



## SAFETY DATA SHEET URAGAN 80 WG Herbicide

### Section 1: Identification of the Substance and Supplier

**Product name:** URAGAN 80 WG HERBICIDE  
**Chemical name of active Ingredient(s):** Bromacil: 5-brono-3-sec-butyl-6-methyluracil  
**Supplier:** ADAMA New Zealand Limited  
Level1/19 Elms Street, Wakatu Estate, Stoke, Nelson, New Zealand  
P.O. Box 1799, Nelson New Zealand.  
**Telephone:** +64 3 543 8275 Fax: +64 3 543 8274  
**Emergency Telephone:** 0800 POISON (0800 764 766) 24 Hour Service

### Section 2: Hazards Identification

**HAZARD CLASSIFICATIONS** 6.1D, 6.3B, 6.4A, 6.7B, 6.8B, 6.9B, 9.1A, 9.2A, 9.3C

#### TOXICITY

Warning –

May be harmful if swallowed, inhaled or absorbed through the skin

May cause eye irritation and mild skin irritation.

Suspected of causing cancer.

May cause reproductive/development damage from repeated oral exposure

Presumed to cause organ damage from repeated oral exposure at high doses.

Avoid contact with eyes and skin.

#### ECOTOXICITY

Very toxic to aquatic organisms. Avoid contamination of any water supply with product or empty container. Do not allow spray drift over aquatic environments.

Very toxic to the soil environment. Harmful to terrestrial vertebrates.

### Section 3. Composition/Information on Ingredients

**Substance/preparation :** Preparation

#### Information on hazardous ingredients \*

Common name	CAS No.	%	EC Number	Symbol	R-Phrases
Bromacil	314-40-9	78-82	206-245-1	-----	-----

\* *Occupational Exposure Limit(s), if available, are listed in section 8*

### Section 4: First-Aid Measures

**First-aid measures :** Remove victim from area of exposure. Wash off remaining material with plenty of water.

**Inhalation:** Remove victim to fresh air. If breathing is difficult: artificial respiration. Get medical attention.

**Ingestion:** Wash out mouth with plenty of water. Get medical attention. Never give anything by mouth to an unconscious person.

**Skin contact:** Remove contaminated clothing. Wash away remainder with water and soap.

**Eye contact:** Wash out with plenty of water with the eyelid held wide open for at least 15 minutes. Get medical attention.

**Notes to a physician:** There is no specific antidote. Treat symptomatically and give supportive therapy.

**Protection of first-aiders:** Use appropriate protection (see section 8).



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### Section 5: Fire-Fighting Measures

<b>Extinguishing media:</b>	For small fire: Dry chemical, water spray, carbon dioxide. For large fire: foam, water fog, water spray
<b>Hazardous thermal (de)composition products:</b>	Bromine compounds, nitrogen oxides (NO, NO <sub>2</sub> ...), carbon oxides (CO, CO <sub>2</sub> )
<b>Protection of fire-fighters:</b>	Self-contained breathing apparatus and total protection required in enclosed areas.

### Section 6: Accidental Release Measures

<b>Personal precautions:</b>	Wear suitable protective clothing.
<b>Environmental precautions:</b>	Do not discharge into drains or the environment.
<b>Methods for cleaning up:</b>	Absorb remainder in sand or other inert material. Dispose of in an authorized waste collection

### Section 7: Handling and Storage

<b>Handling:</b>	Ventilation is required. Keep out of reach of children. Do not eat, drink or smoke while using.
<b>Storage:</b>	Store in the original, unopened container in a cool, dry place, out of direct sunlight and away from stockfeed, seeds, fertilisers or foodstuffs. As a Class 9 Substance with Ecotoxicity Classifications storage of Uragan WG Herbicide must be carried out in such a manner as to prevent contamination of waterways. It is recommended that The New Zealand Standard for the Management of Agrichemicals (NZS8409) is followed as a means of meeting the secondary containment provisions of the HSNO Emergency Management Regulations.

### Section 8: Exposure Controls/Personal Protection

<b>Engineering measures:</b>	Ventilation is required.
<b>Hygiene measures:</b>	When handling do not eat, drink or smoke. Wash hands thoroughly after handling. Wash clothing separately before re-use.
<b>Occupational Exposure Limits TLV[mg/m<sup>3</sup>]</b>	Bromacil: 10
<b>Personal protective equipment:</b>	
<b>Respiratory system:</b>	Dust mask is required
<b>Skin and body:</b>	Wear suitable protective clothing and chemical resistant boots.
<b>Hands:</b>	Chemical resistant gloves
<b>Eyes:</b>	Safety goggles or face shield.

