



## ULTRAMOC XTRA EC

BEFORE USING THIS PRODUCT, READ THE LABEL CAREFULLY

**ULTRAMOC XTRA EC** **HERBICIDE**

Reg. No. L8878, Act/Wet No. 36 of/van 1947  
Namibian Reg. No. N-AR 1692

1: 03/05/2012

An emulsifiable concentrate safened herbicide for the pre-emergence control of most annual grasses and certain broadleaf weeds in the crops as listed.

'n Emulgeerbare konsentraat beveiligde onkruiddoder vir die vooropkoms beheer van eenjarige grasse en sekere breetblaaronkruide in gewasse soos aangedui.

HRAC HERBICIDE GROUP CODE	K3	HRAC ONKRUIDDODERGROEPKODE
<b>ACTIVE INGREDIENT / AKTIEWE BESTANDDEEL</b>		
Metolachlor (chloroacetanilide) 915 g/l Metolachloor (chloorasetanilied)		

Registration Holder / Registrasiehouer  
Meridian Agrochemical Company (Pty) Ltd. / (Edms.) Bpk.  
Reg. No. 2000/010819/07  
P.O. Box / Posbus 436, Modderfontein, 1645, South Africa / Suid-Afrika

20ℓ

UN Number: 3082

**HARMFUL / SKADELIK**

DIRECTIONS FOR USE ENCLOSED  
Batch Number  
Date of manufacture  
REFER TO DETAILS AS PRINTED  
ON CONTAINER / BAG

VERWYS NA BESONDERRHEDEN  
SOOS OP HOUER / SAK GEDRUK

GEBRUIKSAANWYSINGS INGESLUIT  
Lotonummer  
Datum van Vervaardiging

**Meridian agritech**

## **WARNINGS**

- Handle with care.
- Poisonous if swallowed.
- May cause eye and skin irritation as well as skin sensitisation.
- Can be toxic to fish.
- Store under lock and key in a cool place.
- **FLAMMABLE** – Do not store or open container near open flame.
- Store away from food, feed, fertilizer and other agricultural products.
- Keep out of reach of children, uninformed persons and animals.
- In case of poisoning call a doctor and show him this label.
- **Re-entry** – Do not enter treated area within 1 day after application unless wearing protective clothing.
- **Aerial application:** Notify all inhabitants in the immediate vicinity of the area to be sprayed and issue the necessary warnings. Do not apply over water bodies and ensure that spray drift will not contaminate areas under treatment.

**Although this remedy has been extensively tested under a large variety of conditions, the registration holder does not warrant that it will be effective under all conditions. The activity 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 weed against the remedy, 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 by 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 inhale fumes or spray mist.
- Avoid skin and eye contact by wearing protective clothing when mixing the product.
- In case of accidental eye contact, flush with plenty of water and get medical attention if necessary.
- Wash with soap and water after use and accidental skin contact as well as contaminated clothing.
- Do not eat, drink or smoke while mixing or applying the product or before washing hands and face.
- Avoid drift of spray onto other crops, grazing, rivers, dams and areas not under treatment.
- Clean applicator after use. Dispose of rinsate where it will not contaminate crops, grazing, rivers, dams and boreholes.
- Prevent contamination of food, feeds, drinking water and eating utensils.
- Invert the empty container over the spray or mixing tank and allow to drain for at least 30 seconds after the flow has slowed 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 rinsate to the contents of the spray tank.
- Destroy the empty container and do not use for any other purpose.

## **SYMPTOMS OF HUMAN POISONING**

Irritation effects on skin and mucous membranes are the common reactions. May cause eye irritation. May cause skin irritation and allergic reaction. May cause skin sensitisation. If large quantities are ingested, nausea, vomiting abdominal distress and diarrhoea may occur.

## **FIRST AID TREATMENT**

**Skin contact:** Remove contaminated clothing as well as shoes and leather goods. Wash body with non-abrasive soap and lots of water. Persons providing first aid must wear gloves to avoid self-contamination. **Seek medical advice if necessary.**

**Eye contact:** Flush eyes immediately with large amounts of clean water for approximately 15 minutes. Occasionally lift the upper and lower lids. If eye irritation persists, get medical attention.

**Inhalation:** Remove patient to a well ventilated area and loosen clothing around the neck. Perform artificial respiration and administer oxygen if necessary. Keep patient warm and calm. **Seek medical advice immediately.**

**Ingestion: Do not induce vomiting.** Get medical attention immediately. Administration of gastric lavage or oxygen should be performed by qualified medical personnel.

## **NOTE TO PHYSICIAN**

No specific antidote. Treat symptomatically and supportively. Keep patient under observation. Perform gastric lavage and catharsis if the victim is not unconscious. If less than 10 mg per kg body weight was ingested, administer 30 – 60 g activated charcoal in 150 – 300 ml water.

## **USE RESTRICTIONS**

- Do not use **ULTRAMOC XTRA EC** on experimental or newly released cultivars/varieties without first consulting your supplier or the seed company concerned.
- Do not use **ULTRAMOC XTRA EC** on poorly drained soils or soils with a compaction layer, as under these conditions waterlogging can occur, and the herbicide may cause crop injury.
- Do not apply **ULTRAMOC XTRA EC** to any crop or situation not mentioned in this instruction leaflet.
- Only apply **ULTRAMOC XTRA EC** using an accurate and safe application technique.
- Heavy rain on very sandy soils low in organic matter as well as flood irrigation can reduce weed control performance.
- Optimum weed control is obtained on a fine even seedbed, free of clods, trash and weeds. **ULTRAMOC XTRA EC** will also give weed control in stubble mulch or minimum tillage situations.
- If **ULTRAMOC XTRA EC** is used in a tank mix with other recommended herbicides, consideration should be given to the restrictions of those respective products.
- Use the lower rates on soils in the Northwest Province, North- and Western Free State.
- Use lower rates on lighter soils and where the weed population pressure is low.
- Make sure that sufficient fertilizer is applied and correctly placed at the time of planting to promote the growth of the seedlings whilst avoiding fertilizer burn.

NOTE: **ULTRAMOC XTRA EC** is registered for use on green beans on McCain cultivars Fortè, Masai and Dark Seeded Provider (valid for Loskop irrigation scheme, Letsitele, Orhigstad and certain Highveld areas).

## **DIRECTIONS FOR USE**

**Use only as directed.**

## **MIXING INSTRUCTIONS**

Half-fill the spray tank with suitable water, then add the required amount of **ULTRAMOC XTRA EC** to the water in the tank while agitating. Fill the spray tank to the desired volume. Should tank mixtures with other herbicides be made, follow the respective manufacturers' label recommendations. **Tank mixtures must be sprayed out immediately and not allowed to stand in the spray tank overnight.** Spraying equipment must be thoroughly flushed out at the end of the spraying operation.

## **COMPATIBILITY**

The compatibility of **ULTRAMOC XTRA EC** with other products depends on the formulations of the respective products as well as the quality of the spray water to be used. As formulations change from time to time it is recommended that a physical compatibility test be done prior to the tank mixture being made. **ULTRAMOC XTRA EC** is compatible with most pyrethroid insecticides, Combozine 600 SC, **Cyclone Elite**, **Premiere** and atrazine formulations.

## **APPLICATION METHODS**

Ensure that the equipment is correctly calibrated and is checked regularly during application to ensure even and accurate application. Knapsack sprayers or tractor mounted boom sprayers may be used. A spray volume of 200–300 l/ha should be used for ground application and can be applied via flat fan-type nozzles, preferably the low drift type to avoid fine droplets. Use 30 – 40 l/ha for aerial application. **Constant agitation throughout the spray operation is essential.** Only clean water should be used.

Rain is essential to leach the product into the zone of the germinating weeds and therefore 10 –15 mm of rain or irrigation is needed within 7 days of application to ensure optimum results. Under drier conditions, weeds may emerge. These should be controlled with a shallow cultivation, which will also incorporate the herbicide into the upper 10 – 20 mm of soil. If soil crusting becomes a problem, apply rotary harrow in the same direction that the rows

are planted, to assist maize germination. Harrowing after application may reduce weed control if untreated soil is thrown into deep planter furrows.

