SAFETY DATA SHEET

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

Section 1. Identification of the material and the supplier

Product:	**Eclipse HD Heavy Duty Degreaser**
Product Use:	Water-based degreaser concentrate. Product intended for commercial and industrial use only.
Restriction of Use:	Refer to Section 15
New Zealand Supplier:	**Proquip NZ Ltd**
Address:	47 Fitzherbert Street Petone, Wellington
Telephone:	0800 277 678
Emergency No:	**0800 764 766 (National Poison Centre)**
Date of SDS Preparation:	2 October 2020

Section 2. Hazards Identification

This substance is hazardous according to the EPA Hazardous Substances (Classification) Notice 2017

EPA Approval No: Cleaning Products (Corrosive) – HSR002526

Pictograms

Corrosive

Signal Word: **DANGER**

HSNO Classification	Hazard Code	Hazard Statement	GHS Category
6.1E (oral)	H303	May be harmful if swallowed.	Acute Tox. 5
8.1A	H290	May be corrosive to metals.	Met. Corr. 1
8.2C	H314	Causes severe skin burns and eye damage.	Skin Corr. 1C
8.3A	H318	Causes serious eye damage.	Eye Corr. 1

Prevention Code	Prevention Statement
P102	Keep out of reach of children.
P103	Read label before use.
P234	Keep only in original container.
P260	Do not breathe fumes, vapours or spray.
P264	Wash hands thoroughly after handling.
P272	Contaminated work clothing should not be allowed out of the workplace.

P280	Wear protective clothing as detailed in Section 8.

Response Code	Response Statement
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.
P390	Absorb spillage to prevent material damage.
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.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.

Storage Code	Storage Statement
P405	Store locked up.
P406	Store in corrosive resistant container with a resistant inner liner.

Disposal Code	Disposal Statement
P501	Dispose of according to Local Regulations or Authorities

Section 3. Composition / Information on Hazardous Ingredients

Ingredients	Wt%	CAS NUMBER.
Ethylene Glycol Monobutyl Ether	3 - 7	111-76-2
Sodium Carbonate	1 - 5	497-19-8
Disodium Metasilicate	1 - 5	6834-92-0
Caustic Soda	1 - 5	1310-73-2

Section 4. First Aid Measures

Routes of Exposure:

If in Eyes — Rinse cautiously with water for 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.

If on Skin — Remove/Take off immediately all contaminated clothing and wash before reuse. Wash with plenty of soap and water. If skin irritation or rash occurs: get medical advice.

If Swallowed — Do not induce vomiting. Wash out mouth thoroughly with water. Never give anything to the mouth of an unconscious person. If vomiting occurs, place victim face downwards, with the head turned to the side and lower than the hips to prevent vomit entering the lungs. Seek medical attention if needed.

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:

Ingestion: May be harmful if swallowed. May cause burns to mouth, throat and stomach.

Inhalation:	May cause irritation and corrosive effects to nose, throat and respiratory tract.
Skin:	Causes skin burns and may cause an allergic skin reaction.
Eye:	Causes eye damage. May cause permanent damage.

Section 5. Fire Fighting Measures

Hazard Type	Non Flammable Liquid.
Hazards from products	CO, CO_2 During a fire, smoke may contain the original material in addition to combustion products of varying composition which may be toxic and/or irritating. Combustion products may include but not limited to the above mentioned substances.
Suitable Extinguishing media	In case of fire: use dry chemical, water spray, foam, carbon dioxide.
Precautions for firefighters and special protective clothing	As in any fire, wear self-contained breathing apparatus and suitable protective clothing including gloves and eye/face protection. Fire-fighters should wear clothing conforming to EN469 for chemical incidents. Materials can splatter above 100°C. Corrosive material.
HAZCHEM CODE	**2X**

Section 6. Accidental Release Measures

Put on personal protective equipment (see Section 8). Keep spectators away. Floors may be slippery; use care to avoid falling.

Keep spills and cleaning run-off out of sewers and open bodies of water.

Small spills: Absorb spill with inert material (e.g. sand, earth) and dispose of as waste material in accordance with local, state and federal regulations.

Large spills. Neutralize spill area. Dike and contain spill with inert material (e.g. sand, earth). Transfer liquid to containers for recovery or disposal and solid diking material to separate containers for disposal. Dispose of in accordance with Section 13.

