SAFETY DATA SHEET

According to
HSNO Hazardous Substances (Safety Data Sheets) Notice 2017

Section 1: Identification of the Substance/Mixture and of the Supplier

Product:	**Multi Clean**
Product Use:	General Purpose Cleaner/Degreaser/ C31 Cleaner
Restriction of Use:	Refer to Section 15
Cmpany Details:	**Marketing Chemicals Ltd**
Address:	2 Rymer Place, Mangere Bridge Auckland. New Zealand
Telephone:	+64 9 634 3862 [8.00 am to 4.30pm – Monday to Friday]
Fax:	+64 9 634 3864
Emergency No:	**+64 274 736008(24 hours)** **0800 764 766 (National Poison Centre)**
Date of SDS Preparation:	29 August 2023 v2

Section 2: Hazard Identification

This substance is hazardous according to the EPA Hazardous Substances (Classification) Notice 2020

EPA Approval No: Cleaning Products (Corrosive) – HSR002526

Pictograms:

Signal Word: **DANGER**

GHS Classification and Category	Hazard Code	Hazard Statement
Skin corrosion Cat. 1B	H314	Causes severe skin burns and eye damage.
Serious eye damage Cat. 1	H318	Causes serious eye damage.
Hazardous to the aquatic environment chronic Cat. 3	H412	Harmful to aquatic life with long lasting effects.

Prevention Code	Prevention Statement
P102	Keep out of reach of children.
P103	Read carefully and follow all instructions.
P260	Do not breathe fumes, vapours or spray.
P264	Wash hands thoroughly after handling.
P273	Avoid release to the environment.
P280	Wear protective clothing as detailed in Section 8.

Response code	Response Statement
P312	Call a POISON CENTER or doctor/physician if you feel unwell.
P101	If medical advice is needed, have product container or label at hand.
P310	Immediately call a POISON CENTER or doctor/physician.
P363	Wash contaminated clothing before reuse.
P301 + P330+P331	IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

P303 + P361+P353	IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.
P304 + P340	IF INHALED: Remove to fresh air and keep at rest in a position comfortable for breathing.
P305 + P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Storage Code	**Storage Statement**
P405	Store locked up.

Disposal Code	**Disposal Statement**
P501	Refer to Section 13.

Section 3: Composition/Information on Ingredients

Ingredients	Wt%	CAS NUMBER.
2 Butoxy Ethanol	1 - 5	111-76-2
Sodium Metasilicate	3 - 8	10213-79-3
Nonionic Surfactant	5 - 10	9016-45-9
Water	To bal	7732-18-5

Section 4: First Aid Measures

Routes of Exposure:

If in Eyes	If medical advice is needed, have product container or label at hand. Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.
If on Skin	Take off contaminated clothing and wash before re-use. Rinse skin with water/shower. Immediately call a POISON CENTER or doctor/physician. If skin irritation occurs: Get medical advice/ attention.
If Swallowed	Rinse mouth. Do NOT induce vomiting. Never give liquid to a person showing signs of being sleepy or with reduced awareness; i.e. becoming unconscious. Immediately call a POISON CENTER or doctor/physician if you feel unwell.
If Inhaled	Remove person to fresh air. Remove contaminated clothing and loosen remaining clothing. Allow person to assume most comfortable position and keep warm. Keep at rest until fully recovered. Apply artificial respiration if not breathing. Get medical advice if breathing becomes difficult.

Most important symptoms and effects, both acute and delayed

Symptoms: Causes skin burns and eye damage.

Section 5: Fire Fighting Measures

Hazard Type	Non Flammable
Hazards from products	Burning can produce Carbon Monoxide &/or Carbon Dioxide
Suitable Extinguishing media	Dry Powder, Carbon Dioxide, Foam
Precautions for firefighters and special protective clothing	Wear full protective gear.
HAZCHEM CODE	**2X**

Section 6: Accidental Release Measures

Spillages will be slippery. If local regulations permit, mop up with plenty of water and run to waste, diluting with copious amounts of running water. Otherwise, absorb on inert medium, transfer to salvage containers and arrange removal by licensed disposal company. Wash site of spillage thoroughly with water. Ventilate area to dispel any residual vapor or odors.

Section 7: Handling and Storage

Handling:

- Read carefully and follow all instructions.
- Do not breathe fumes, vapours or spray.
- Wash hands thoroughly after handling.
- Avoid release to the environment.
- Wear protective clothing as detailed in Section 8.

Storage:

- Store in a cool, dry, well ventilated placed, out of the reach of children.
- Store locked up.
- Store in the original container tightly closed.
- Large quantities should be stored in a bunded area.
- Keep away from acids and oxidizing agents.
- Prevent vapours from collecting in low-lying or enclosed spaces.
- Protect from physical damage.

Section 8: Exposure Controls / Personal Protection

WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance	TWA ppm	TWA mg/m^3	STEL ppm	STEL mg/m^3
2-Butoxyethanol (skin) [111-76-2]	25	121	-	-

Workplace Exposure Standard – Time Weighted Average (WES-TWA). The time-weighted average exposure standard designed to protect the worker from the effects of long-term exposure. Workplace Exposure Standard – Short-Term Exposure Limit (WESSTEL). The 15-minute average exposure standard. Applies to any 15- Minute period in the working day and is designed to protect the worker against adverse effects of irritation, chronic or irreversible tissue change, or narcosis that may increase the likelihood of accidents. The WES-STEL is not an alternative to the WES-TWA; both the short-term and time-weighted average exposures apply. Workplace Exposure Standards and Biological Exposure Indices APRIL 2022 13TH EDITION.