Apply **ULTRAMOC XTRA EC** preferably with or directly after planting but not later than three days after planting. Always use the lower rates on lighter soils and where the weed pressure is lower.

#### **Ground application:**

**ULTRAMOC XTRA EC** may be applied with any properly calibrated medium or high volume sprayer which is equipped with an efficient agitation mechanism capable of adequate coverage and even distribution. Best results are obtained using flat fan-type spray nozzles and applying a minimum spray volume of 200 l / ha.

### **AERIAL APPLICATION**

Aerial application may only be done by a registered aerial application operator using a registered and correctly calibrated aircraft according to the instructions of SANS Code 10118 (Aerial Application of Agricultural Remedies). It is important to ensure that the spray mixture is distributed evenly over the target area and that the loss of spray material during application is restricted to a minimum. It is therefore essential that the following criteria be met:

#### **Equipment**

- Use suitable atomising equipment (hydraulic nozzles or rotary atomisers) that will produce the desired droplet size and coverage of the target area and will ensure the minimum loss of product through drift.
- The operator must use a nozzle set-up that will produce a droplet spectrum with the lowest possible relative span.
- All nozzles and atomisers should be positioned within the inner 75% of the wingspan to prevent droplets from entering the wingtip vortices.

#### **Application Parameters**

- A minimum volume of 30 l spray mixture per ha is recommended. As this product has not been evaluated at a reduced volume rate, the registration holder cannot guarantee efficacy nor be held responsible for any adverse effects if this product is applied aerially at a lower volume rate than recommended.
- A droplet coverage of 30 – 40 droplets per sq cm must be recovered at the target.
- A droplet spectrum with a VMD of 250 – 280 microns is recommended. Ensure that the production of fine droplets, with a VMD less than 150 microns, is restricted to a minimum.
- The height of the spray boom should be maintained at between 3 and 4m above the target.
- Do not spray when the aircraft is in a climb, at the top of a turn or during a dive or when banking.
- Apply before the crop growth becomes too dense, which will interfere with overall plant coverage.

#### **Meteorological Conditions**

- The difference between the wet and dry bulb readings as determined by a whirling hygrometer, must not exceed 8 °C.
- Do not spray under turbulent, unstable conditions nor during the heat of the day when rising thermals and downdraughts occur.
- Do not spray under temperature inversion conditions (spraying in or above the inversion layer).
- Do not spray when the wind speed exceeds 15 km per hour.

#### **General**

- Ensure that fields are accurately marked and that the aerial spray operator knows exactly which fields to spray.
- Obtain an assurance from the aerial spray operator that the above requirements will be met.

#### **Pre-emergence aerial application:**

- A minimum spray volume of 30 l/ha.
- A minimum of 20 to 30 droplets per cm<sup>2</sup> must be recovered on the target area.
- Employ a droplet spectrum with VMD of 450 micron. Ensure that the production of fine droplets (less than 150 microns with high drift and evaporation potential) is restricted to a minimum.

## RECOMMENDATIONS

**TABLE 1. ULTRAMOC XTRA EC in tank mixture with ATRAZINE 900WG or Combozine 600 SC for broad spectrum pre-emergence weed control as a single application in maize.**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	Atrazine 900WG (kg/ha)	Combozine 600 SC (ℓ/ha)	TIMING OF APPLICATION
Maize	11 – 20	1.0 – 1.4	1.1 – 1.4	1.7 – 2.1	Apply to a well prepared seedbed after planting but before crop and weed emergence. Use the higher rate for extended and improved control of broadleaf weeds, crab finger grass and yellow nutsedge. Use the higher rate on soils with > 1.0 % organic matter content.
	21 – 30	1.4 – 1.5	1.4 – 1.6	2.1 – 2.5	
	31 – 40	1.5 – 1.7	1.6 – 2.2	2.5 – 3.33	
	41 – 50	1.7 – 2.0	2.2 – 2.7	3.33 – 4.2	

**TABLE 2. ULTRAMOC XTRA EC applied pre-emergence followed by early postemergence application of Combozine 600 SC plus Trooper SL or 2,4-D 480 amine for broadleaf weed control.**

CROP	% CLAY	Ultramoc Xtra EC (ℓ/ha)	F O L L O W E D B Y	Combozine 600 SC(ℓ/ha)	TIMING OF APPLICATION
Maize	11 – 20	1.0 – 104	F O L L O W E D B Y	1.7 – 2.1	Apply to a well prepared seedbed after planting but before crop and weed emergence. Use the higher rate for extended and improved control of broadleaf weeds, crab finger grass and yellow nutsedge. Use the higher rate on soils with > 1.0 % organic matter content.
	21 – 30	1.4 – 1.5		2.1 – 2.5	
	31 – 40	1.5 – 1.7		2.5 – 3.33	
	41 – 50	1.7 – 2.0		3.33 – 4.2	

### Remarks

- The follow-up application in TABLE 2. above may or may not require the addition of 2,4-D 480 amine or **Trooper SL** at their respective recommended dosage rates to assist in controlling emerged broadleaf weeds.

**TABLE 3. ULTRAMOC XTRA EC applied pre-emergence followed by early postemergence application of Combozine 600 SC plus Trooper SL or 2,4-D 480 amine for broadleaf weed control at rates to facilitate crop rotation.**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	F O L L O W E D B Y	Combozine 600 SC (ℓ/ha)	TIMING OF APPLICATION
Maize	11 – 20	1.0 – 1.4	All soil types 1.7 PLUS 0.5 <b>Trooper SL</b> OR 0.75 2,4-D 480 amine	Apply to a well prepared seedbed after planting but before crop and weed emergence. Use the higher rate for extended and improved control of grass weeds and yellow nutsedge. Use the higher rate on soils with > 1.0 % organic matter content.	
	21 – 30	1.4 – 1.5			
	31 – 40	1.5 – 1.7			
	41 – 50	1.7 – 2.0			

**TABLE 4. ULTRAMOC XTRA EC in tank mixture with ATRAZINE 900WG or Combozine 600 SC for initial/short term pre-emergence control)**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	ATRAZINE 900WG (ℓ/ha)	Combozine 600SC (ℓ/ha)	TIMING OF APPLICATION
Maize	0 – 10	0.5 – 0.7	0.5 – 0.6	0.75 – 0.85	Apply to a well prepared seedbed after planting but before crop and weed emergence.
	11 – 20	0.7 – 0.9	0.6 – 0.7	0.85 – 1.0	

	21 – 30	0.9 – 1.2	0.7 – 0.8	1.0 – 1.2	Use the higher rate where the clay % is higher. Use the higher rate on soils with > 1.0 % organic matter content.
	> 31	1.2 – 1.4	0.8 – 1.0	1.2 – 1.7	

**TABLE 5. Unimoc EC applied as a follow-up tank mixture to extend pre-emergence weed control after initial application as above in TABLE 4.**

CROP	% CLAY	Unimoc EC (ℓ/ha)	Combozine 600 SC (ℓ/ha)	TIMING OF APPLICATION
Maize	0 – 10	0.4 – 0.5	0.9 – 1.2	Apply prior to weed emergence. Use the higher rate where the clay % is higher or where extended control is required.
	11 – 20	0.5 – 0.6	1.2 – 1.5	
	21 – 30	0.6 – 0.8	1.5 – 2.1	Use the higher rate on soils with > 1.0 % organic matter content.
	> 31	0.8 – 1.0	2.1 – 2.5	

**TABLE 6. Ultramoc Xtra EC (for use in the North-western Free State and North West Province)**

CROP	% CLAY	Ultramoc Xtra EC (ℓ/ha)	Combozine 600 SC (ℓ/ha)	TIMING OF APPLICATION
Maize	0 – 10	0.5	1.8	Apply at or immediately after planting to a freshly prepared seedbed.
	11 – 20	0.65	2.0	
	21 – 30	0.9	2.5	

