SAFETY DATA SHEET



Revision date: 08-Jul-2020

Revision Number 7

1. IDENTIFICATION OF THE MATERIAL AND SUPPLIER

Product identifier

Product Name SurfSan

Product Code(s) 00000008763

Other means of identification

UN number 1719

Recommended use of the chemical and restrictions on use

Recommended use Formulated detergent sanitiser for cleaning and sanitising of dairy, food and beverage

external plant surfaces.

Uses advised against No information available.

Details of the supplier of the safety data sheet

Supplier

Ixom Operations Pty Ltd (Incorporated in Australia) NZBN: 9429041465226 Address: 166 Totara Street

Mt Maunganui South

New Zealand

Telephone Number: +64 9 368 2700

Facimile: +64 9 368 2710

For further information, please contact

Contact Point Product Safety Department

Emergency telephone number

Emergency Telephone 0 800 734 607 (ALL HOURS)

2. HAZARDS IDENTIFICATION

Classified as a Dangerous Good according to NZS 5433:2012 Transport of Dangerous Goods on Land.

Classified as hazardous according to criteria in the Hazardous Substances (Minimum Degrees of Hazard) Notice 2017 and the Hazardous Substances (Classification) Notice 2017.

GHS Classification

SIGNAL WORD

Danger

Subclass 3.1 Category D (low hazard) - Flammable Liquids.

Subclass 6.1 Category E - Substances which are acutely toxic.

Subclass 8.2 Category B - Substances that are corrosive to dermal tissue. Subclass 8.3 Category A - Substances that are corrosive to ocular tissue.

Subclass 9.1 Category A - Substances that are very ecotoxic in the aquatic environment.

Cleaning Products (Corrosive, Combustible) Group Standard 2017

Approval Number: HSR002527

Label elements



Hazard statements

H227 - Combustible liquid

H303 + H313 - May be harmful if swallowed or in contact with skin

H314 - Causes severe skin burns and eye damage

H400 - Very toxic to aquatic life

Precautionary Statements - Prevention

Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking

Do not breathe fume, gas, mist, vapours, spray

Wash hands thoroughly after handling

Wear protective gloves / protective clothing / eye protection / face protection

Precautionary Statements - Response

Specific treatment (see First aid on this SDS)

IF IN EYES: 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 (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower

Wash contaminated clothing before reuse

IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing

IF SWALLOWED: Rinse mouth. DO NOT induce vomiting

In case of fire: Use extinguishing media as outlined in Section 5 of this Safety Data Sheet for extinction.

Collect spillage

Precautionary Statements - Storage

Store locked up

Precautionary Statements - Disposal

In the case of a substance that is in compliance with a HSNO approval other than a Part 6A (Group Standards) approval, a label must provide a description of one or more appropriate and achievable methods for the disposal of a substance in accordance with the Hazardous Substances (Disposal) Notice 2017. This may also include any method of disposal that must be avoided.

Other hazards which do not result in classification

No information available.

3. COMPOSITION/INFORMATION ON INGREDIENTS

<u>Mixture</u>

Chemical name	CAS No.	Weight-%
Non hazardous component(s)	-	>60%
2-Butoxyethanol	111-76-2	<10%
Alcohols, C12-14, ethoxylated	68439-50-9	<10%
Benzyl alkyl dimethyl ammonium chloride	8001-54-5	<10%
(Benzalkonium chloride)		
Sodium metasilicate, pentahydrate	10213-79-3	<10%

4. FIRST AID MEASURES

Description of first aid measures

General advice For advice, contact a Poisons Information Centre (e.g. phone Australia 13 11 26; New

Zealand 0800 764 766) or a doctor.

Emergency telephone number Poisons Information Center, New Zealand: 0800 764 766

Poisons Information Center, Australia: 13 11 26

Inhalation Remove to fresh air. Call a physician if symptoms occur.

Eye contact Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids.

Consult a physician.

Skin contact Wash skin with soap and water. Immediately call a POISON CENTER or doctor/physician.

Ingestion Clean mouth with water and drink afterwards plenty of water. Call a physician immediately.

Most important symptoms and effects, both acute and delayed

Symptoms Irritation/Corrosion.

Indication of any immediate medical attention and special treatment needed

Note to physicians Treat symptomatically. Can cause corneal burns.

5. FIRE FIGHTING MEASURES

Suitable Extinguishing Media

Suitable Extinguishing MediaDry chemical, CO2, water spray or regular foam.

Unsuitable extinguishing media No information available.

Specific hazards arising from the chemical

Specific hazards arising from the chemical

Corrosive hazard. Wear protective gloves/clothing and eye/face protection. Combustible

material.

Hazardous combustion products Carbon oxides.

