25g, 50g, 100g, 500g, 600g, 1kg Box Label

# CAUTION

KEEP OUT OF REACH OF CHILDREN READ SAFETY DIRECTIONS BEFORE OPENING OR USING

# Sempra<sup>®</sup> Herbicide

ACTIVE CONSTITUENT: 750 g/kg HALOSULFURON-METHYL

GROUP HERBICIDE

For selective post-emergence control of Nutgrass in Sugarcane, Corn/Maize and Sorghum and for the selective post-emergence control of Nutgrass and Mullumbimby couch in Turf. Also for the control of Nutgrass in Cotton using shielded sprayers.

# IMPORTANT: READ THE ENCLOSED BOOKLET BEFORE USE

NET CONTENTS: 25g, 50g, 100g, 500g, 600g, 1kg

Nufarm Australia Limited ACN 004 377 780 103-105 Pipe Road Laverton North Victoria 3026 Tel:(03) 9282 1000 Fax: (03) 9282 1001



25g, 50g, 100g, 500g, 600g, 1kg Box Label

#### STORAGE AND DISPOSAL

Store in the closed, original container in a cool, wellventilated area. DO NOT store for prolonged periods in direct sunlight. Rinse containers before disposal. Add rinsings to spray tank. DO NOT dispose of undiluted chemicals on site. Dispose of at a local authority landfill. If no landfill is available, bury the containers below 500mm in a disposal pit specifically marked and set up for this purpose clear of waterways, desirable vegetation and tree roots. Empty containers and product should NOT be burnt.

#### SAFETY DIRECTIONS

Harmful if swallowed. Dust will irritate the eyes. Avoid contact with eyes and skin. Wash hands after use.

#### **FIRST AID**

If poisoning occurs, contact a doctor or Poisons Information Centre. Phone Australia 13 11 26.

#### MATERIAL SAFETY DATA SHEET

For further information refer to the Material Safety Data Sheet (MSDS)

## ONLY IN EMERGENCY CALL 1 800 033 498 ALL HOURS

#### **CONDITION OF SALE**

"Any provisions or rights under the Trade Practices Act 1974 or relevant state legislation which cannot be excluded by those statutes or by law are not intended to be excluded by these conditions of sale. Subject to the foregoing, all warranties, conditions, rights and remedies, expressed or implied under common law, statute or otherwise, in relation to the sale, supply, use or application of this product, are excluded. Nufarm Australia Limited and/or its affiliates ("Nufarm") shall not accept any liability whatsoever (including consequential loss), or howsoever arising (including negligence) for any damage, injury or death connected with the sale, supply, use or application of this product except for liability which cannot be excluded by statute."

APVMA Approval No.: 56620/25g/0406 APVMA Approval No.: 56620/50g/0406 APVMA Approval No.: 56620/100g/0406 APVMA Approval No.: 56620/500g/0406 APVMA Approval No.: 56620/600g/0406 APVMA Approval No.: 56620/1kg/0406

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# Sempra<sup>®</sup> Herbicide

# **ACTIVE CONSTITUENT:** 750 g/kg HALOSULFURON-METHYL

# GROUP HERBICIDE

For selective post-emergence control of Nutgrass in Sugarcane, Corn/Maize and Sorghum and for the selective post-emergence control of Nutgrass and Mullumbimby couch in Turf. Also for the control of Nutgrass in Cotton using shielded sprayers.

# DIRECTIONS FOR USE **RESTRAINTS:**

DO NOT apply more than 200 g/ha per season. DO NOT apply after the onset of frosts. DO NOT apply this product through any type of irrigation system.

DO NOT apply if heavy rain is expected within at least 48 hours.