**General remarks (referring to TABLE 1. – 6.)**

- Application according to TABLE 4 will provide initial control only. A follow-up application will be necessary according to TABLE 5 as soon as weed germination commences (2 – 3 weeks after crop emergence but prior to weed emergence).
- Where nutsedge or high weed pressures are a problem as well as under heavier soil conditions, always select the higher rate of application where applicable. Always use the higher rates of **Atrazine 900 WG** and Combozine 600 SC where longer residual action with regard to broadleaf weeds is required, especially those that germinate late in the season such as khaki weed (*Tagetes minuta*) and large thorn apple (*Datura ferox*). For khaki weed, Combozine 600 SC is the preferred product and for large thorn apple, **Atrazine 900 WG** is the preferred product.
- Follow-up applications can be carried out with or without mechanical cultivation. Where weeds are to be controlled by spraying only, the weeds must not be allowed to develop beyond a growth stage where they will not be controlled by the spray application alone.
- Where follow-up applications are made without mechanical cultivation:  
For application of Combozine 600 SC - broadleaved weeds may not be larger than the 4-leaf stage and grasses should not yet have emerged.  
For Combozine 600 SC plus 2,4-D amine or **Trooper SL** broadleaved weeds may not be larger than the 4-6-leaf stage and grasses should not yet have emerged.
- Adhere to the use restrictions as indicated on the labels of the products containing triazines for follow-up crops. To facilitate crop rotation, **Atrazine 900 WG** should not exceed 1.1 kg/ha and Combozine 600 SC should not exceed 1.7 ℓ/ha.
- Where crop rotation with triazine sensitive crops is practiced, the rates in above tables should be reduced to levels where the total rate of active triazines per growing season does not exceed 1.0 kg/ha.
- Where Combozine 600SC is applied post-emergence to control broadleaf weeds, Solitaire must be added to the mixture at its recommended dosage rate.

**ULTRAMOC XTRA EC plus Cyclone Elite pre-emergence in maize**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	Cyclone Elite (ℓ/ha)	TIMING OF APPLICATION
Maize	0 – 10	-	-	Apply at or immediately after planting to a freshly prepared seedbed. Ensure that all conditions and restrictions for <b>Cyclone Elite</b> are adhered to.
	11 – 20	1.0 – 1.4	0.75	
	21 – 30	1.4 – 1.5	1.0	

31 – 40	1.5 – 1.7	1.0
41 – 50	1.7 – 2.0	1.0

**Remarks for above tables:**

- Should other weeds be present which need to be controlled pre-emergence, consideration should be given to inclusion of such products which are registered for the control of the specific weeds.
- When **ULTRAMOC XTRA EC** is used in combination with **Cyclone Elite**, the rate of **ULTRAMOC XTRA EC** is weed dependent more than clay % dependent.
- Where the full rate of **ULTRAMOC XTRA EC** is used in combination with **Cyclone Elite** all the weeds listed on the **ULTRAMOC XTRA EC** label should be controlled provided the relevant conditions have been met.
- Should other weeds be present which need to be controlled pre-emergence, consideration should be given to inclusion of such products which are registered for the control of the specific weeds.
- This application may be followed up with applications of **Cyclone**, **Cyclone Elite** or **Premiere**. Refer to these labels for full directions, instructions and restrictions.

**Premiere in tank mixture with ULTRAMOC XTRA EC for broad spectrum pre-emergence weed control as a single application in maize.**

% CLAY	PREMIERE (mℓ/ha)	ULTRAMOC XTRA EC (ℓ/ha)	WEEDS CONTROLLED	
11 – 50	104	0.7 – 1.4	<i>Acanthospermum hispidum</i> <i>Chenopodium album</i> <i>Chenopodium carinatum</i> <i>Echinochloa colona</i> <i>Eleusine indica</i> <i>Nicandra physaloides</i> <i>Panicum schinzii</i> <i>Physalis angulata</i> <i>Setaria pallide-fusca</i>	Upright starbur White goosefoot Green goosefoot Marsh grass Goose grass Apple-of-Peru Sweet buffalo grass Wild gooseberry Red bristle grass
		0.85 – 1.4	<i>Tagetes minuta</i>	Khaki weed

**OR**

% CLAY	PREMIERE (mℓ/ha)	ULTRAMOC XTRA EC (ℓ/ha)	WEEDS CONTROLLED	
11 – 50	156	1.0 – 1.4	<i>Acanthospermum hispidum</i> <i>Chenopodium album</i> <i>Chenopodium carinatum</i> <i>Echinochloa colona</i> <i>Nicandra physaloides</i> <i>Physalis angulata</i> <i>Setaria pallide-fusca</i> <i>Tagetes minuta</i>	Upright starbur White goosefoot Green goosefoot Marsh grass Apple-of-Peru Wild gooseberry Red bristle grass Khaki weed
		1.2 – 1.4	<i>Eleusine indica</i> <i>Panicum schinzii</i>	Goose grass Sweet buffalo grass

OR

% CLAY	PREMIERE (mℓ/ha)	Ultramoc Xtra EC (mℓ/ha)	WEEDS CONTROLLED
11 – 50	208	1.4	<p><i>Acanthospermum hispidum</i>  <i>Amaranthus hybridus</i>  <i>Brachiaria eruciformis</i>  <i>Chenopodium album</i>  <i>Chenopodium carinatum</i>  <i>Cleome monophylla</i>  <i>Commelina benghalensis</i>  <i>Datura ferox</i>  <i>Digitaria sanguinalis</i>  <i>Echinochloa colona</i>  <i>Eleusine indica</i>  <i>Eragrostis curvula</i>  <i>Hibiscus cannabinus</i>  <i>Hibiscus trionum</i>  <i>Nicandra physaloides</i>  <i>Panicum schinzii</i>  <i>Physalis angulata</i>  <i>Polygonum aviculare</i>  <i>Setaria pallide-fusca</i>  <i>Tagetes minuta</i>  <i>Triumfetta pilosa</i></p> <p><b>Suppression of:</b>  <i>Bidens bipinnata</i>  <i>Bidens pilosa</i>  <i>Citriellus lanatus</i>  <i>Cosmos bipinnatus</i>  <i>Crotalaria sphaerocarpa</i>  <i>Cyperus esculentus</i>  <i>Ipomoea purpurea</i>  <i>Portulaca oleracea</i>  <i>Tribulus terrestris</i></p>
			<p>Upright starbur  Common pigweed  Sweet signal grass  White goosefoot  Green goosefoot  Spindlepod  Benghal wandering Jew  Large thorn apple  Crab fingergrass  Marsh grass  Goose grass  Weeping love grass  Kenaf  Bladder weed  Apple-of-Peru  Sweet buffalo grass  Wild gooseberry  Prostrate knotweed  Red bristle grass  Khaki weed</p> <p>Spanish blackjack  Blackjack  Bitter apple  Cosmos  Mealie Crotalaria  Yellow nutsedge  Common morning glory  Purslane  Dubbeltjie</p>

**Remarks for above tables:**

- Should other weeds be present which need to be controlled pre-emergence, consideration should be given to inclusion of such products which are registered for the control of the specific weeds.
- When **ULTRAMOC XTRA EC** is used in combination with **PREMIERE**, the rate of Ultramoc Xtra is weed dependent more than clay % dependent.
- Where the full rate of **ULTRAMOC XTRA EC** is used in combination with **PREMIERE** all the weeds listed on the **ULTRAMOC XTRA EC** label should be controlled provided the relevant conditions have been met.

- Should other weeds be present which need to be controlled pre-emergence, consideration should be given to inclusion of such products which are registered for the control of the specific weeds.

**GROUNDNUTS, GREEN BEANS, DRY BEANS, SUNFLOWERS, SOYBEANS AND LUPINS:**  
**Pre-emergence application of ULTRAMOC XTRA EC on the above crops:**

SOIL TYPE	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	TIMING OF APPLICATION
Sand / loamy sand / sandy loam	0 – 20	0.75 – 1.1	Use the higher application rate of <b>ULTRAMOC XTRA EC</b> for improved control of yellow nutsedge ( <i>Cyperus esculentus</i> ) or where heavy infestations of crab fingergrass ( <i>Digitaria sanguinalis</i> ) exist or where the organic matter in the soil exceeds 1%.
Sandy clay loam	21 – 30	1.1 – 1.5	
Sandy clay loam / sandy clay	> 30	1.5 – 2.0	Apply prior to weed emergence.