Special protective actions for fire-fighters

Special protective equipment for

fire-fighters

Firefighters should wear self-contained breathing apparatus and full firefighting turnout

gear. Use personal protection equipment.

Hazchem code 2R

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions Attention! Corrosive material. Avoid contact with skin, eyes and inhalation of vapors.

Evacuate personnel to safe areas. Remove all sources of ignition. Use personal protective

equipment as required.

Environmental precautions

Environmental precautions See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so.

Methods for cleaning up

Use a non-combustible material like vermiculite, sand or earth to soak up the product and

place into a container for later disposal.

Precautions to prevent secondary hazards

Prevention of secondary hazards Clean contaminated objects and areas thoroughly observing environmental regulations.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place. Store away from

foodstuffs and sources of heat or ignition.

Incompatible materials Acids.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Limits No value assigned for this specific material by the New Zealand Workplace Health & Safety

Authority. However, Workplace Exposure Standard(s) for constituent(s):

2-Butoxyethanol: WES-TWA 25 ppm, 121 mg/m³, skin

As published by the New Zealand Workplace Health & Safety Authority.

WES - TWA (Workplace Exposure Standard - Time Weighted Average) - The eight-hour, time-weighted average exposure standard is designed to protect the worker from the effects of long-term exposure.

`Skin' Notice - absorption through the skin may be a significant source of exposure. The exposure standard is invalidated if such contact should occur.

These Workplace Exposure Standards are guides to be used in the control of occupational health hazards. All atmospheric contamination should be kept to as low a level as is workable. These workplace exposure standards should not be used as fine dividing lines between safe and dangerous concentrations of chemicals. They are not a measure of relative toxicity.

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Appropriate engineering controls

Engineering controls Apply technical measures to comply with the occupational exposure limits.

> If in the handling and application of this material, safe exposure levels could be exceeded, the use of engineering controls such as local exhaust ventilation must be considered and the results documented. If achieving safe exposure levels does not require engineering controls, then a detailed and documented risk assessment using the relevant Personal Protective Equipment (PPE) (refer to PPE section below) as a basis must be carried out to determine the minimum PPE requirements.

Individual protection measures, such as personal protective equipment

The selection of PPE is dependent on a detailed risk assessment. The risk assessment should consider the work situation, the physical form of the chemical, the handling methods, and environmental factors.

OVERALLS, CHEMICAL GOGGLES, FACE SHIELD, GLOVES (Long), APRON, RUBBER BOOTS.



Tight sealing safety goggles. Eye/face protection

Hand protection Impervious gloves.

Skin and body protection Boots. Apron. Overalls.

If determined by a risk assessment an inhalation risk exists, wear a suitable mist respirator Respiratory protection

meeting the requirements of AS/NZS 1715 and AS/NZS 1716.

Environmental exposure controls No information available.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state Clear Liquid

Appearance No information available. No information available. Color Odor No information available. No information available. **Odor threshold**

Property Values Remarks • Method

pН 12.7 None known Melting point / freezing point No data available None known None known No data available Boiling point / boiling range Flash point No data available None known **Evaporation rate** No data available None known Flammability (solid, gas) No data available None known Flammability Limit in Air None known

Upper flammability or explosive

limits

No data available

Lower flammability or explosive limits

Vapor pressure No data available None known

No data available

Vapor density No data available None known 1.028 @20°C Relative density None known None known Miscible in water Water solubility Solubility(ies) No data available None known **Partition coefficient** No data available None known **Autoignition temperature** No data available None known **Decomposition temperature** No data available None known Kinematic viscosity No data available None known **Dynamic viscosity** No data available None known

Other information

10. STABILITY AND REACTIVITY

Reactivity

Reactivity Reacts with strong acids.

Chemical stability

Stability Stable under normal conditions.

Explosion data

Sensitivity to mechanical impact None.

Sensitivity to static discharge None.

Possibility of hazardous reactions

Possibility of hazardous reactions
None under normal processing.

Conditions to avoid

Conditions to avoid Heat, flames and sparks.

Incompatible materials

Incompatible materials Acids.

Hazardous decomposition products

Hazardous decomposition products Carbon oxides.

11. TOXICOLOGICAL INFORMATION

Acute toxicity

Information on likely routes of exposure

Product InformationNo adverse health effects expected if the chemical is handled in accordance with this

Safety Data Sheet and the chemical label. Symptoms or effects that may arise if the

chemical is mishandled and overexposure occurs are:

Inhalation May cause irritation.

Eye contact Causes serious eye damage.

Skin contact Contact causes severe skin irritation and possible burns.

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Ingestion Can burn mouth, throat, and stomach.

Symptoms No information available.

Acute toxicity

Numerical measures of toxicity

No information available.

