

SAFETY DATA SHEET

RECLAIM[®] BRUSHKILLER

SECTION 1: IDENTIFICATION OF THE SUBSTANCE AND COMPANY

1.1 Identifiers

Product name: Reclaim[®] Brushkiller
Other Name(s): Emulsifiable concentrate containing 300 g/L triclopyr (as the acid) and 100 g/L picloram (as the acid)

1.2 Recommended use of the chemical and restrictions on use

Product Use: Herbicide for control of a range of brushweeds.

1.3 Supplier contact details:

Company name: Grosafe Chemicals Limited
Address: 20 Jean Batten Drive Mt Maunganui, 3116
Telephone: 0800 220 002
Email: info@grosafe.co.nz

Emergency telephone number 0800 CHEMCALL (0800 243 622)

SECTION 2: HAZARD IDENTIFICATION

2.1 Classification of the Hazardous Chemical

Hazardous substance according to Hazardous Substances and New Organisms (HSNO) Act 1996; Hazardous Substances (Hazard Classification) Notice 2020:

Substance Approval: HSR002485

Hazard Classifications: Acute oral toxicity Category 4; Eye irritation Category 2; Skin sensitisation Category 1; Specific target organ toxicity – repeated exposure Category 2; Hazardous to the aquatic environment acute Category 1; Hazardous to the aquatic environment chronic Category 1; Hazardous to soil organisms; Hazardous to terrestrial vertebrates.

2.2 Label elements:

Pictograms:



Signal Word: WARNING

Hazard statements:

H302	Harmful if swallowed.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H373	May cause damage to organs through prolonged or repeated exposure.
H400	Very Toxic to aquatic life.



H410 Very toxic to aquatic life with long lasting effects.
Hazardous to soil organisms
Harmful to terrestrial vertebrates.

Precautionary statements:

Prevention

P102 Keep out of reach of children.
P103 Read label before use.
P260 Do not breathe mist/spray/vapours.
P264 Wash hands and any exposed skin thoroughly after handling.
P270 Do not eat, drink or smoke when using this product.
P272 Contaminated work clothing should not be allowed out of the workplace.
P280 Wear protective gloves, protective clothing and eye/face protection.

Response

P101 If medical advice is needed, have product container or label at hand.
P301 + P312 IF SWALLOWED: Call a Poison Centre or doctor if you feel unwell.
P330 Rinse mouth.
P302 + P352 IF ON SKIN: Wash with plenty of soap and water.
P332 + P313 If skin irritation or rash occurs: Get medical advice/attention.
P314 Get medical advice/attention if you feel unwell.
P262 + P364 Take off contaminated clothing and wash it before reuse.
P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P337 + P313 If eye irritation persists, get medical advice/attention.
P391 Collect spillage.

Storage

Disposal

P501 Dispose of contents/container in accordance with local regulations.

Additional labelling statements required under Hazardous Substances (Labelling) Notice 2017.

Do not apply directly into or onto water.

Take all reasonable steps to ensure that the substance does not cause any significant adverse effects to the environment beyond the application area.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Ingredients	CAS	Proportion g/L
Triclopyr butoxyethyl ester	64700-56-7	417.0*
Picloram	1918-02-1	100.0**
Other ingredients	Trade secret	balance

* equivalent to 300 g/L triclopyr acid

** present as picloram hexyloxypropylamine

This is a commercial product whose exact ratio of components may vary slightly.

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures

General Information:

For advice, or if you feel unwell, call the National Poisons Centre, telephone 0800 POISON [0800 764 766] or a doctor. Have product container or label at hand.

IF SWALLOWED: Rinse mouth. Call a Poison Centre or doctor if you feel unwell.

IF ON SKIN: Wash with plenty of soap and water. Take off contaminated clothing and wash it before reuse. If skin irritation or rash occurs: Get medical advice/attention.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists, get medical advice/attention.

IF INHALED: Remove person to fresh air and keep comfortable for breathing. Get medical advice/attention if you feel unwell.

4.2 Symptoms caused by exposure

None specified.