Use the higher rate where the clay % is higher or where extended control is required. Where improved pre-emergence broadleaf weed control is required, **Torpedo SC** may be added at its soil related dosage rate.

**Pre-emergence application of ULTRAMOC XTRA EC plus Equate SL**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	Equate SL (mℓ/ha)	TIMING OF APPLICATION
Dry beans, soy beans and groundnuts	0 – 15	0.6 – 0.85	300	Apply to a well prepared seedbed after planting but before crop and weed emergence.
	16 – 25	0.85 – 1.1	400	Use the higher rate where the clay % is higher. Use the higher rate on soils with > 1.0 % organic matter content.
	26 – 35	1.1 – 1.25	500	Always use the lower rate on dry beans
	> 35	NOT RECOMMENDED		

- Consult the **Equate SL** label for all instructions and restrictions.
- Use the higher application rate of **ULTRAMOC XTRA EC** for improved control of yellow nutsedge (*Cyperus esculentus*) or where heavy infestations of crab finger-grass (*Digitaria sanguinalis*) exist

**Pre-emergence application to grain and forage sorghum**

CROP	% CLAY	ULTRAMOC XTRA EC (ℓ/ha)	TIMING OF APPLICATION
Sorghum	0 – 20	NOT RECOMMENDED	Apply prior to weed emergence.
	21 – 30	1.25	
	31 – 40	1.3	
	> 40	1.3 – 1.75	

- On turf soils, *Brachiaria eruciformis* may require 1.75 ℓ /ha of **ULTRAMOC XTRA EC** for good control. It may also improve the control of *Cyperus esculentus*. Use the higher application rates of **ULTRAMOC XTRA EC** where heavy infestations of *Digitaria sanguinalis* (crab fingergrass) exist.
- If grain and forage sorghum seed are not properly pre-treated with **SAFENIM**, **ULTRAMOC XTRA EC** will cause severe injury to the crop.
- ULTRAMOC XTRA EC** may temporarily damage grain and forage sorghum when high soil moisture conditions occur 4 – 6 weeks after planting. The crop should outgrow this injury without any detrimental effect on yield. If a soil crust is formed it should be broken up immediately by means of shallow cultivation.
- Control of broadleaf weeds should be effective using products approved for this purpose such as **Atrazine 900 WG**, **Combozine 600 SC**, etc. Please consult these product labels for exact instructions and restrictions.

**WEEDS CONTROLLED BY ULTRAMOC XTRA EC:**

#### Grass species (pre-emergence only)

<i>Brachiaria eruciformis</i>	Sweet signal grass
<i>Chloris virgata</i>	Feathertop Chloris
<i>Dactyloctenium aegyptium</i>	Crowfoot
<i>Digitaria sanguinalis</i>	Crab finger-grass
<i>Echinochloa crusgalli</i>	Banyard grass
<i>Eleusine indica</i>	Goose grass
<i>Panicum maximum</i>	Common buffalo grass
<i>Panicum schinzii</i>	Sweet buffalo grass
<i>Pseudobrachiaria deflexa</i>	False signal grass
<i>Setaria pallide-fusca</i>	Red bristle grass
<i>Setaria verticillata</i>	Sticky bristle grass
<i>Tragus berteronianus</i>	Small carrotseed grass
<i>Tragus racemosus</i>	Large carrotseed grass
<i>Urochloa mozambicensis</i>	Bushveld herringbone grass
<i>Urochloa panicoides</i>	Herringbone grass

#### Variable control (pre-emergence)

<i>Amaranthus hybridus</i>	Cape pigweed
<i>Amaranthus spinosus</i>	Thorny pigweed
<i>Amaranthus thunbergii</i>	Red pigweed
<i>Chenopodium carinatum</i>	Green goosefoot
<i>Cleome monophylla</i>	Spindlepod
<i>Commelina benghalensis</i>	Bengal wandering jew
<i>Cyperus esculentus</i>	Yellow nutsedge
<i>Galinsoga parviflora</i>	Gallant soldier
<i>Nicandra physaloides</i>	Apple of Peru
<i>Portulaca oleracea</i>	Purslane

#### **NOTES:**

The variable control of weeds mentioned directly above is dependent upon environmental conditions and rate of application. The pre-emergence control of *Cyperus esculentus* is dependent on the following:

- Where a dosage choice is given, use the higher rate.
- Planting into a firm and fine seedbed must be preceded by a deep ploughing.
- **ULTRAMOC XTRA EC** must be applied within 2 days after planting.
- Sufficient continual soaking rain or irrigation (at least 15 mm on light soils and 25 mm on heavy soils) must fall within 7 days of spraying to leach the herbicide into the germination zone.
- Nutsedge will not be controlled at the reduced rates recommended in TABLE 4.
- Additional weeds will be controlled when **ULTRAMOC XTRA EC** is applied in combination with other herbicides mentioned in this label. Refer to the weed lists on those respective labels.

To increase the spectrum of broadleaf weeds controlled, it is recommended that either tank mixes or follow-up application of standard registered broadleaf herbicides are used in accordance with the manufacturer's label recommendations.

The registration holder does not accept any liability in respect of the control of unlisted weeds.

#### **ACKNOWLEDGEMENT OF TRADEMARKS**

<b>Combozine SC</b>	Tsunami Plant Protection (Pty) Ltd
<b>Premiere, Cyclone, Cyclone Elite, Equate, Unimoc EC Atrazine 900 WG and Trooper SL</b>	Meridian Agrochemical Company (Pty) Ltd

## WAARSKUWINGS

- Hanteer versigtig.
- Giftig indien ingesluk.
- Mag oog en vel irritasie veroorsaak, sowel as vel sensitisering.
- Kan giftig wees vir visse.
- Berg agter slot en rendel in 'n koel plek.
- **VLAMBAAR** - Moet nie of 'n oop houer naby oop vlam.
- Berg weg van voedsel, voer, kunsmis en ander landbou produkte.
- Hou buite bereik van kinders, oningeligte persone en diere.
- In geval van vergiftiging ontbied 'n geneesheer en toon hierdie etiket aan hom.
- **Herbetreding** - Moet nie behandelde gebied binne 1 dag na die bespuiting nie, tensy beskermende oorklere gedra word.
- **Lugtoediening:** Stel al die inwoners in die onmiddellike omgewing van die gebied wat bespuit gaan word in kennis en reik die nodige waarskuwings uit. Moet nie oor wateroppervlaktes sput nie en tref voorsorg dat die sputnewel nie water of aangrensende gebiede besoedel nie.

**Alhoewel hierdie middel omvattend onder 'n groot verskeidenheid toestande getoets is, waarborg die registrasiehouer nie dat dit onder alle toestande doeltreffend sal wees nie. Die werking en doeltreffendheid daarvan kan beïnvloed word deur faktore soos abnormale grond-, klimaats-en bergingstoestande, kwaliteit van verdunningswater, verenigbaarheid met ander stowwe wat nie op die etiket aangedui word nie en die voorkoms van weerstand van die onkruid teen die betrokke middel, sowel as die metode, tyd en akkuraatheid van toediening. Verder aanvaar die registrasiehouer nie verantwoordelikheid vir skade aan gewasse, plantegroei en die omgewing of vir nadelige invloede op mens of dier of vir 'n gebrek aan prestasie van die betrokke middel as gevolg van versuim van die gebruiker om die etiketaanwysings na te kom, of as gevolg van ontstaan van toestande wat nie kragtens die registrasie voorsien kon word nie. Raadpleeg die verskaffer in die geval van enige onsekerheid.**

## VOORSORGMAATREËLS

- Moet nie dampe of sputnewel inasem nie.
- Vermy kontak met die vel en oë deur beskermende klere te dra wanneer die produk gemeng word.
- In die geval van oogkontak, spoel met baie water en kry mediese aandag indien nodig.
- Was met seep en water na gebruik en toevallige velkontak asook besoedelde klere.
- Moet nie eet, drink of rook tydens vermenging of toediening van die produk of voordat hande en gesig gewas is nie.
- Vermy wegdrywing van sputnewel na ander gewasse, weiding, riviere, damme en areas nie onder behandeling nie.
- Maak toedieningsapparaat skoon na gebruik. Raak ontslae van spoelwater waar dit nie gewasse, weiding, riviere, damme en boorgate sal besoedel nie.
- Voorkom die besoedeling van voedsel, voer, drinkwater en eetgerei.
- Keer die leë houer om oor die spuittenk of mengbak en dreineer vir minstens 30 sekondes nadat die vloeit tot 'n drup verminder. Spoel daarna die leë houer drie keer uit met 'n volume water gelykstaande aan 'n minimum van 10% van die inhoud van die houer. Gooi die spoelwater by die inhoud van die spuittenk.
- Vernietig die leë houer en moenie vir enige ander doel gebruik nie.