# TURF (ALL STATES, ACT, NT)

SITUATION	WEEDS CONTROLLED	RATE	CRITICAL COMMENTS
Established Turf as named: Bent grass Buffalo grass Carpet grass Couch Couch hybrid Durban grass Kikuyu grass Perennial ryegrass Queensland blue couch Tall fescue	Mullumbimby couch Nutgrass	65-130 g/ha	Use the higher rate for dense infestations. Apply to actively growing weeds when new leaf growth has reached a minimum of 5cm on Nutgrass or 2cm on Mullumbimby couch. Apply using a boom spray with flat fan nozzles to apply at least 80 L/ha of water. Apply follow-up treatments if sufficient new growth warrants re-treatment. For optimum control, mowing should be delayed for 2 days following treatment. Use of this product on newly seeded, sodded, or sprigged turfgrass that is not well established may result in damage and/or delay establishment.
		1.3 g/ 100sq m	In addition, application to turf weakened by weather conditions or by physical damage due to intensive use or cultural practices such as scarification, coring, aeration or top-dressing, may result in damage and/or delayed recovery. For spot treatment using handgun or knapsack sprayers, apply 1.3 g Sempra per 100 square meters. For example, mix 1.3 g Sempra in 10L of water and apply 10L of the mix per 100 square meters.

# SUGARCANE (NSW AND QLD ONLY)

SITUATION	WEEDS CONTROLLED	RATE	CRITICAL COMMENTS
Plant and ratoon Sugarcane	Nutgrass	65-130 g/ha	Use the higher rate for dense infestations or for maximum control where a single application is intended. Follow-up treatments may be required to control plants emerging from dormant tubers. Apply using a boom spray with flat fan nozzles or flood jets to apply at least 80 L/ha as a broadcast, or directed treatment in Sugarcane. Avoid streaking, skips or overlaps during application. Cultivation should be delayed for at least 2 days following treatment.
		1.3 g/100 sq m	For spot treatment using handgun or knapsack sprayers, apply 1.3 g Sempra per 100 square meters. For example, mix 1.3 g Sempra in 10L of water and apply 10L of the mix per 100 square meters.

# CORN/MAIZE (ZEA MAYS, ALL STATES, ACT, NT)

SITUATION	WEEDS CONTROLLED	RATE	CRITICAL COMMENTS
Maize/Corn	Nutgrass	65-130 g/ha	Use the higher rate for dense infestations or for maximum control where a single application is intended. Apply post emergence to crop at any time up to a crop height of 60cm. Apply using a boom spray with flat fan nozzles or flood jets to apply at least 80 L/ha as a broadcast or directed treatment. Time treatment to ensure maximum emergence of Nutgrass when majority of plants are 3-4 leaf stage. Some transient yellowing and growth reduction of crop may occur at higher rate. DO NOT apply Sempra to sweetcorn or popcorn. DO NOT apply Sempra herbicide to corn/maize if the crop is under severe stress due to drought, water saturated soil, low fertility (especially low nitrogen levels) or other poor growing conditions.

# SORGHUM (NSW AND QLD ONLY)

SITUATION	WEEDS CONTROLLED	RATE	CRITICAL COMMENTS
Sorghum	Nutgrass	65-130 g/ha	Use the higher rate for dense infestations or for maximum control where a single application is intended. Apply using a boom spray with flat fan nozzles or flood jets to apply at least 80 L/ha as a broadcast or directed treatment. Time treatment to ensure maximum emergence of Nutgrass when majority of plants are 3-4 leaf stage. Apply post emergence to crop at any time up to a crop height of 60cm. DO NOT apply more than 200 g/ha per season. Apply as a directed spray if using rates greater than 65 g/ha. Some transient yellowing and growth reduction of crop may occur at higher rate.