4.3 Medical attention and special treatment

Treat symptomatically.

SECTION 5: FIRE FIGHTING MEASURES

5.1 Suitable extinguishing media

Use water spray or fog, alcohol resistant foam, dry powder or carbon dioxide. Contain to prevent runoff into drains, sewers, waterways.

5.2 Specific hazards arising from the chemical

Fire decomposition products (carbon oxides, hydrogen cyanide, nitrogen oxides) may be toxic if inhaled.

5.3 Special protective equipment and precautions for fire fighters

Wear full personal protective equipment including with self-contained breathing apparatus (SCBA).

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

In the event of an accidental spill, wear full protective clothing including respiratory, eye and face protection. Wash contaminated personal protective equipment and clothing, and dry before re-use.

6.2 Environmental precautions

Prevent spillage from entering drains or waterways. If contamination of drains, streams, watercourses, etc. is unavoidable, warn the local water authority.

6.3 Methods and materials for containment and cleaning up

Contain spilled material. For small liquid spills, use inert absorbent material, such as sand or vermiculite, and recover into labelled drums that can be sealed for safe disposal. For large liquid spills, recover liquid into labelled containers then absorb remaining liquid and transfer to drums for disposal. Clean area with water and detergent.

Dispose of contaminated materials to approved landfill in accordance with local regulations.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling

Read the label before use. Do not handle until all safety precautions have been read and understood. To be used by people who are suitably trained and appropriately supervised.

Do not apply into or onto water.



Take all reasonable steps to ensure that the substance does not cause any significant adverse effects to the environment beyond the application area.

Avoid ingestion and contact with skin and eyes. Avoid inhalation of dust/mist/aerosols. Wear protective equipment such as coat/trouser (overalls), head protection, boots, gloves and eye protection. Wash hands and exposed skin with soap and water after handling and before rest or meal breaks. Do not use spray equipment contaminated with this product for any other purpose unless first thoroughly cleaned with a suitable cleaning detergent.. Do not use spray equipment contaminated with this product for any other purpose unless first thoroughly cleaned with a suitable alkaline cleaning detergent.

7.2 Conditions for safe storage

Store in the closed original packaging out of reach of children and in a dry, cool, well-ventilated area. Keep away from food, drink and animals feeding stuffs.

Signage, emergency response plan and secondary containment required when storing more than 100 L.

SECTION 8: EXPOSURE CONTROLS AND PERSONAL PROTECTION

8.1 Control parameters – exposure standards, biological monitoring

Ingredient	TWA (mg/m ³)	STEL (mg/m ³)
Picloram	10	-

Exposure limits have not been established for any of the significant ingredients in this product. No biological limits applicable.

8.2 Engineering controls

Use outdoors or in a well-ventilated area.

8.3 Personal protective equipment (PPE)

The following Standards provide general advice regarding safety clothing and equipment:

Respiratory equipment: **AS/NZS 1715**, Protective Gloves: **AS 2161**, Occupational Protective Clothing: **AS/NZS 4501**, Industrial Eye Protection: **AS1336** and **AS/NZS 1337**, Occupational Protective Footwear: **AS/NZS2210**.

Eye/Face Protection: Wear protective glasses or goggles when mixing or applying product.

Skin Protection: Wear impervious gloves, coat, trousers, waterproof hat. Ensure all skin areas are covered.

Respirator: Where product is being sprayed and a mist could be produced a respirator should be worn. It should be fitted with a type G cartridge, suitable for agricultural chemicals.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Appearance	Clear yellowish- brown liquid
Odour	Slight
Odour threshold	Not known
pH	4.5 – 6.5
Melting/Freezing Point	No data available
Boiling Point /Range	Not applicable
Flash point	> 93 deg. C
Flammability (solid, gas)	Not applicable
Upper/lower flammability or explosive limits	No data available
Vapour Pressure	No data available
Vapour density	No data available



Specific gravity	1.1 – 1.2 g/ml
Solubility	Emulsifies in water
Partition Co-efficient n-octanol/water	No data available
Auto-ignition temperature	No data available
Decomposition temperature	No data available
Viscosity	Not applicable
Particle characteristics	Not applicable

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity

This product is unlikely to react or decompose under normal storage conditions.