## SIMPTOME VAN MENSLIKE VERGIFTIGING

Irritasie van vel en slymvlies is tipiese reaksies. Mag irritasie van die oë veroorsaak. Mag irritasie van die vel en allergiese reaksie veroorsaak. Mag vel sensitiwiteit veroorsaak. As groot hoeveelhede ingeneem word, kan naarheid, brakking, abdominale teerheid en diaree veroorsaak word.

## NOODHULP BEHANDELING

**Velkontak:** Verwyder besoedelde klere, sowel as skoene en leer goedere. Was die hele liggaam met 'n sagte seep en baie water. Persone wat noodhulp toedien, moet handskoene dra om self-besoedeling te vermy. **Soek mediese hulp indien nodig.**

**Oogkontak:** Was oë onmiddellik uit met groot hoeveelhede skoon water, vir ongeveer 15 minute. Lig die boonste en onderste oogledle gedurig. Indien oog irritasie aanhou, soek mediese hulp.

**Inaseming:** Verwyder die pasiënt na 'n goed geventileerde area en maak klere om die nek los. Pas kunsmatige asemhaling toe en dien suurstof indien nodig, suurstof. Hou die pasiënt warm en kalm. **Ontbied onmiddellik mediese hulp.**

**Mondelikse inname:** **Moet nie braking induseer nie.** Ontbied onmiddellik mediese hulp. Toediening van gastriese reiniging of suurstof moet deur opgeleide mediese personeel toegedien word.

#### NOTA AAN GENEESHEER

Geen spesifieke teengif. Behandel simptomaties en ondersteunend. Hou pasiënt onder observasie. Dien gastriese reiniging en suiwing toe indien die pasient nie bewusteloos is nie. Indien minder as 10 mg per kg liggaamsgewig ingeneem is, dien 30 - 60 g geakteerde houtskool toe in 150 - 300 ml water.

#### GEBRUIKSBEPERKINGS

- Moet nie **ULTRAMOC XTRA EC** op eksperimentele of nuut vrygestelde kultivars / variëteite gebruik alvorens die vervaardigers of saadverspreiders geraadpleeg is nie.
- Moet nie **ULTRAMOC XTRA EC** op swak gedreineerde gronde of gronde met 'n kompaksie laag, want versuiping kan maklik onder sulke toestande ontstaan met gevoglike gewas skade mag veroorsaak.
- Moet nie **ULTRAMOC XTRA EC** toedien op enige gewas of situasie wat nie op hierdie etiket aanbeveel word nie.
- Dien **ULTRAMOC XTRA EC** toe slegs met 'n akkurate en veilige toedieningsmetode.
- Swaar reën op sandgronde met 'n lae organiese material inhoud, sowel as vloedbesproeiing, mag lei tot verminderde onkruidbeheer.
- Optimale onkruidbeheer word verkry op 'n fyn, gelyk saadbed wat vry van kluite, plantreste en onkruide is. **ULTRAMOC XTRA EC** sal ook onkruide beheer waar verminderde of deklaagbewerking toegepas word.
- As **ULTRAMOC XTRA EC** met ander middels in tenkmengsels gebruik word, moet die menginstruksies en gebruiksbeperkings van die betrokke produk gevolg word.
- Gebruik die laer dosisse op gronde in die Noordwes Provincie, Noord-en WesVrystaat.
- Gebruik die laer dosisse op liger gronde en waar die onkruidpopulasie druk nie so hoog is nie.
- Maak seker dat voldoende kunsmis toegedien word en korrek geplaas word tydens die plantproses om die groei van die saailinge te bevorder, terwyl kunsmisbrand verhoed moet word deur kunsmis nie te na aan saad te plaas nie.

**NOTA:** **ULTRAMOC XTRA EC** is geregistreer vir gebruik op groen bone op die McCain kultivars Forte, Masai en Dark Seeded Provider (geldig vir die Loskop-besproeiingskema, Letsitele, Orhigstad-en sekere Hoëveld areas).

#### GEBRUIKSAANWYSINGS

Gebruik slegs soos aangedui.

#### MENGINSTRUKSIES

Maak die sputtenk halfvol met gesikte water en voeg die benodigde hoeveelheid van **ULTRAMOC XTRA EC** aan die water in die tenk terwyl geroer word. Vul die sputtenk tot die verlangde volume. As tenkmengsels gemaak word met ander onkruiddoders, moet die betrokke vervaardiger se etiket aanbevelings gevolg word. **Die tenkmengsels moet onmiddellik uitgespuit word en nie toegelaat word om oornag in die sputtenk te staan nie.** Die sputtoerusting moet aan die einde van toediening deeglik uitgespoel word.

#### VERENIGBAARHEID

Die verenigbaarheid van **ULTRAMOC XTRA EC** met ander produkte hang af van die formulasie van die betrokke produktes asook die kwaliteit van die sputwater. Omdat formulerings kan verander van tyd tot tyd, word dit aanbeveel dat 'n fisiese

verenigbaarheidstoets uitgevoer word voor die tenkmengsel gemaak word. **ULTRAMOC XTRA EC** is verenigbaar met die meeste piretroïed insekdoders, Combozine, **Cyclone Elite**, **Premiere** en atrasien formulerings.

#### TOEDIENINGSMETODES

Maak seker dat die sputtoerusting korrek gekalibreer is en gereeld nagegaan word tydens toediening om egelig en akkuraate toediening te verseker. Rugsakspuite of 'n konvensionele sputbalk kan gebruik word. 'n Sputvolume van 200-300 l / ha moet gebruik word vir grondtoediening en dit kan toegedien word deur middle van platwaaier

spuitpunte, verkieslik die lae dryf tipe om fyn druppels te voorkom. Gebruik 30 - 40 l / ha vir lugtoediening. **Konstante roering regdeur die spuitoperasie is noodsaaklik.** Gebruik net skoon water vir toediening.

Reëerval is noodsaaklik om die onkruiddoder in die bogrondlae in te loog waar die ontkiemende onkruid voorkom en daarvoor is 10 - 15 mm aanhouende reën of besproeiing nodig binne 7 dae na toediening, om optimale resultate te verseker. Onder droë toestande mag onkruidsaailinge opkom. Dié onkruide kan vernietig word deur 'n vlak bewerking wat terselfdertyd die onkruiddoder met die boonste 10 - 20 mm grondlaag vermeng. Indien korsvorming 'n probleem word moet 'n roltandeg in dieselfde rigting as die plantrye gebruik word om die ontkieming van die mielies te bevorder. Skoffelbewerking na toediening mag onkruidbeheer benadeel as onbehandelde grond na die oppervlak gebring word. Verseker dat voldoende kunsmis naby die saad geplaas word om kragtige saailinggroei te bevorder. **ULTRAMOC XTRA EC** moet verkieslik met of net na plant toegedien word, maar nie later as drie dae na plant nie. Gebruik altyd die laer dosis op ligte gronde en waar die onkruiddruk druk laag is.

#### **Grondtoediening:**

**ULTRAMOC XTRA EC** kan toegedien word met enige behoorlike gekalibreerde medium tot hoëvolume spuit wat toegerus is met 'n doeltreffende roermeganisme wat egale bedekking sal verseker. Die beste resultate word verkry met behulp van platwaaierspuitpunte en die toepassing van 'n minimum spuitvolume van 200 l / ha.

