

# SAFETY DATA SHEET

Issue Date 07-Aug-2019 Revision Date Version 4.1 Page 1 / 16

31-Mar-2022

# 1. IDENTIFICATION

**Product identifier** 

Product Name Total Chlorine Buffer Solution

Other means of identification

Product Code(s) 2263511

Safety data sheet number M00470

UN/ID no UN1824

Recommended use of the chemical and restrictions on use

**Recommended Use** Buffer. Water Analysis.

Uses advised against Consumer use.

**Restrictions on use** For Laboratory Use Only.

# Details of the supplier of the safety data sheet

#### **Manufacturer Address**

Hach Company, P.O.Box 389, Loveland, CO 80539, USA, +1(970) 669-3050

### Emergency telephone number

+1(303) 623-5716 - 24 Hour Service

# 2. HAZARDS IDENTIFICATION

### Classification

# **Regulatory Status**

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Corrosive to metals	Category 1
Skin corrosion/irritation	Category 1
Serious eye damage/eye irritation	Category 1
Specific target organ toxicity (repeated exposure)	Category 1

### Hazards not otherwise classified (HNOC)

Not applicable

# Label elements

# Signal word

Danger

EN / AGHS Page 1/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

Page 2/16



#### **Hazard statements**

H290 - May be corrosive to metals

H314 - Causes severe skin burns and eye damage

H372 - Causes damage to organs through prolonged or repeated exposure

#### **Precautionary statements**

P280 - Wear protective gloves, protective clothing, eye protection, and face protection

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 victim 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

P310 - Immediately call a POISON CENTER or doctor/physician

P363 - Wash contaminated clothing before reuse

P405 - Store locked up

P501 - Dispose of contents/ container to an approved waste disposal plant

P260 - Do not breathe dust/fume/gas/mist/vapors/spray

P270 - Do not eat, drink or smoke when using this product

P234 - Keep only in original container

P390 - Absorb spillage to prevent material damage

#### Other Hazards Known

None

# 3. COMPOSITION/INFORMATION ON INGREDIENTS

#### Substance

Not applicable

### **Mixture**

Chemical Family

**Chemical nature** Aqueous solution of inorganic salts.

#### Percent ranges are used where confidential product information is applicable.

Mixture.

Chemical name	CAS No	Percent Range	HMRIC #
Potassium iodide (KI)	7681-11-0	<10%	-
Sodium hydroxide	1310-73-2	1 - 5%	-
Decyl phenoxybenzenedisulfonic acid, disodium salt	36445-71-3	<1%	-
Tetrasodium EDTA, dihydrate	10378-23-1	<1%	-
Benzenesulfonic acid, oxybis[decyl-, disodium salt	70146-13-3	<0.1%	-

EN / AGHS Page 2/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

Page 3/16

Sodium sulfate	7757-82-6	<0.01%	_
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### 4. FIRST AID MEASURES

#### Description of first aid measures

General advice Show this safety data sheet to the doctor in attendance. Immediate medical attention is

required.

Inhalation Remove to fresh air, If breathing has stopped, give artificial respiration, Get medical

attention immediately. Do not use mouth-to-mouth method if victim ingested or inhaled the substance; give artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. If breathing is difficult, (trained personnel should) give oxygen. Delayed pulmonary edema may occur. Get immediate medical

advice/attention.

**Eye contact** Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.

Remove contact lenses, if present and easy to do. Continue rinsing. Keep eye wide open

while rinsing. Do not rub affected area. Get immediate medical advice/attention.

**Skin contact**Wash off immediately with soap and plenty of water while removing all contaminated

clothes and shoes. Get immediate medical advice/attention.

**Ingestion** Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth

to an unconscious person. Do NOT induce vomiting. Get immediate medical

advice/attention.

Self-protection of the first aider Avoid contact with skin, eyes or clothing. Ensure that medical personnel are aware of the

material(s) involved, take precautions to protect themselves and prevent spread of contamination. Avoid direct contact with skin. Use barrier to give mouth-to-mouth

resuscitation.

Most important symptoms and effects, both acute and delayed

**Symptoms** Burning sensation.

Indication of any immediate medical attention and special treatment needed

**Note to physicians** Product is a corrosive material. Use of gastric lavage or emesis is contraindicated.

Possible perforation of stomach or esophagus should be investigated. Do not give chemical antidotes. Asphyxia from glottal edema may occur. Marked decrease in blood

pressure may occur with moist rales, frothy sputum, and high pulse pressure.

### 5. FIRE-FIGHTING MEASURES

surrounding environment.

Unsuitable Extinguishing Media Caution: Use of water spray when fighting fire may be inefficient.

**Specific hazards arising from the** The product causes burns of eyes, skin and muc

chemical

The product causes burns of eyes, skin and mucous membranes. Thermal decomposition

can lead to release of irritating gases and vapors.

**Hazardous combustion products** This material will not burn.

Special protective equipment for

fire-fighters

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

gear. Use personal protection equipment.