Component Information

Component information			
Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
2-Butoxyethanol	= 470 mg/kg (Rat)	= 435 mg/kg (Rabbit)	= 450 ppm (Rat) 4 h = 486
			ppm (Rat)4h
Benzyl alkyl dimethyl	= 240 mg/kg (Rat)	= 1420 mg/kg (Rat)	-
ammonium chloride			
(Benzalkonium chloride)			
Sodium metasilicate,	= 847 mg/kg (Rat)	-	-
pentahydrate			

See section 16 for terms and abbreviations

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Causes burns. Classification is based on mixture calculation methods based on component

data.

Serious eye damage/eye irritation Causes serious eye damage. Classification is based on mixture calculation methods based

on component data.

Respiratory or skin sensitization No information available.

Germ cell mutagenicity No information available.

Carcinogenicity No information available.

The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical name	New Zealand	IARC
2-Butoxyethanol - 111-76-2		Group 3

IARC (International Agency for Research on Cancer)

Group 3 - Not Classifiable as to Carcinogenicity in Humans

Reproductive toxicity No information available.

STOT - single exposure No information available.

STOT - repeated exposure No information available.

Aspiration hazard No information available.

12. ECOLOGICAL INFORMATION

Ecotoxicity

Ecotoxicity Keep out of waterways. Very toxic to aquatic life.

Chemical name	Algae/aquatic plants	Fish	Crustacea
2-Butoxyethanol	-	LC50: =1490mg/L (96h, Lepomis	EC50: >1000mg/L (48h, Daphnia

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		macrochirus) LC50: =2950mg/L (96h, Lepomis macrochirus)	magna) EC50: 1698 - 1940mg/L (24h, Daphnia magna)
Alcohols, C12-14, ethoxylated	-	96h LC50 = 1.4 mg/L (carp)	-
Benzyl alkyl dimethyl ammonium chloride (Benzalkonium chloride)	-	LC50: 0.223 - 0.46mg/L (96h, Lepomis macrochirus) LC50: 0.823 - 1.61mg/L (96h, Oncorhynchus mykiss) LC50: =2.4mg/L (96h, Oryzias latipes) LC50: =1.3mg/L (96h, Poecilia reticulata)	-

Persistence and degradability

Persistence and degradability No information available.

Bioaccumulative potential

Bioaccumulation No information available.

Mobility

Mobility in soil No information available.

Component Information

Chemical name	Partition coefficient
2-Butoxyethanol	0.81

Other adverse effects

Other adverse effects No information available.

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Waste from residues/unused products

Dispose of product in packaging in a way that is consistent with the Hazardous Substances (Disposal) Notice 2017 and the Act. Treat the substance using a method that changes the characteristics or composition of the substance so that the substance is no longer a hazardous substance; or export the substance from New Zealand as waste.

Contaminated packaging

For packages that have been in direct contact with hazardous substances, the person must ensure that the package is rendered incapable of containing any substance. It must be disposed of in a manner that is consistent with the requirements for disposal of the substance that it contained, taking into account the material the package is manufactured from. Packages may only be reused or recycled if the package has been treated to remove any residual contents of the hazardous substance (class 1, 2, 3, 4, or 5); or the contents of the residue in the package are below the threshold for the substance to be classified as hazardous (class 6, 8, or 9 substance).

14. TRANSPORT INFORMATION

ROAD AND RAIL TRANSPORT Classified as a Dangerous Good according to NZS 5433:2012 Transport of Dangerous

Goods on Land.

UN number 1719

Proper shipping name CAUSTIC ALKALI LIQUID, N.O.S. (CONTAINS SODIUM METASILICATE AND ALKYL

DIMETHYL BENZYL AMMONIUM CHLORIDE)

Hazard class 8
Packing group II
Hazchem code 2R

IATA Classified as Dangerous Goods by the criteria of the International Air Transport Association

(IATA) Dangerous Goods Regulations for transport by air: DANGEROUS GOODS.

UN number 1719

UN proper shipping name CAUSTIC ALKALI LIQUID, N.O.S. (CONTAINS SODIUM METASILICATE AND ALKYL

DIMETHYL BENZYL AMMONIUM CHLORIDE)

Transport hazard class(es) 8
Packing group | |

IMDG Classified as Dangerous Goods by the criteria of the International Maritime Dangerous

Goods Code (IMDG Code) for transport by sea; DANGEROUS GOODS.