#### **LUGTOEDIENING**

Lugtoediening mag slegs deur 'n geregistreerde lugbespuitingsoperator met 'n korrek gekalibreerde, geregistreerde vliegtuig volgens die instruksies van SANS Kode 10118 (Aerial Application of Agricultural Remedies) gedoen word. Dit is belangrik om te verseker dat die spuitmengsel eweredig oor die teiken area versprei word en dat die verlies aan spuitmengsel tydens toediening tot 'n minimum beperk word. Dit is dus noodsaaklik dat die volgende kriteria nagekom moet word:

#### **Toerusting**

- Gebruik gesikte atomiseringsapparaat (hidroiese of roterende spuitkoppe) wat die vereiste druppelgrootte en bedekking van die teiken area sal produseer, maar wat die minste verlies van produk deur wegdrywing sal verseker.
- Die operator moet 'n spuitstelsel gebruik wat 'n druppelspektrum met die kleinste moontlike relatiewe span sal produseer.
- Al die spuitkoppe en atomiseerders moet in die binneste 75% van die vlerkspan geplaas word om die beweging van druppels in die vlerkvorteks in te beperk.

#### **Toedieningsvereistes**

- 'n Minimum volume van 30 l spuitmengsel per ha word aanbeveel. Aangesien hierdie produk nie teen 'n verlaagde volume getoets is nie, kan die registrasiehouer nie effektiwiteit waarborg, of verantwoordelik gehou word vir enige nadelige effekte indien hierdie produk teen 'n laer volume, as hierbo aanbeveel, uit die lug toegedien word nie.
- 'n Druppelbedekking van 30 - 40 druppels per vk cm moet op die teiken area herwin word.
- 'n Druppelspektrum met 'n VMD van 250 - 280 mikron word aanbeveel. Verseker dat die produksie van fyn druppels, die wat kleiner as 150 mikron is, tot 'n minimum beperk word.
- Die hoogte van die spuitbalk moet tussen 3 en 4m bo die teiken gehandhaaf word.
- Moet nie spuit wanneer die vliegtuig aan die bopunt van 'n draai is of tydens 'n duik of terwyl dit uitklim of draai nie.
- Dien toe voordat die gewas te ruig word aangesien die druppelbedekking op die plante sal verminder word.

#### **Meteorologiese toestande**

- Die verskil tussen die nat-en droëbollesing lesings, soos met 'n swaai-higrometer bepaal, moet nie 8 °C oorskry nie.
- Moet nie toedien tydens turbulente en onstabiele weerstoestande of gedeurende die hitte van die dag wanneer stygende en dalende lugbewegings plaasvind nie.
- Moenie toedien onder temperatuur inversie toestande (deur bo of binne die inversie laag te spuit) nie.
- Moenie spuit indien die windspoed 15 km per uur oorskry nie.

#### **Algemeen**

- Verseker dat die lande akkuraat gemerk is en dat die spuitoperator presies weet watter lande gespuit moet word.
- Verkry 'n versekering van die spuitoperator dat aan die bogenoemde vereistes voldoen sal word.

#### **Voor-opkoms toediening:**

- 'n Minimum spuitvolume van 30 ℓ / ha.
- 'n Minimum van 20 tot 30 druppels per cm<sup>2</sup> moet op die teikengebied herwin word.
- Gebruik 'n druppelspektrum met 'n VMD van 450 mikron. Verseker dat die produksie van fyn druppels (kleiner as 150 mikron met hoë wegdrywings- en verdigtingspotensiaal) tot 'n minimum beperk word.

#### AANBEVELINGS

**TABEL 1. ULTRAMOC XTRA EC in 'n tenkmengsel met die ATRAZINE 900 WG of Combozine 600 SC vir die breë spektrum voor-opkoms onkruidbeheer as 'n enkele toediening in mielies.**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	Atrazine 900 WG (kg/ha)	Combozine 600 SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	11 – 20	1.0 – 1.4	1.1 – 1.4	1.7 – 2.1	Dien toe op 'n goed voorbereide saadbed na plant maar voor-opkoms van die gewas en onkruide. Gebruik die hoër dosis vir verlengde en verbeterde beheer van breëblaar onkruid, kruisvingergras en geeluintjie. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaalinhoud.
	21 – 30	1.4 – 1.5	1.4 – 1.6	2.1 – 2.5	
	31 – 40	1.5 – 1.7	1.6 – 2.2	2.5 – 3.33	
	41 – 50	1.7 – 2	2.2 – 2.7	3.33 – 4.2	

**TABEL 2. ULTRAMOC XTRA EC voor-opkoms gevvolg deur vroeë na-opkoms toediening van Combozine 600 SC plus Trooper SL of 2,4-D 480 amien vir breëblaar onkruidbeheer.**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	G E V O L G	Combozine 600 SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	11 – 20	1.0 – 1.4	Dien toe op 'n goed voorbereide saadbed na plant maar voor die gewas en onkruide ontkiem. Gebruik die hoër dosis vir verlengde en verbeterde beheer van breëblaaronkruide, kruisvingergras en geeluintjie. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaalinhoud.	1.7 – 2.1	
	21 – 30	1.4 – 1.5		2.1 – 2.5	
	31 – 40	1.5 – 1.7		2.5 – 3.33	
	41 – 50	1.7 – 2.0		3.33 – 4.2	

#### Opmerkings

- Die opvolg-aanbeveling in Tabel 2. bo, mag moontlik die byvoeging van 2,4-D 480 amien of **Trooper SL** by hul onderskeie aanbevole dosisse noodaak val as breëblaare reeds ontkiem en ontwikkel het.

**TABEL 3. ULTRAMOC XTRA EC voor-opkoms gevvolg deur vroeë na-opkoms toediening van Combozine 600 SC plus Trooper SL of 2,4-D 480 amien vir breëblaar onkruidbeheer teen koerse om wisselbou te faciliteer.**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	G E V O L G	Combozine 600 SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	11 – 20	1.0 – 1.4	Alle grontypes 1.7 plus 0.5 <b>Trooper SL</b> OF 0.75 2,4-D 480 amien	Dien toe op 'n goed voorbereide saadbed na plant maar voor-opkoms van die gewas en onkruide. Gebruik die hoër dosis vir verlengde en verbeterde beheer van grasse en uintjies. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaalinhou.	
	21 – 30	1.4 – 1.5			
	31 – 40	1.5 – 1.7			
	41 – 50	1.7 – 2.0			

**TABEL 4. ULTRAMOC XTRA EC in tenkmengsel met die ATRAZINE 900 WG of Combozine 600 SC vir die aanvanklike / kort termyn vooropkoms beheer)**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	ATRAZINE 900 WG (ℓ/ha)	Combozine 600SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	0 – 10	0.5 – 0.7	0.5 – 0.6	0.75 – 0.85	Dien toe op 'n goed voorbereide saadbed na plant maar voor-opkoms van die gewas en onkruide. Gebruik die hoër dosis waar die klei% hoër is. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaalinhoud.
	11 – 20	0.7 – 0.9	0.6 – 0.7	0.85 – 1.0	
	21 – 30	0.9 – 1.2	0.7 – 0.8	1.0 – 1.2	
	> 31	1.2 – 1.4	0.8 – 1.0	1.2 – 1.7	

**TABEL 5. Unimoc EC as 'n opvolg tenkmengsel vir verlengende voor-opkoms beheer na die aanvanklike toediening soos hierbo in Tabel 4 beskryf.**

GEWAS	% KLEI	Unimoc EC (ℓ/ha)	Combozine 600 SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	0 – 10	0.4 – 0.5	0.9 – 1.2	Dien voor-opkoms van onkruide. Gebruik die hoër dosis waar die klei% hoër is of waar verlengde beheer nodig is. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaal-inhoud.
	11 – 20	0.5 – 0.6	1.2 – 1.5	
	21 – 30	0.6 – 0.8	1.5 – 2.1	
	> 31	0.8 – 1.0	2.1 – 2.5	

**Tabel 6. ULTRAMOC XTRA EC EC (vir gebruik in die Noord-Wes-Vrystaat en Noordwes Provincie)**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	Combozine 600 SC (ℓ/ha)	TOEDIENINGSTYD
Mielies	0 – 10	0.5	1.8	Dien toe tydens of onmiddellik na plant van 'n vars voorbereide saadbed.
	11 – 20	0.65	2.0	
	21 – 30	0.9	2.5	