# COTTON (NSW AND QLD ONLY)

SITUATION	WEEDS CONTROLLED	RATE	CRITICAL COMMENTS
Shielded sprayer application in irrigated cotton only.	Nutgrass	65-130 g/ha	Use the higher rate for dense infestations or for maximum control where a single application is intended. Apply Sempra to Nutgrass growing between Cotton rows using a shielded sprayer. Apply in crops at least 20cm high but before first flower. Spray or spray drift which contacts any part of the cotton plant may cause severe injury. Follow-up treatments may be required to control plants emerging from dormant tubers. Cultivation should be delayed for at least 2 days following treatment. The first irrigation after spraying should be delayed for as long as possible to minimise herbicide runoff.
Shielded or directed handgun or knapsack application		1.3 g/ 100sq m	For spot treatment using shielded or directed handguns or knapsack sprayers. DO NOT apply in crops less than 20cm high. Spray or spray drift which contacts any part of the cotton plant may cause severe injury. Apply 1.3 g Sempra per 100 square meters. For example, mix 1.3 g Sempra in 10L of water and apply 10L of the mix per 100 square meters.

# NOT TO BE USED FOR ANY PURPOSE, OR IN ANY MANNER, CONTRARY TO THIS LABEL, UNLESS AUTHORISED UNDER APPROPRIATE LEGISLATION.

# WITHHOLDING PERIOD

HARVEST

**TURF:** DO NOT USE CLIPPINGS FROM TREATED AREAS FOR MULCHING AROUND VEGETABLES OR FRUIT TREES. DO NOT FEED GRASS CLIPPINGS FROM TREATED AREAS TO POULTRY OR OTHER LIVESTOCK. **ALL OTHER CROPS:** WITHHOLDING PERIOD NOT REQUIRED WHEN IS USED AS DIRECTED.

# GRAZING

**SORGHUM:** DO NOT GRAZE LIVESTOCK OR CUT FOR FODDER OF FORAGE FOR FOUR WEEKS AFTER TREAMENT.

TURF: DO NOT ALLOW GRAZING OF TREATED TURF.

ALL OTHER CROPS: WITHHOLDING PERIOD NOT REQUIRED WHEN USED AS DIRECTED.

# Sempra Herbicide

# GENERAL INSTRUCTIONS

Sempra is a dry flowable granule which disperses in water. Sempra can be used for selective postemergence control of Nutgrass in Sugarcane, Corn/Maize and Sorghum and for the selective post emergence control of Nutgrass and Mullumbimby couch in Turf. Sempra may also be used for the control of Nutgrass in Cotton using shielded sprayers. Symptoms of weed control are a gradual yellowing of foliage and seed heads followed by desiccation. Initial symptoms may take 7-10 days to be noticeable, with full effects occurring 4 to 6 weeks after treatment. Sempra should be applied to actively growing weeds when new growth has reached a minimum of 5cm of new leaf growth for Nutgrass or 2cm for Mullumbimby couch. Apply follow-up treatments if sufficient new growth warrants re-treatment. Irrigation or rainfall within two hours of application will reduce control. Drought stress after treatment may also reduce control.

# **RESISTANT WEEDS WARNING**

# GROUP B HERBICIDE

Sempra Herbicide inhibits acetolactate synthase and therefore is a member of the sulfonylurea group of herbicides. When considering resistant weed management, Sempra Herbicide is a Group B herbicide. Some naturally occurring weed biotypes resistant to Sempra Herbicide and other Group B herbicides may exist through normal genetic variability in any weed population. Resistant weeds can eventually dominate the weed population if Group B herbicides are used repeatedly and as a consequence, resistant weeds will not be controlled by Sempra Herbicide or any other Group B herbicides. Since development of resistant weeds is difficult to detect prior to herbicide use, Nufarm accepts no liability for any losses that may result from the failure of Sempra Herbicide to control resistant weeds.

# MIXING

Sempra is a dry flowable granule that disperses in water. Add the measured amount gradually to a partfilled spray tank while maintaining continuous bypass agitation. Add the surfactant near the end of the filling process to avoid excessive foaming. Remove the hose from the mixing tank immediately after filling to avoid siphoning back into the water source. If allowed to stand, ensure that the mixture is thoroughly agitated before re-commencing spraying. Use the mixture within one day.