10.2 Chemical stability

Stable under normal temperatures and pressure for storage and use.

10.3 Conditions to Avoid

Store in the closed original container in a dry, cool, well-ventilated area and out of direct sunlight.

10.4 Incompatible materials and possible hazardous reactions

Incompatible with explosives, oxidising agents, organic peroxides.

10.5 Hazardous decomposition products

Fire Decomposition: Carbon monoxide, carbon dioxide, hydrogen chloride, phosgene, nitrogen oxides and other unspecified compounds.

Polymerisation: This product will not undergo polymerisation reactions.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1 Health hazard information

The product is classified for health hazards according to an assessment of information on product.

11.2 Toxicological information

Acute toxicity:	Product is classified as acutely toxic by oral exposure. .
Aspiration hazard:	Product contains no solvents identified as aspirant hazard.
Respiratory irritation:	Not classified.
Skin corrosion/irritation	Not classified.
Serious eye damage/irritation	Product is classified as eye irritant.
Respiratory or skin sensitisation	Product is classified as contact skin sensitizer.
Germ cell mutagenicity:	No ingredients in product classified as presumed or suspected mutagens.
Carcinogenicity	No ingredients in product classified as presumed or suspected carcinogens.
Reproductive toxicity	No ingredients in product classified as presumed or suspected of impairing fertility or the unborn child
Specific target organ toxicity – single/repeated exposure	Classified for target organ toxicant through prolonged or repeated. Both triclopyr and picloram may cause damage to renal function (kidneys).
Narcotic effects	Product contains no ingredient identified as causing narcotic effects.

11.3 Toxicological data:

Triclopyr butoxyethyl ester	Oral, LD ₅₀ 803 mg/kg b.w. (species not identified)
Picloram	Oral, mouse LD ₅₀ 1061 mg/kg b.w.



SECTION 12: ECOLOGICAL INFORMATION

12.1 Ecotoxicity

This product is classified as being very toxic to aquatic life with long lasting effects, hazardous to soil organisms, and hazardous to terrestrial vertebrates.

Triclopyr butoxyethyl ester	Bluegill sunfish LC ₅₀ (96 h) 0.36 mg/L <i>Daphnia magna</i> LC ₅₀ (48 hr) 1.7 mg/L Eastern oyster, <i>Crassostrea virginica</i> EC ₅₀ (96 hr) 0.46 mg/ Freshwater diatom, <i>Navicula palliculosa</i> EC ₅₀ (24 hr) 0.10 mg/L Alfalfa, EC ₂₅ 0.0129 mg/kg Bird (Bobwhite quail) LD ₅₀ (21 days) 735 mg/kg
Picloram	Lake trout, <i>Salvelinus namaycush</i> , LC ₅₀ (96 hr) 1.55 mg/L <i>Scenedesmus subcapitata</i> , EC ₅₀ (72h) 36.79 mg/L Honey bee, <i>Apis mellifera</i> LC ₅₀ (48 hr) 14.5 µg/bee <i>Daphnia magna</i> LC ₅₀ (21 days) 14.6 mg/L

12.2 Environmental Fate

Breakdown in soil and groundwater: No specific information available on product.

The DT50 for triclopyr is >30 days.

Triclopyr butoxyethyl ester KOC = 557.3

Picloram KOC = 18.1

Bioaccumulation: No specific information available on product.

Triclopyr butoxyethyl ester Log_{POW} = 4.4529

Picloram Log_{POW} = 1.3599

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Product Disposal

Refer to product label. If possible, dispose of by using according to the label directions. Otherwise dispose of to Agrecovery® chemical recovery service or at an approved landfill in accordance with local regulations.

13.2 Container Disposal

Refer to product label. Do not use packaging for storage of any other products. Triple rinse empty container and add rinsate to spray tank. Submit container to Agrecovery® for recycling, or crush and send to approved landfill.