#### Algemene opmerkings (verwys na TABEL 1 - 6)

- Toepassing volgens TABEL 4. Sal slegs aanvanklike onkruidebeheer verskaf. Daar moet dus opgevolg word volgens volgens TABEL 5. sodra onkruide begin ontkiem (2 - 3 weke na-opkoms van die gewas, maar voor-opkoms van onkruide).
- Waar geeluintjie of hoë onkruiddruk 'n probleem is, sowel as onder swaarder grondtoestande, kies altyd die hoër dosis waar van toepassing. Gebruik altyd die hoër toedieningshoeveelheid van die **Atrazine 900 WG** en Combozine 600 SC waar langer nawerking met betrekking tot breëblaaronkruide vereis word, veral dié wat laat in die seisoen soos kakiebos (*Tagetes minuta*) en groot stinkblaar (*Datura ferox*) ontkiem. Vir kakiebos, is Combozine 600 SC die voorkeur produk en vir groot stinkblaar, is **Atrazine 900 WG** die voorkeur produk.
- Opvolg toedienings kan uitgevoer word met of sonder meganiese skoffelbewerking. Waar onkruide moet net deur bespuiting beheer word, moet die onkruide nie toegelaat word om buite 'n groei stadium te ontwikkel waar hulle nie deur die toediening alleen beheer kan word nie.
- Waar opvolg-aansoeke sonder meganiese skoffelbewerking gemaak is: Vir die toepassing van Combozine SC - breëblaaronkruide mag nie groter as die 4blaarstadium wees nie en grasse moet nog nie opgekom het nie.
- Vir Combozine 600 SC plus 2,4-D amien of **Trooper SL** breëblaaronkruide mag nie groter as die 4-6-blaarstadium wees nie en grasse moet nog nie opgekom het nie.
- Hou by die gebruiksbeperkings vir opvolgewasse soos op die etikette aangedui van triasienbevattende middels. Om wisselbou te faciliteer, moet **Atrazine 900 WG** nie meer as 1,1 kg / ha oorskry nie en Combozine 600 SC moet nie meer as 1,7 ℥ / ha oorskry nie.

- Waar wisselbou met triasien sensitiewe gewasse toegepas word, moet die dosisse in die bogenoemde tabelle afgebring word sodat die totale hoeveelheid van aktiewe triasien per groeiseisoen nie 1,0 kg / ha oorskry nie.
- Waar Combezine SC na-opkoms toegedien word om breeblaaronkruide te beheer, moet Solitaire bygevoeg word teen sy aanbevole dosis.

#### **ULTRAMOC XTRA EC plus Cyclone Elite voor-opkoms in mielies**

GEWAS	% KLEI	ULTRAMOC XTRA EC (ℓ/ha)	Cyclone Elite (ℓ/ha)	TOEDIENINGSTYD
<b>Mielies</b>	0 – 10	-	-	Dien toe tydens of onmiddellik na plant op 'n vars voorbereide saadbed. Maak seker dat al die voorwaardes en beperkings vir <b>Cyclone Elite</b> nagekom word.
	11 – 20	1.0 – 1.4	0.75	
	21 – 30	1.4 – 1.5	1.0	
	31 – 40	1.5 – 1.7	1.0	
	41 – 50	1.7 – 2.0	1.0	

#### **Notas vir bogenoemde tabelle:**

- Indien ander onkruide teenwoordig is wat ook voor-opkoms beheer moet word, moet oorweging geskenk word vir die insluiting van sodanige produkte wat geregistreer is vir die beheer van die spesifieke onkruide.
- Wanneer **ULTRAMOC XTRA EC** gebruik word in kombinasie met **Cyclone Elite**, is die dosis van **ULTRAMOC XTRA EC** meer onkruid afhanklik as klei % afhanklik is.
- Waar die vol dosis van **ULTRAMOC XTRA EC** gebruik word in kombinasie met **Cyclone Elite** sal al die onkruide wat op die **ULTRAMOC XTRA EC** etiket is ook beheer word, mits die betrokke voorwaardes nagekom is.
- Indien ander onkruide teenwoordig is wat ook beheer moet word voor-opkoms, moet oorweging geskenk word aan die insluiting van sodanige produkte wat geregistreer is vir die beheer van die spesifieke onkruide.
- Hierdie aansoek kan opgevolg word met aansoeke van **Cyclone**, **Cyclone Elite** of **Premiere**. Verwys na hierdie etikette vir volledige aanwysings, instruksies en beperkings.

#### **Premiere in tenkmengsel met ULTRAMOC XTRA EC vir die breë spektrum vooropkoms onkruidebeheer as 'n enkele toediening in mielies.**

% KLEI	PREMIERE (mℓ/ha)	ULTRAMOC XTRA EC (ℓ/ha)	ONKRUIDE BEHEER.
11 – 50	104	0.7 – 1.4	<i>Acanthospermum hispidum</i> <i>Chenopodium album</i> <i>Chenopodium carinatum</i> <i>Echinochloa colona</i> <i>Eleusine indica</i> <i>Nicandra physaloides</i> <i>Panicum schinzii</i> <i>Physalis angulata</i> <i>Setaria pallide-fusca</i>
		0.85 – 1.4	<i>Tagetes minuta</i>
			Kakiebos

OF

% KLEI	PREMIERE (mℓ/ha)	ULTRAMOC XTRA EC (ℓ/ha)	ONKRUIDE BEHEER.	
11 – 50	156	1.0 – 1.4	<i>Acanthospermum hispidum</i> <i>Chenopodium album</i> <i>Chenopodium carinatum</i> <i>Echinochloa colona</i> <i>Nicandra physaloides</i> <i>Physalis angulata</i> <i>Setaria pallide-fusca</i> <i>Tagetes minuta</i>	Regopsterklits Withondebossie Groen hondebossie Moerasgras Basterappelliefie Wilde appelliefie Rooiborselgras Kakiebos
			<i>Eleusine indica</i> <i>Panicum schinzii</i>	Jongosgras Soetbuffelsgras

#### OF

% KLEI	PREMIERE (mℓ/ha)	ULTRAMOC XTRA EC (mℓ/ha)	ONKRUIDE BEHEER.	
11 – 50	208	1.4	<i>Acanthospermum hispidum</i> <i>Amaranthus hybridus</i> <i>Brachiaria eruciformis</i> <i>Chenopodium album</i> <i>Chenopodium carinatum</i> <i>Cleome monophylla</i> <i>Commelina beghalensis</i> <i>Datura ferox</i> <i>Digitaria sanguinalis</i> <i>Echinochloa colona</i> <i>Eleusine indica</i> <i>Eragrostis curvula</i> <i>Hibiscus cannabinus</i> <i>Hibiscus trionum</i> <i>Nicandra physaloides</i> <i>Panicum schinzii</i> <i>Physalis angulata</i> <i>Polygonum aviculare</i> <i>Setaria pallide-fusca</i> <i>Tagetes minuta</i> <i>Triumfetta pilosa</i>	Regopsterklits Gewone misbredie Litjesinjaalgras Withondebossie Groen hondebossie Rusperbossie Bengaalse wandelende ood Grootstinkblaar Kruisvingergras Moerasgras Jongosgras Oulandsgras Wildestokroos Terblansbossie Basterappelliefie Soetbuffelsgras Wilde appelliefie Voelduisendknoop Rooiborselgras Kakiebos Klitsbossie
			<b>Onderdrukking van:</b> <i>Bidens bipinnata</i> <i>Bidens pilosa</i> <i>Citrillus lanatus</i> <i>Cosmos bipinnatus</i> <i>Crotalaria sphaerocarpa</i> <i>Cyperus esculentus</i> <i>Ipomoea purpurea</i> <i>Portulaca oleracea</i> <i>Tribulus terrestris</i>	Spaanse knapsekeler Gewone knapsekeler Wildewaatlemoen Kosmos Mielie Crotalaria Geeluintjie Purperwinde Varkkos Dubbeltjie

**Notas vir die bogenoemde tabelle:**

- Indien ander onkruid teenwoordig is wat voor-opkoms beheer moet word, moet oorweging geskenk word aan die insluiting van sodanige produkte wat geregistreer is vir die beheer van die spesifieke onkruid.
- Wanneer **ULTRAMOC XTRA EC** gebruik word in kombinasie met **PREMIERE**, moet gelet word dat die dosis van **ULTRAMOC XTRA EC** meer onkruid afhanklik as klei% afhanklik is.
- Waar die vol dosis van **ULTRAMOC XTRA EC** gebruik word in kombinasie met **PREMIERE** al die onkruid wat op die **ULTRAMOC XTRA EC** etiket is sal beheer word, mits die betrokke voorwaardes nagekom is.

