spraying to prevent deposition on the tank bottom. A knapsack sprayer fitted with a paddle agitator, such as the Matabi, is recommended. Always flush out the spray lines immediately after usage. Dispose of washings in a safe place.

HERBICIDE INJECTION INTO THE SPRAY LINES:

In order to avoid the necessity of bulk tank mixes, a calibrated chemical proportional doser, such as the Dosatron, may be used to introduce **OUTPACE FLOWABLE** and additional herbicides into a spray line at the appropriate concentration. Consult a representative from Enviro Weed Control Systems for information in this respect.

DOSAGE:

The greater the quantity of **OUTPACE FLOWABLE** applied, the longer the period of weed control obtained. The soil type and the rainfall effect the length of control, the higher dosage being required on heavy soils in high rainfall areas. Use follow-up treatments on coastal soils in the high rainfall areas of KwaZulu-Natal to maintain the correct herbicide concentration in the upper soil layers. When used alone **OUTPACE FLOWABLE** should be applied prior to weed emergence at the beginning of the rainy season. When **OUTPACE FLOWABLE** is used in combination with knock-down herbicides, it may be applied at any time during the rainy season, provided sufficient rain is expected to leach the product into the upper soil layers.

RECOMMENDATIONS:

(i) Industrial Sites And Other Non-Crop Areas:

LOCATION	DOSAGE
Summer rainfall areas: 5 - 20% clay (light textured soils) 21 - 30% clay (medium textured soils) 31 - 40% clay (heavy textured soils)	17 - 20ℓ/ha 20 - 25ℓ/ha 25 - 30ℓ/ha
Winter rainfall area: Light soils in KwaZulu-Natal Coastal Region	15 - 20ℓ/ha 20ℓ/ha followed by 12ℓ/ha as required
Ash base soils incorporating coal dust areas:	30ℓ/ha followed by 12ℓ/ha as required

Use the higher rate where seasonal rainfall exceeds 800 mm. Should weed germination occur, reapply at half the initial rate combining this with a knock-down product at the rates recommended.

NOTE:

Use along kerb sides and verges in urban areas:

Do not exceed a rate of 16ℓ/ha when the product is applied in streets lined with trees and hedges and do not treat a strip wider than 500mm under trees along the verge line. Do not treat the entire area under the dripline of trees to prevent injury from possible root uptake.

OUTPACE FLOWABLE will not control weeds which grow from rhizomes or rootstocks, or which may be underground at the time of treatment. Should these emerge, spot treat using a suitable herbicide. Contact the supplier in the event of any uncertainty as to the use of the product.

(ii) Control Of Annual Weeds In Apple And Pear Orchards (on trees older than 3 years):

For use in apple and pear orchards **OUTPACE FLOWABLE** may be mixed with **TUMBLEWEED**, **ENVIRO GLYPHOSATE 360** or **GRAMOXONE** to control existing weeds where required. Consult the respective labels.

Directed Application:

OUTPACE FLOWABLE does not have any post-emergence activity and must, therefore, be applied to soil, free of emerged weeds at the time of application or must be used in combination with a suitable post-emergence herbicide when weeds are present. Best results will be obtained when **OUTPACE FLOWABLE** is applied subsequent to the application of a post-emergence herbicide such as **TUMBLEWEED**. Alternatively **OUTPACE FLOWABLE** may be tank-mixed with a suitable post-emergence herbicide such as **TUMBLEWEED**. A dense stand of weeds may, however, result in insufficient penetration of **OUTPACE FLOWABLE** to the soil surface. The best result with **OUTPACE FLOWABLE** is obtained when application is made as late as possible in the season (end October, beginning November) but at the first signs of weed germination. Rain or irrigation is required shortly after application of **OUTPACE FLOWABLE** to activate the product. Application made during late spring or early summer must therefore be followed by irrigation if rain does not occur within 10 days of application.