SECTION 14: TRANSPORT INFORMATION

Road and Rail Transport:

Classified as Dangerous Good Class 9 according to NZS5433 Transport of Dangerous Goods on Land

Marine Transport (IMO/IMDG):

Classified as Dangerous Good Class 9 by the criteria of the International Maritime Dangerous Goods Code (IMDG Code) for transport by sea.

**Air Transport (ICAO/IATA):**

Classified as Dangerous Good Class 69 by the criteria of the International Air Transport Association (IATA) Dangerous Goods Regulation for transport by air.

UN Number: 3082

UN Proper Shipping Name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S (TRICLOPYR, PICLORAM)

Transport hazard class(es) 9

Packing Group: III

Special Precautions for User:

IMDG Marine pollutant: Yes

Transport in Bulk: Not available

SECTION 15: REGULATORY INFORMATION

15.1 HSNO Act 1996

Hazardous substance according to Hazardous Substances (Hazard Classification) Notice 2020.

Approved substance number: HSR002485

Hazard classifications: Acute oral toxicity Category 4; Eye irritation Category 2; Skin sensitisation Category 1; Specific target organ toxicity – repeated exposure Category 2; Hazardous to the aquatic environment acute Category 1; Hazardous to the aquatic environment chronic Category 1; Hazardous to soil organisms; Hazardous to terrestrial vertebrates.

Controls: Refer to HS Notices (www.epa.govt.nz) and HSW HS Regulations (www.worksafe.govt.nz)

Certified handler: Not applicable

Tracking: Not applicable

Qualifications: A person mixing, loading or applying this product must be suitably qualified or under the supervision of a suitably qualified person. Refer to Schedule 10 of the Hazardous Substances (Hazardous Property Controls) Notice 2017 for details.

International Agreements: Not applicable

Signage trigger quantity (Schedule 3): 100 L

Emergency Response Plan trigger quantity (Schedule 5): 100 L

Secondary Containment trigger quantity (Schedule 16): 100 L

Record Keeping: If 3 kg or more of the substance is applied within 24 hours, in a place where the substance is likely to enter air or water and leave the application area, a PCBU with management or control of the substance must ensure that a written record is kept of each application of the substance. Refer to section 48 of the Hazardous Substances (Hazardous Property Controls) Notice 2017 (Hazardous Property Controls) Notice 2017

Environmental exposure limits: None set

Tolerable exposure limits: None set

**15.2 ACVM Act 1997**

Registration number: P008982

Refer to www.foodsafety.govt.nz for registration conditions.**SECTION 16: OTHER INFORMATION****16.1 Date of preparation or last revision of SDS**

SDS issued	2 October 2023
SDS supersedes	27 th May 2020
Reason issued	Update to GHS.

16.2 ABBREVIATIONS

ADI	Acceptable Daily Intakes
CAS number	Chemical Abstracts Service Registry Number
CCID	Chemical Classification Identification Database
EPA	Environmental Protection Authority
ErC₅₀	Half maximal Effective Concentration
GHS	Globally Harmonized System of Classification and Labelling of Chemicals
Hazchem Code	Emergency action code of numbers and letters that provide information to emergency services especially firefighters
HSNO	Hazardous Substances and New Organisms
HS	Health and Safety
HSR	Hazardous Substances Register
IARC	International Agency for Research on Cancer
LC₅₀	Median Lethal Concentration
LD₅₀	Median Lethal Dose
SDS	Safety Data Sheets
NOAEL	No Observable Adverse Effect Level
NOEL	No Observable Effect Level
NOS	Not otherwise specified
STEL	Short Term Exposure Limit
SWA	Safety Work Australia
TWA	Time-Weighted Average
UN Number	United Nations Number

16.3 REFERENCES

Manufacturer information
 EPA CCID and Approved Substance databases
 University of Hertfordshire Pesticides Properties Database

16.4 OTHERReclaim[®] is a registered trademark of Grosafe Chemicals Ltd

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End of Safety Data Sheet