Section 7. Handling and Storage

Precautions for Handling:

- Read label before use.
- Avoid contact with eyes, skin and clothing.
- Keep only in original container.
- Do not breathe fumes, vapours or spray.
- Wash hands thoroughly after handling.
- Do not eat, drink or smoke when using this product.
- Use only in well-ventilated areas
- Contaminated work clothing should not be allowed out of the workplace.
- Wear protective clothing as detailed in Section 8.

Precautions for Storage:

- Store away from incompatible materials listed in Section 10.
- Store locked up.
- Store in corrosive resistant container with a resistant inner liner.
- Storage temperature (Max. 60ºC - Min. 1ºC)
- Keep from freezing.
- Keep container sealed when not in use.
- Keep out of reach of children.

Section 8 Exposure Controls / Personal Protection

WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance	TWA ppm	TWA mg/m³	STEL ppm	STEL mg/m³
2-Butoxyethanol (skin) [111-76-2]	25	121	-	-
Sodium hydroxide [1310-73-2]	-	Ceiling 2	-	-

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 NOV 2019 11TH EDITION.

Engineering Controls

Use only with adequate ventilation. Use local ventilation and other engineering controls to maintain airborne contaminants below established and recommended exposure limits. If this product contains ingredients with exposure limits, monitoring may be required to determine the effectiveness of ventilation and other control measures.

Personal Protection Equipment

Eyes	Safety eyewear is recommended, to avoid chemical splashes and mists. Safety glasses or goggles (EN166).
Hands	Chemical resistant gloves are recommended. Breakthrough time > 480 mins. (E.g. - nitrile gloves, 0.4 mm thickness)
Skin	If major exposure is possible, wear suitable protection such as rubber boots, apron, etc.
Respiratory	Respiratory protection should be worn when there is a potential of inadequate ventilation. If exposure limits are exceeded or symptoms are experienced, use an approved respirator with multi-purpose combination filter. (E.g. - EN 14387- ABEK)
Hygiene Measure.	Handle in accordance with good industrial hygiene and safety practice.

Section 9 Physical and Chemical Properties

Appearance	Liquid
Colour	Clear dark purple
Odour	Sassafras
Odour Threshold	Not available
pH	12.5 [Method: ASTM E 70]
Boiling Point	Not available
Melting Point	Not available
Freezing Point	Not available
Flash Point	>93ºC (ASTM D56)
Flammability	Non Flammable
Upper and Lower Explosive Limits	Not available
Vapour Pressure	Not available
Relative Density	1.07 kg/l @ 20ºC [Method: Pycnometer, ASTM D 1475]
Water Solubility	Miscible in water
Partition Coefficient:	Not available
Auto-ignition Temperature	Not available
Decomposition	Not available

Temperature	
Viscosity	< 5 centipoise @ 20ºC
Particle Characteristics	Not available
VOC	5%(as supplied), 1.04%(1:4), 0.58%(1:8), 0.16%(1:32), 0.08%(1:64)
Evaporation Rate	Not available

Section 10. Stability and Reactivity

Stability of Substance	This product is stable under normal conditions.
Possibility of hazardous reactions	Product may react strongly with water. Care should be used if diluting; product should be slowly added to water.
Conditions to Avoid	Do not mix with other chemicals unless stated on the product label.
Incompatible Materials	Strong acids and oxidizing agents.
Hazardous Decomposition Products	None known. Refer to Section 5.

Section 11 Toxicological Information

Acute Effects:

Swallowed	May be harmful if swallowed. ATE mix (oral) = >2000 mg/kg
Dermal	Not triggered. ATE mix (dermal) = >2000 mg/kg
Inhalation	Not triggered. ATE mix (inhalation) - >20 mg/l (4 hr/vapour)
Eye	Causes serious eye damage.
Skin	Causes severe skin burns. May cause an allergic skin reaction.

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.

Component Information

Component	CAS #	LD50 Oral-Rat (mg/kg)	LD50 Dermal - Rabbit (mg/kg)	LC50 Inhalation-Rat
ethylene glycol monobutyl	111-76-2	1300	>2000	guinea pig (1hr), >3.1
sodium carbonate	497-19-8	4090	> 2000	(4hr) - 1.15 mg/l
disodium metasilicate	6834-92-0	995 - 1335	> 5000	(4hr) >2.06 mg/l
caustic soda	1310-73-2	220	rabbit, 1350	Not available

Section 12. Ecotoxicological Information

This product is not hazardous to the environment.

