SAFETY DATA SHEET

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

Product Name:	SODIUM HYPOCHLORITE
Proper Shipping Name	CORROSIVE LIQUID, BASIC, INORGANIC, N.O.S
Recommended use:	General Disinfection & Cleaning, Moss, Mould & Lichen Remover
Company 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 Telephone:	+64 274 340990(24 hours)
	National Poison Centre(24 hours): 0800 POISON [764 766]
Date of preparation	2 September 2024 v2

Section 2: Hazard Identification

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

EPA Approval No: Cleaning Product(Corrosive) - HSR002526

Pictograms

Corrosive Ecotoxic

Signal Word: **DANGER**

GHS Classification and Category	Hazard Code	Hazard Statement
Skin corrosion Cat. 1C	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. 2	H411	Toxic 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 dust, fumes, gas, mist, vapours or spray.
P264	Wash hands thoroughly after handling.
P273	Avoid release to the environment.
P280	Wear protective clothing as detailed in SDS 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.
P330	Rinse mouth.
P363	Wash contaminated clothing before reuse.
P391	Collect spillage.
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	Dispose of according to Local Regulations or Authorities

Section 3: Composition/Information on Ingredients

Name	% by Wt.	CAS Number
Sodium Hypochlorite	< 4-7	7681-52-9
Sodium Hydroxide	< 2.0	1310-73-2
Water & Sodium Chloride	Up to 100	7732-18-5

Section 4: First Aid Measures

Eyes: If medical advice is needed, have product container or label at hand. Immediately call a POISON CENTER or doctor/physician. Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Skin: Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. Wash contaminated clothing before reuse. Immediately call a POISON CENTER or doctor/physician.

Ingestion: Rinse mouth. Do NOT induce vomiting.

Inhalation: Remove to fresh air and keep at rest in a position comfortable for breathing.

Most important symptoms and effects, both acute and delayed

Symptoms:

Ingestion: Burns to mouth and throat, drooling
Inhalation: Coughing, chest pain
Skin: Skin burns
Eye: Vision loss

Section 5: Fire Fighting Measures

Hazard Type	Corrosive
Hazards from combustion products	Toxic fumes
Suitable Extinguishing media	Use media suitable for surrounding materials
Precautions for firefighters and special protective clothing	Liquid tight chemical suit
HAZCHEM CODE	**2X**

Section 6: Accidental Release Measures

Wear protective gear as detailed in Section 8. If there is a significant chance that vapours or mists are likely to build up in the cleanup area, we recommend that you use a respirator. Usually, no respirator is necessary when using this product. Evacuate all unnecessary personnel.

Do not allow to enter drains and water courses.

Stop leak if safe to do so, and contain spill. Absorb onto sand, vermiculite or other suitable absorbent material. If spill is too large or if absorbent material is not available, try to create a dike to stop material spreading or going into drains or waterways. Sweep up and shovel or collect recoverable product into labelled containers for recycling or salvage, and dispose of promptly. Recycle containers wherever possible after careful cleaning. After spills, wash area preventing runoff from entering drains. If a significant quantity of material enters drains, advise emergency services. This material may be suitable for approved landfill. Ensure legality of disposal by consulting regulations prior to disposal. Thoroughly launder protective clothing before storage or re-use. Advise laundry of nature of contamination when sending contaminated clothing to laundry. Dispose of in compliance with local and/or national regulations.

For non-emergency personnel:
Isolate leaks provided that there is no additional risk for the people performing this task. Evacuate the area and keep out those without protection. Personal protection equipment must be used against potential contact with the spilt product (See section 8).
Above all prevent the formation of any vapour-air flammable mixtures, through either ventilation or the use of an inert medium. Remove any source of ignition. Eliminate electrostatic charges by interconnecting all the conductive surfaces on which static electricity could form, and also ensuring that all surfaces are connected to the ground.

For emergency responders:
Wear protective equipment. Keep unprotected persons away. See section 8.