# SPRAYER CLEANUP

Before application of products other than Sempra the sprayer must be cleaned out as follows:

- 1. Drain the tank and flush equipment with water for a minimum of 10 minutes, including hoses, filters and booms.
- 2. Fill the tank with clean water and add chlorine bleach (contains 4% chlorine) at the rate of 300mL/100L of water. Flush through the boom and agitate for 15 minutes.
- 3. Repeat step 2 above.
- 4. Remove all nozzles and screens and clean thoroughly.

5. To remove traces of chlorine bleach, rinse the tank thoroughly with clean water and flush through hoses and booms.

**<u>Caution</u>:** Do not use chlorine bleach with ammonia. All traces of liquid fertilizer containing ammonia, ammonium nitrate or ammonium sulphate must be rinsed with water from the mixing and application equipment before adding chlorine bleach solution. Failure to do so will release a gas with a musty chlorine odour which can cause eye, nose, throat and lung irritation. Do not clean equipment in an enclosed area.

# SURFACTANT ADDITION

Sempra must be applied with a non-ionic surfactant to ensure uptake. Use 200mL/100L of a 600g/L non-ionic surfactant or equivalent. For hand-gun or knapsack application, add surfactant at 20mL/10L of water.

# COMPATIBILITY

Sempra is compatible with Roundup<sup>®</sup>, Roundup<sup>®</sup> CT, Roundup PowerMAX<sup>®</sup> and Roundup<sup>®</sup> Dry, Hoegrass, dicamba/MCPA and bromoxynil/MCPA mixtures and amine formulations of 2,4-D. Read and follow all label directions, restraints, plant-back periods, withholding periods, regional use restrictions and safety directions for the tank mix products. Tank mixing with paraquat or ametryn may result in reduced weed control. Organophosphate insecticides should not be tank-mixed or applied 7 days prior or 3 days after application of Sempra, as severe crop injury may result.

# **FOLLOWING CROPS**

The following crops may be planted at specific time intervals following application of approved rates of Sempra in approved situations. Use the time intervals listed below to determine the required time interval before planting.

Crop	Plant back interval after the last application of Sempra
Corn/Maize, Sorghum and Sugarcane	2 months
Wheat	3 months
Cotton	4 months
All other crops (except sugarbeet)	24 months
Sugarbeet	36 months

# PROTECTION OF CROP, NATIVE AND OTHER NON-TARGET PLANTS

Avoid spraying of non-target vegetation. In turf, do not use clippings from treated areas for mulching around vegetables or fruit trees. DO NOT apply under weather conditions or from spraying equipment, that may cause spray to drift onto nearby susceptible plants/crops, cropping lands or pastures. After spraying, the first flush irrigation tailwater or stormwater run-off from land treated with Sempra should be prevented from entering waterways. Where farms do not have the capacity to retain run-off, DO NOT irrigate to the point of run-off for at least 6 days after application.

#### Sempra Herbicide

## **PROTECTION OF LIVESTOCK, WILDLIFE, FISH, CRUSTACEA, THE ENVIRONMENT AND OTHERS** DO NOT contaminate dams, rivers or streams with the product or used container. DO NOT feed grass

the product or used container. DO NOT feed grass clippings from treated areas to poultry or other livestock or allow grazing of treated turf. Keep people and pets off treated areas until the spray solution has dried. Sempra is very highly toxic to duckweed.

#### STORAGE AND DISPOSAL

Store in the closed, original container in a cool, wellventilated area. DO NOT store for prolonged periods in direct sunlight. Rinse containers before disposal. Add rinsings to spray tank. DO NOT dispose of undiluted chemicals on site. Dispose of in a local authority landfill. If no landfill is available, bury the containers below 500mm in a disposal pit specifically marked and set up for this purpose clear of waterways, desirable vegetation and tree roots. Empty containers and product should NOT be burnt.

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APVMA Approval No.: 56620/0406

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