Toxicity

Component	CAS #	LC50 - 96 hr	LC/EC50 - 48 hr	EC50 - 72 hr
ethylene glycol monobutyl ether	111-76-2	vertebrate, 820-1490 mg/ml	vertebrate, 820-1490 mg/ml	algae, 911 mg/l
sodium carbonate	497-19-8	vertebrate, 300 mg/l	Daphnia magna, 265 mg/l	algae, 242 mg/l
disodium metasilicate	6834-92-0	vertebrate, 210 mg/l	Daphnia magna, 216 mg/l	algae, 207 mg/l
caustic soda	1310-73-2	vertebrate, 25 ppm	Daphnia magna, 100 ppm	not available

Persistence and degradability

Component	CAS #	Biodegradation
ethylene glycol monobutyl ether	111-76-2	readily biodegradable
sodium carbonate	497-19-8	inorganic substance
disodium metasilicate	6834-92-0	inorganic substance
caustic soda	1310-73-2	inorganic substance

Bioaccumulation

Component	CAS #	Partition coefficient n-octanol/water (LogKow)	Bioconcentration factor (BCF)
ethylene glycol monobutyl ether	111-76-2	0.81	< 100
sodium carbonate	497-19-8	not available	not available
disodium metasilicate	6834-92-0	not available	not available
caustic soda	1310-73-2	not available	not available

Mobility in Soil

Component	CAS #	Soil Organic Carbon-Water Partitioning Coefficient (Koc)
ethylene glycol monobutyl ether	111-76-2	67
sodium carbonate	497-19-8	not available
disodium metasilicate	6834-92-0	not available
caustic soda	1310-73-2	not available

Section 13. Disposal Considerations

Disposal Method:
Spent media that has removed toxic chemicals should be examined for specific hazards. Spilled product may be recovered for use if it has not come in contact with liquids or been exposed to significant amounts of gaseous contaminants. Dispose of according to Local Regulations.

Ensure any container holding waste product or contaminated spill media is labelled "Hazardous Waste – Corrosive" and that the label also has the Corrosive Pictogram, waste type identifier, and the business name, address, and phone number.

Precautions or methods to avoid: None known

Section 14 Transport Information

This product is classified as a Dangerous Good for transport in NZ ; NZS 5433:2012

Road, Rail, Sea and Air Transport

UN No	1760
Class - Primary	8
Packing Group	III
Proper Shipping Name	CORROSIVE LIQUID, N.O.S. (disodium trioxosilicate)
Marine Pollutant	No
Special Provisions	If the product's individual container is below 1L. 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 2017

EPA Approval Code: Cleaning Products (Corrosive) – HSR002526

HSNO Classification: 6.1E(oral), 8.1A, 8.2C, 8.3A

HSW (HS) Regulations 2017 and EPA Notices	Trigger Quantity
Certified Handler	Not required
Location Certificate	Not required
Tracking Trigger Quantities	Not required
Signage Trigger Quantities	1000L (8.1A, 8.2C, 8.3A)
Emergency Response Plan	10 000L (8.2C, 8.3A)
Secondary Containment	10 000L (8.2C, 8.3A)
Restriction of Use	Only use for the intended purpose.

Section 16 Other Information

Glossary

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 Nov 2017 edition.
3. Assigning a hazardous substance to a HSNO Approval (Aug 2013).
4. Transport of Dangerous goods on land NZS 5433:2012
5. HSW (Hazardous Substances) Regulations 2017

Disclaimer

This document has been prepared by TCC (NZ) Ltd and serves as the suppliers Safety Data Sheet ('SDS'). It is based on information concerning the product which has been provided to TCC (NZ) Ltd or obtained from third party sources and is believed to represent the current state of knowledge as to the appropriate safety and handling precautions for the product at the time of issue. Further clarification regarding any aspect of the product should be obtained directly from the manufacturer. While TCC (NZ) have taken all due care to include accurate and up-to-date information in this SDS, it does not provide any warranty as to accuracy or completeness. As far as lawfully possible, TCC (NZ) Ltd accept no liability for any loss, injury or damage (including consequential loss) which may be suffered or incurred by any person as a consequence of their reliance on the information contained in this SDS

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Please contact the New Zealand distributor, if further information is required.

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