UN number 1719

UN proper shipping name CAUSTIC ALKALI LIQUID, N.O.S. (CONTAINS SODIUM METASILICATE AND ALKYL

DIMETHYL BENZYL AMMONIUM CHLORIDE)

Transport hazard class(es) 8
Packing group II
IMDG EMS Fire F-A
IMDG EMS Spill S-B

15. REGULATORY INFORMATION

Safety, health and environmental regulations/legislation specific for the substance or mixture

New Zealand

National regulations See section 8 for national exposure control parameters

Chemical name	New Zealand HSNO Chemical Classification
2-Butoxyethanol - 111-76-2	3.1D,6.1D (All),6.1D (I),6.1D (O),6.1E (D),6.3B,6.4A,9.3C
	3.1D,6.1E (All),6.1E (D)
Alcohols, C12-14, ethoxylated - 68439-50-9	6.1D (AII),6.1D (O),6.3B,6.4A,9.1A (AII),9.1A (A),9.1D (C),9.1D
	(F),9.3B
	6.1E (All),6.1E (O),6.3B,8.3A,9.1A (Oth),9.1A (All),9.1D (C),9.1D
	(F)
Benzyl alkyl dimethyl ammonium chloride (Benzalkonium	6.1C (All),6.1C (O),6.1D (D),6.5A,6.5B,6.9B (All),6.9B
chloride) - 8001-54-5	(D),8.2C,8.3A,9.1A (All),9.1A (A),9.1A (C),9.1A (F),9.3B
	6.1C (AII),6.1C (O),6.5A,6.5B,6.9B (AII),6.9B (D),8.2C,8.3A,9.1A
	(AII),9.1A (A),9.1A (C),9.1A (F),9.3B
	6.1D (All),6.1D (O),6.5A,6.5B,6.9B (All),6.9B (D),8.2C,8.3A,9.1B
	(All),9.1B (A),9.1B (C),9.1B (F),9.3C
	6.1E (AII),6.1E (O),6.3A,6.4A,6.5B,6.5A,6.9B (AII),6.9B (D),9.1B
	(All),9.1B (A),9.1B (C),9.1B (F)
Sodium metasilicate, pentahydrate - 10213-79-3	6.1D (All),6.1D (O),8.2C,8.3A,9.3C
	8.2C,8.3A

International Inventories

Contact supplier for inventory compliance status. **NZIoC TSCA** Contact supplier for inventory compliance status. DSL/NDSL Contact supplier for inventory compliance status. **EINECS/ELINCS** Contact supplier for inventory compliance status. Contact supplier for inventory compliance status. **ENCS** Contact supplier for inventory compliance status. **IECSC** Contact supplier for inventory compliance status. **KECL PICCS** Contact supplier for inventory compliance status.

AICS All the constituents of this material are listed on the Australian Inventory of Chemical

Substances.

Legend:

NZIoC - New Zealand Inventory of Chemicals

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

AICS - Australian Inventory of Chemical Substances

International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

16. OTHER INFORMATION

Prepared By

This Safety Data Sheet has been prepared by Ixom Operations Pty Ltd (Toxicology and

SDS Services).

Issuing Date: 08-Jul-2020

Reason(s) For Issue: 5 Yearly Revised Primary SDS

Revision Note:

The symbol (*) in the margin of this SDS indicates that this line has been revised.

Key or legend to abbreviations and acronyms used in the safety data sheet

Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)

Ceiling Maximum limit value * Skin designation

C Carcinogen

Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR) U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA)

EPA (Environmental Protection Agency)

Acute Exposure Guideline Level(s) (AEGL(s))

U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act

U.S. Environmental Protection Agency High Production Volume Chemicals

Food Research Journal

Hazardous Substance Database

International Uniform Chemical Information Database (IUCLID)

Japan GHS Classification

Australia National Industrial Chemicals Notification and Assessment Scheme (NICNAS)

NIOSH (National Institute for Occupational Safety and Health)

National Library of Medicine's ChemID Plus (NLM CIP)

National Library of Medicine's PubMed database (NLM PUBMED)

National Toxicology Program (NTP)

New Zealand's Chemical Classification and Information Database (CCID)

Organization for Economic Co-operation and Development Environment, Health, and Safety Publications

Organization for Economic Co-operation and Development High Production Volume Chemicals Program Organization for Economic Co-operation and Development Screening Information Data Set RTECS (Registry of Toxic Effects of Chemical Substances)
World Health Organization

Disclaimer

This SDS summarises to our best knowledge at the date of issue, the chemical health and safety hazards of the material and general guidance on how to safely handle the material in the workplace. Since Ixom Operations Pty Ltd cannot anticipate or control the conditions under which the product may be used, each user must, prior to usage, assess and control the risks arising from its use of the material.

If clarification or further information is needed, the user should contact their Ixom representative or Ixom Operations Pty Ltd at the contact details on page 1.

Ixom Operations Pty Ltd's responsibility for the material as sold is subject to the terms and conditions of sale, a copy of which is available upon request.

End of Safety Data Sheet