### Section 9: Physical and Chemical Properties

<b>Physical state:</b>	Granules
<b>Colour:</b>	Off-white
<b>Odour:</b>	Faint odour
<b>pH</b>	7-10
<b>Melting Point:</b>	158 -159°C (Bromacil)
<b>Bulk Density [g/cc]:</b>	0.53 ± 0.02
<b>Vapour pressure [mPa]:</b>	0.04 @ 25 °C (Bromacil)
<b>Solubility in water:</b>	Miscible
<b>Flammability:</b>	Not flammable
<b>LogP octanol/water:</b>	1.9 (Bromacil)
<b>Explosion properties:</b>	Not explosive
<b>Oxidation properties:</b>	Not oxidizing



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### Section 10: Stability and Reactivity

<b>Stability:</b>	Sable under normal conditions
<b>Materials to avoid:</b>	Oxidizing agents, acids and alkali.
<b>Hazardous decomposition products:</b>	Bromine compounds, nitrogen oxides (NO, NO <sub>2</sub> ...), carbon oxides (CO, CO <sub>2</sub> )

### Section 11: Toxicological Information

#### URAGAN 80 WG

<b>Rat Oral LD50 [mg/kg]:</b>	=1723
<b>Rat dermal LD50 [mg/kg]:</b>	> 2,000
<b>Rat inhalation LC50 [mg/l/4h]:</b>	>5.09
<b>Dermal irritation (rabbit):</b>	Mildly irritating
<b>Eyes irritation (rabbit):</b>	Mildly irritating
<b>Sensitisation:</b>	Non sensitiser
<b>Chronic toxicity:</b>	(Bromacil): NOEL (rat)=50 ppm (2 years)
<b>Carcinogenicity:</b>	(Bromacil): EPA Group C: possible human carcinogen EU: Not classified IARC: Not classified
<b>Mutagenicity:</b>	(Bromacil): Not mutagenic
<b>Reproductive toxicity:</b>	(Bromacil): NOEL (rat) = 250 ppm (3 generations)
<b>Teratogenicity:</b>	(Bromacil): NOEL (rat) = 20 mg/kg/day (maternal) = 75 mg/kg/day (fetal) NOEL (rabbit) = 100 mg/kg/day (Maternal and fetal)

### Section 12: Ecological Information

<b>Common name:</b>	<b>Bromacil</b>
<b>96H-LC50- Bluegill sunfish</b>	127 mg/l
<b>96 H-LC50 – Rainbow trout</b>	36 mg/l
<b>96 Hours – LC50-fish</b>	Carp = 164 mg/l
<b>48 H-EC50 – Daphnia magna</b>	121 mg/l
<b>72 H-EC50 Algae</b>	0.0068 mg/l
<b>LD50 Birds</b>	Bobwhite quail = 2,250 mg/l
<b>Birds LC50 [ppm]</b>	Mallard duck >10,000 Bobwhite quail > 10,000

**Persistence/degradability:** **Soil:**  
The product is persistent  
Half-life time (t<sub>1/2</sub>): 60 days  
Degradation is primarily via: microorganisms.

**Mobility:** Soil – moderately mobile  
Koc = 32 ml/g (Average)  
Kd = 0.2-1.8 ml/g.

### Section 13: Disposal Considerations

**Methods of disposal:** Puncture or shred and bury empty bags in a local authority landfill. If no landfill is available, bury the bags below 500 mm in a disposal pit specifically marked and set up for this purpose clear of waterways, desirable vegetation and tree roots. Empty bags and product should not be burnt. Dispose of the product only by using according to the label, or at an approved landfill. Do not contaminate ponds, waterways and ditches with product or used container.



## SAFETY DATA SHEET URAGAN 80 WG Herbicide

### Section 14: Transport Information

UN Number	3077
Proper shipping name	Environmentally hazardous substance, Solid, N.O.S, Bromacil
DG Class	9
Packing Group	III
Hazchem Code	2X
Marine Pollutant	Yes
IER Guide page	47

**National transport regulations:** Do not carry this product on a passenger service vehicle.

**Segregation:** Check the land transport Rule Dangerous Goods 1999, Rule 45001 for additional information. Sea transport may require additional segregation. Refer: NZS5433; Sea Segregation, or the International Maritime Dangerous Goods Code for details.

### Section 15: Regulatory Information

**HAZARD CLASSIFICATIONS** 6.1D, 6.3B, 6.4A, 6.7B, 6.8B, 6.9B, 9.1A, 9.2A, 9.3C

**New Zealand Regulatory Information:**

**NZFSA Approval:** Registered pursuant to the ACVM Act 1997, No. P7859  
See [www.nzfsa.govt.nz/acvm](http://www.nzfsa.govt.nz/acvm) for registration conditions

Approved pursuant to the HSNO Act 1996, Approval No. HSR007915  
See [www.ermanz.govt.nz](http://www.ermanz.govt.nz) for approval controls



**ECOTOXIC**

**APPROVED HANDLER** - This product must be under the care of an approved handler when it is applied in a wide dispersive manner or used by a commercial contractor.

**RECORD KEEPING** - Records of use must be kept under certain circumstances – see The New Zealand Standards for Management of Agrichemicals (NZS8409) for details.

### Section 16: Other Information

Note: This product is a registered agricultural chemical and must be therefore be used in accordance with the container label directions. A comprehensive package of toxicological and environmental data for the active ingredients of this product has been submitted to the Government health and environment authorities and has been evaluated by expert toxicologists and environmental scientists.

The information contained in the Safety Data sheet is correct to the best of our knowledge at the date of issue. It is intended as a guide for the safe use, handling, disposal, storage and transportation and is not intended as a warranty or as a specification. The information relates only to the product specified and may not be suitable for combinations with other materials or in processes other than those specifically described herein.

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#### **HISTORY**

**Date of printing:** 23/07/2014