Environmental precautions:
This product is not classified as hazardous to the environment. Keep product away from drains, surface and underground water.

Methods and material for containment and cleaning up:
It is recommended: Absorb the spillage using sand or inert absorbent and move it to a safe place. Do not absorb in sawdust or other combustible absorbents. For any concern related to disposal consult section 13.

Section 7: Handling And Storage

Handling & Storage:

Do not breathe dust, fumes, gas, mist, vapours or spray.

Wash hands thoroughly after handling.

Avoid release to the environment.

Wear protective clothing as detailed in SDS Section 8.

Store locked up. Store in a well-ventilated place. Keep cool.

Protect from physical damage. Clean up all spills immediately to prevent secondary accidents.

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
Sodium hydroxide [1310-73-2]		2 (Ceiling)		

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 2023 14TH EDITION.

Engineering Controls

General (mechanical) room ventilation is considered satisfactory in enclosed spaces.

Personal Protection Equipment

Eyes	Safety Glasses/Full face masks
Hands	PVC-coated gloves
Skin	Avoid skin contact. If skin contact or contamination of clothing is likely, protective clothing should be worn.
Respiratory	Not necessary unless ventilation is poor
General	Follow good hygiene

Section 9: Physical And Chemical Properties

Appearance	Liquid
Colour	Clear Yellow
Odour	Not available
Odour Threshold	Not available
pH	13
Boiling Point	> 100^0C
Melting Point	Not available
Freezing Point	Not available
Flash Point	Not available
Flammability	Not flammable
Upper and Lower Explosive Limits	Not available
Vapour Pressure	Not available
Vapour Density	Not available
Specific Gravity	1.16
Water Solubility	soluble
Partition Coefficient:	Not available

Auto-ignition Temperature	Not available
Decomposition Temperature	Not available
Kinematic Viscosity	Not available
Particle Characteristics	Not available

Section 10: Stability And Reactivity

Stability of the Substance: Stable under normal conditions

Conditions to avoid: Heat, Spark

Materials to avoid: Oxidising agents

Hazardous Decomposition Products: None known

Conditions Contributing to Hazardous Polymerization Not known

Section 11: Toxicological Information

Acute Effects:

Swallowed	This product is not classified as acutely toxic.
Dermal	This product is not classified as acutely toxic.
Inhalation	This product is not classified as acutely toxic.
Eye	Causes serious eye damage.
Skin	Causes severe skin burns.

Chronic Effects:

Carcinogenicity	This product is not classified as carcinogenic.
Reproductive Toxicity	This product is not classified as toxic for reproduction.
Germ Cell Mutagenicity	This product is not classified as mutagenic.
Aspiration	This product is not classified as Asp Tox.
STOT/SE	This product is not classified as STOT SE.
STOT/RE	This product is not classified as STOT RE.

Section 12: Ecological Information

Toxic to aquatic life with long lasting effects.

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

SPECIES: Coho salmon ; TYPE OF EXPOSURE: Flow through

DURATION: 96 hr ;ENDPOINT: LC50 ;VALUE: 0.45 mg/l

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 – Carcinogenic" and that the label also has the Chronic Pictogram, waste type identifier, and the business name, address, and phone number.

Precautions or methods to avoid: Avoid release to the environment.

Section 14: Transport Information

This product is classified as a Dangerous Good for transport in NZ ; NZS 5433:2020 and SNZ HB 5433:2021

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	Yes
Special Provisions	If the product's individual container is below 5L/kg, 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: Construction Products (Toxic [6.7]) – HSR002551

GHS Classification:

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	1000 L
Emergency Response Plan	1000 L
Secondary Containment	1000 L
Restriction of Use	Only use for the intended purpose.

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 Nov 2023 14th 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

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

The information herein is given in good faith, but no warranty, express or implied is made.

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

Issue Date: 2 September 2024 Review Date: 2 September 2029

End of Safety Data Sheet.