Personal Protection Equipment

Engineering Controls: Local ventilation

Eye / Face Protection: Full face protection with side shields.

Body Protection: PVC overall and protective gloves.

Respiratory Protection: Not required.

Section 9: Physical and Chemical Properties

Appearance	Liquid
Colour	Clear Red
Odour	Not available
Odour Threshold	Not available

pH	12 - 13
Boiling Point	Not available
Melting Point	Not available
Freezing Point	Not available
Flash Point	Not available
Flammability	Not available
Upper and Lower Explosive Limits	Not available
Vapour Pressure	Not available
Vapour Density	Not available
Specific Gravity	1.04
Solubility in Water	Complete
Partition Coefficient:	Not available
Auto-ignition Temperature	Not available
Decomposition Temperature	Not available
Kinematic Viscosity	Not available
Particle Characteristics	Not applicable
Evaporation Rate	Not available

Section 10: Stability and Reactivity

Stability of the Substance: Stable under normal storage and use conditions.

Conditions to avoid: Oxidising agents and acids

Materials to avoid: Carbon dioxide/carbon monoxide

Hazardous Decomposition Products: No data available.

Conditions Contributing to Hazardous Polymerization Not known.

Section 11: Toxicological Information

Acute Effects:

Swallowed	Not applicable. REMARK: Ingestion of this chemical is the most common route of entry with subsequent corrosive injury of the gastrointestinal tract being the major concern rather than systemic absorption as for other toxins. Acute oral toxicity LD50 to rats is 1280 mg/kg as a 10% aqueous solution. (. Acute oral toxicity LD50 to mice is 2400 mg/kg as a 10% aqueous solution.
Dermal	Not applicable. LD50 = 1350mg/kg (rabbit)
Inhalation	Not applicable. LC50 = 2.21 mg/l (rat)
Eye	Causes serious eye damage.
Skin	Causes skin burns.

Chronic Effects:

Carcinogenicity	Not applicable.
Reproductive Toxicity	Not applicable.
Germ Cell Mutagenicity	Not applicable.
Aspiration	Not applicable.
STOT/SE	Not applicable.
STOT/RE	Not applicable.

Section 12: Ecotoxicological Information

Harmful to aquatic life with long lasting effects

Persistence and degradability	No data available
Bioaccumulation	No
Mobility in Soil	No data available
Other adverse effects	No data available

Ecological Toxicity:

SPECIES: Oncorhynchus mykiss (Fish, fresh water)
TYPE OF EXPOSURE: Static
DURATION: 96 hr
ENDPOINT: LC50
VALUE: 45.4 mg/l

Do not allow to enter waterways.

Section 13: Disposal Considerations

Disposal Method: Triple rinse and dispose of according to Local Regulations.

Precautions: Do not allow to enter waterways.

Section 14: Transport Information

This product is classified as a Dangerous Good for transport in NZ ; NZS 5433:2020

Road, Rail, Sea and Air Transport

UN No	3266
Class - Primary	8
Packing Group	III
Proper Shipping Name	**CORROSIVE LIQUID, BASIC, INORGANIC, N.O.S.**
Marine Pollutant	No
Special Provisions	If the product's individual container is below 5L, it can be transported as a non-DG as long as the product packaging is still labelled as per DG requirements and the driver is given safety information in accordance with Chapter 3.4 of the UNRTDG.

Section 15: Regulatory Information

This substance is classified hazardous according to the EPA Hazardous Substances (Classification) Notice 2020

EPA Approval Code: Cleaning Products (Corrosive) – HSR002526

HSW (HS) Regulations 2017 and EPA Notices	**Trigger Quantity**
Certified Handler	Not required
Location Certificate	250L
Tracking Trigger Quantities	Not required
Signage Trigger Quantities	250L
Emergency Response Plan	1000L
Secondary Containment	1000L
Restriction of Use	None known

Section 16: Other Information

Glossary

Cat	Category
EC_{50}	Median effective concentration.
EEL	Environmental Exposure Limit.
EPA	Environmental Protection Authority
HSNO	Hazardous Substances and New Organisms.
HSW	Health and Safety at Work.
LC_{50}	Lethal concentration that will kill 50% of the test organisms inhaling or ingesting it.
LD_{50}	Lethal dose to kill 50% of test animals/organisms.
LEL	Lower explosive level.
OSHA	American Occupational Safety and Health Administration.
TEL	Tolerable Exposure Limit.
TLV	Threshold Limit Value-an exposure limit set by responsible authority.
UEL	Upper Explosive Level
WES	Workplace Exposure Limit

References:

1. EPA Hazardous Substances (Safety Data Sheets) Notice 2017
2. Workplace Exposure Standards and Biological Exposure Indices April 2022 edition.
3. Assigning a hazardous substance to a HSNO Approval (Aug 2013).
4. Transport of Dangerous goods on land NZS 5433:2020
5. HSW (Hazardous Substances) Regulations 2017

Disclaimer

Marketing Chemicals Ltd has taken care in compiling this information. No liability is accepted directly or indirectly from its application as conditions of use are outside the Company's control. End users are obliged to conform to relevant Local Government regulations.

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Issue Date: 29 August 2023 Review Date: 29 August 2028