APPLICATION RATES (Only trees older than 3 years)		
CROP	SOIL TYPE	OUTPACE FLOWABLE /ha
Apples	< 15% clay	4ℓ/ha
	> 15% clay	6ℓ/ha
Pears	< 15% clay	NOT RECOMMENDED
	> 15% clay	6ℓ/ha

Remarks:

- (i) Apply in 200 - 300ℓ water/ha.
- (ii) When **OUTPACE FLOWABLE** is used in combination with **TUMBLEWEED**, **ENVIRO GLYPHOSATE 360** or **GRAMOXONE** follow all the instructions on the **TUMBLEWEED/ GRAMOXONE** label.
- (iii) The residual activity on grasses may not always be satisfactory, particularly where the product was applied early (July to September) and / or on light soils under conditions of heavy rainfall or irrigation.
- (iv) Do not apply on soils with a pH in water of 7 or higher or poorly drained soils.
- (v) Do not apply to trees suffering from micro-nutrient deficiencies.
- (vi) **OUTPACE FLOWABLE** has a relatively long residual activity. Therefore do not plant any sensitive crops such as vegetables, legumes or winter cereals within 18 months after treatment.
- (vii) Do not apply to interplants before they are older than 3 years.

ACKNOWLEDGEMENTS OF TRADEMARKS:

- Arsenal: American Cyanamid Company Wayne, New Jersey, USA
- Bladbuff 5: Plaaskem (EDMS) BPK. Posbus 87005, HOUGHTON, 2041, RSA
- Gramoxone: Zeneca Agrochemicals SA (EDMS) BPK Privaatsak X8, GALLO MANOR, 2052, RSA
- Matabi: Goizper S. Coop, Ltda, Posbus 211-20570, Bergara, Spain.
- Dosatron: Dosatron International, Ruepascal, B>P> 6-33370, Tresses, France.

LIST OF WEEDS CONTROLLED BY PRE-EMERGENCE TREATMENT

GRASSES

BOTANICAL NAME

COMMON NAME

<i>Avena fatua</i>	Common Wild Oats
<i>Bromus unioloides</i>	Rescue Grass
<i>Chloris virgata</i>	Feathertop Chloris
<i>Digitaria ciliaris</i>	Crab Finger-grass
<i>Eleusine indica</i>	Goose Grass
<i>Eragrotis teff</i>	Teffgrass
<i>Panicum schinzii</i>	Sweet Buffalo Grass
<i>Setaria pallide-fusca</i>	Red Bristle Grass
<i>Urochloa panicoides</i>	Herringbone Grass

BROADLEAF WEEDS

BOTANICAL NAME

COMMON NAME

<i>Acanthospermum australe</i>	<i>Creeping starbur</i>
<i>Acanthospermum hispidum</i>	<i>Upright Starbur</i>
<i>Amaranthus hybridus</i>	<i>Common Pigweed</i>
<i>Amaranthus spinosus</i>	<i>Thorny Pigweed</i>
<i>Arctotheca calendula</i>	<i>Cape Marigold</i>
<i>Bidens bipinnata</i>	<i>Spanish Blackjack</i>
<i>Bidens pilosa</i>	<i>Common Blackjack</i>
<i>Chenopodium album</i>	<i>White Goosefoot</i>
<i>Commelina benghalensis</i>	<i>Benghal wandering Jew</i>
<i>Conyza Canadensis</i>	<i>Fleabane</i>
<i>Cosmos bipinnatus</i>	<i>Cosmos</i>
<i>Datura ferox</i>	<i>Large Thome Apple</i>
<i>Datura stammonium</i>	<i>Thorn Apple</i>
<i>Erodium moschatum</i>	<i>Musk Heron's Bill</i>
<i>Flaveria bidentis</i>	<i>Smelter's Bush</i>
<i>Galinsoga parviflora</i>	<i>Gallant soldier</i>
<i>Portulaca oleracea</i>	<i>Purslane</i>
<i>Schkuhria pinnata</i>	<i>Dwarf marigold</i>

BROADLEAF WEEDS**BOTANICAL NAME****COMMON NAME***Sonchus oleracea**Sow Thistle**Tagetes minuta**Tall Khaki Weed*