**Grondbone, groen bone, droë bone, sonneblom, sojabone en lupiene:**

**Voor-opkoms toediening van ULTRAMOC XTRA EC op die bogenoemde gewasse:**

GRONDSOORT	% KLEI	Ultramoc Xtra EC (ℓ/ha)	TOEDIENINGSTYD
Sand / leemsand / sandleem	0 – 20	0.75 – 1.1	Gebruik die hoër toedieningshoeveelheid van <b>ULTRAMOC XTRA EC</b> vir verbeterde beheer van geeluintjie ( <i>Cyperus esculentus</i> ) of waar swaar besmettings van kruisvingergras-gras ( <i>Digitaria sanguinalis</i> ) bestaan, of waar die organiese materiaal in die grond 1% oorskry.
Sanderige kleileem	21 – 30	1.1 – 1.5	
Sanderige kleileem / sanderige klei	> 30	1.5 – 2.0	Dien voor-opkoms van onkruide.

Gebruik die hoër dosis waar die klei% hoër is of waar verlengde beheer nodig is. Waar verbeterde voor-opkoms breëblaar onkruidbeheer vereis word, kan **Torpedo SC** teen sy grond verwante dosis bygevoeg word.

**Voor-opkoms toediening van ULTRAMOC XTRA EC plus Equate SL**

GEWAS	% KLEI	Ultramoc Xtra EC (ℓ/ha)	Equate SL (mℓ/ha)	TOEDIENINGSTYD
Droëbone, sojabone en grondbone	0 – 15	0.6 – 0.85	300	Dien toe op 'n goed voorbereide saadbed na plant maar voor-opkoms van gewas en onkruide. Gebruik die hoër dosis waar die klei% hoër is. Gebruik die hoër dosis op gronde met > 1.0% organiese materiaalinhoud. Gebruik altyd die laer dosis op droë bone
	16 – 25	0.85 – 1.1	400	
	26 – 35	1.1 – 1.25	500	
	> 35	NIE AANBEVEEL NIE		

Raadpleeg die **Equate SL** etiket vir al die instruksies en beperkings.

Gebruik die hoër toedieningshoeveelheid van **ULTRAMOC XTRA EC** vir verbeterde beheer van geeluintjie (*Cyperus esculentus*) of waar swaar besmettings van kruisvingergras (*Digitaria sanguinalis*) bestaan.

**Voor-opkoms toediening op graan en voersorghum**

GEWAS	% KLEI	Ultramoc Xtra EC (ℓ/ha)	TOEDIENINGSTYD
Sorghum	0 – 20	NIE AANBEVEEL NIE	Dien voor – opkoms van onkruide.
	21 – 30	1.25	
	31 – 40	1.3	
	> 40	1.3 – 1.75	

- Op turfgronde, mag *Brachiaria eruciformis* 1.75 ℓ / ha van **ULTRAMOC XTRA EC** vir goeie beheer vereis. Dit kan ook die beheer van *Cyperus esculentus* verbeter. Gebruik die hoër toedieningshoeveelhede van **ULTRAMOC XTRA EC** waar swaar infestasies van *Digitaria sanguinalis* (Kruisvingergras) bestaan.
- Indien graan en voersorghum saad nie behoorlik vooraf met **SAFENIM** behandel is nie, sal **ULTRAMOC XTRA EC** ernstige skade aan die gewas veroorsaak.
- ULTRAMOC XTRA EC** kan graan en voersorghum tydelik beskadig wanneer hoë grondvog toestande voorkom 4 - 6 weke na plant. Die gewas behoort om hierdie besering te ontgroei sonder enige nadelige effek op die opbrengs. Indien 'n grondkors gevorm word, moet dit onmiddellik gebreek word deur middel van vlak bewerking.
- Die beheer van breëblaaronkruide doeltreffend moet wees deur gebruik te maak van produkte wat goedgekeur is vir hierdie doel soos **Atrazine 900 WG**, Combozine 600 SC, ens. Raadpleeg asseblief hierdie produk-etikette vir die presiese instruksies en beperkings.

## ONKRUIDE WAT BEHEER WORD DEUR ULTRAMOC XTRA EC:

### Grassoorte (slegs voor-opkoms)

<i>Brachiaria eruciformis</i>	Litjiesinjaalgras
<i>Chloris virgata</i>	Witpluimchloris
<i>Dactyloctenium aegyptium</i>	Hoenderspoor
<i>Digitaria sanguinalis</i>	Kruisvingergras
<i>Echinochloa crusgalli</i>	Hanepootmanna
<i>Eleusine indica</i>	Jongosgras
<i>Panicum maximum</i>	Gewone bulffelsgras
<i>Panicum schinzii</i>	Soetbuffelsgras
<i>Pseudobrachiaria deflexa</i>	Bastersinjaalgras
<i>Setaria pallide-fusca</i>	Rooiborselgras
<i>Setaria verticillata</i>	Klitssetaria
<i>Tragus berteronianus</i>	Kleinwortelsaadgras
<i>Tragus racemosus</i>	Grootwortelsaadgras
<i>Urochloa mozambicensis</i>	Bosveldbeesgras
<i>Urochloa panicoides</i>	Tuin Urochloa

### Wissellvallige beheer (Voor-opkoms)

<i>Amaranthus hybridus</i>	Gewone misbredie
<i>Amaranthus spinosus</i>	Doringmisbredie
<i>Amaranthus thunbergii</i>	Rooimisbredie
<i>Chenopodium carinatum</i>	Groen hondebossie
<i>Cleome monophylla</i>	Rusperbossie
<i>Commelina benghalensis</i>	Bengaalse wandelende Jood
<i>Cyperus esculentus</i>	Geeluintjie
<i>Galinsoga parviflora</i>	Knopkruid
<i>Nicandra physaloides</i>	Basterappellifie
<i>Portulaca oleracea</i>	Varkkos

### **NOTAS:**

Die wissellvallige beheer van die bogenoemde onkruide is afhanglik van omgewingstoestande en die dosis van die toediening. Die voor-opkoms beheer van *Cyperus esculentus* is afhanglik van die volgende:

- Waar 'n dosis keuse gegee word, gebruik die hoër dosis.
- Aanplanting in 'n ferm of fyn saadbed moet voorafgegaan word deur 'n diep ploeg.
- **ULTRAMOC XTRA EC** moet toegedien word binne 2 dae van die plantproses.
- Genoeg aanhoudende reën of besproeing (ten minste 15 mm op ligte gronde en 25 mm op swaar gronde) moet binne 7 dae van bespuiting val sodat die onkruiddoder geloog kan word tot in die ontkiemingsgebied
- Geeluintjie sal nie beheer word nie by die verlaagde dosis wat aanbeveel word in Tabel 4.
- Addisionele onkruide sal beheer word wanneer **ULTRAMOC XTRA EC** toegedien word in kombinasie met ander onkruiddoders wat in hierdie etiket genoem word. Verwys na die onkruid lyste op die betrokke etikette.

Om die spektrum van breëblaaronkruide wat beheer word te verhoog, word dit aanbeveel om van óf tenkmengsels óf opvolg-bespuiting van standaard geregistreerde breëblaar onkruiddoders gebruik te maak in ooreenstemming met die vervaardiger se etiket aanbevelings.

Die registrasiehouer aanvaar geen verantwoordelikheid aan, vir onkruide wat nie gelys is nie.

## ERKENNING VAN HANDELSMERKE

**Combozine SC**

Tsunami Plant Protection (Edms.) Bpk

**Premiere, Cyclone, Cyclone Elite, Equate**

Meridian Agrochemical Company (Edms.) Bpk

**Unimoc EC, Atrazine 900 WG en Trooper SL**