EN / AGHS Page 3/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

Page 4 / 16

### 6. ACCIDENTAL RELEASE MEASURES

U.S. Notice Only persons properly qualified to respond to an emergency involving hazardous

substances may respond to a spill according to federal regulations (OSHA 29 CFR

1910.120(a)(v)) and per your company's emergency response plan and

guidelines/procedures. See Section 13, Special Instructions for disposal assistance. Outside of the US, only persons properly qualified according to state or local regulations

should respond to a spill involving chemicals.

Personal precautions, protective equipment and emergency procedures

**Personal precautions** Avoid contact with skin, eyes or clothing. Ensure adequate ventilation. Use personal

protective equipment as required. Attention! Corrosive material. Evacuate personnel to

safe areas. Keep people away from and upwind of spill/leak.

**Other Information** Refer to protective measures listed in Sections 7 and 8.

Environmental precautions

**Environmental precautions** Prevent further leakage or spillage if safe to do so. Should not be released into the

environment. Do not allow to enter into soil/subsoil. Prevent product from entering drains.

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 Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder,

sawdust). Take up mechanically, placing in appropriate containers for disposal.

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

**Reference to other sections** See section 8 for more information. See section 13 for more information.

### 7. HANDLING AND STORAGE

Precautions for safe handling

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

skin, eyes or clothing. In case of insufficient ventilation, wear suitable respiratory equipment. Handle product only in closed system or provide appropriate exhaust ventilation. Do not eat, drink or smoke when using this product. Take off contaminated

clothing and wash before reuse.

Conditions for safe storage, including any incompatibilities

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

moisture. Store locked up. Keep out of the reach of children. Store away from other

materials.

Flammability class Not applicable

# 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

**Exposure Guidelines** 

EN / AGHS Page 4/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

Page 5 / 16

	Chemical name	Chemical name ACGIH TLV		NIOSH
Ī	Potassium iodide (KI)	TWA: 0.01 ppm inhalable	NDF	NDF
	CAS#: 7681-11-0	fraction and vapor		
Ī	Sodium hydroxide	Ceiling: 2 mg/m <sup>3</sup>	TWA: 2 mg/m <sup>3</sup>	IDLH: 10 mg/m <sup>3</sup>
	CAS#: 1310-73-2		(vacated) Ceiling: 2 mg/m <sup>3</sup>	Ceiling: 2 mg/m <sup>3</sup>

Appropriate engineering controls

**Engineering Controls** 

Showers

**Eyewash stations** Ventilation systems.

Individual protection measures, such as personal protective equipment

Respiratory protection No protective equipment is needed under normal use conditions. If exposure limits are

exceeded or irritation is experienced, ventilation and evacuation may be required.

**Hand Protection** Wear suitable gloves. Impervious gloves. Gloves must be inspected prior to use. The

> selected protective gloves have to satisfy the specifications of EU Directive 2016/425 and the standard EN 374 derived from it. Chemical resistant gloves made of butyl rubber or

nitrile rubber category III according to EN 374-1:2016.

Eye/face protection Face protection shield.

Wear suitable protective clothing. Long sleeved clothing. Chemical resistant apron. Skin and body protection

**General Hygiene Considerations** Wear suitable gloves and eye/face protection. Do not eat, drink or smoke when using this

product. Regular cleaning of equipment, work area and clothing is recommended. Avoid contact with skin, eyes or clothing. Remove and wash contaminated clothing and gloves, including the inside, before re-use. Contaminated work clothing should not be allowed out of the workplace. Wash hands before breaks and immediately after handling the product.

Local authorities should be advised if significant spillages cannot be contained. Do not **Environmental exposure controls** 

allow into any sewer, on the ground or into any body of water.

Thermal hazards None under normal processing.

# 9. PHYSICAL AND CHEMICAL PROPERTIES

# Information on basic physical and chemical properties

Physical state

colorless **Appearance** clear Color amber

Liquid

Odor Odorless Odor threshold No data available

Values Remarks • Method Property

Molecular weight Not applicable

@ 20 °C 11.9 pН

Melting point/freezing point ~ -13 °C / 8.6 °F Boiling point / boiling range 106 °C / 222.8 °F

**Evaporation rate** 0.61 (water = 1)

Vapor pressure 22.427 mm Hg / 2.99 kPa at 25 °C / 77 °F

Relative vapor density 0.62

EN / AGHS Page 5/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

**Page** 6 / 16

Specific gravity (water = 1 / air = 1) 1.246

Partition Coefficient (n-octanol/water) No data available

Soil Organic Carbon-Water Partition

Coefficient

No data available

Autoignition temperature No data available

**Decomposition temperature** No data available

Dynamic viscosity No data available

Kinematic viscosity

No data available

Solubility(ies)

### Water solubility

Water solubility classification	Water solubility_	Water Solubility Temperature		
Soluble	> 1000 mg/L	25 °C / 77 °F		

### Solubility in other solvents

Chemical Name	Solubility classification_	Solubility	Solubility Temperature	
Acid	Soluble	> 1000 mg/L	25 °C / 77 °F	

### **Other information**

### **Metal Corrosivity**

Classified as corrosive to metal according to GHS criteria

Steel Corrosion Rate
Aluminum Corrosion Rate

0.25 mm/yr / 0.01 in/yr 754.63 mm/yr / 29.71 in/yr

# **Volatile Organic Compounds (VOC) Content**

Chemical name	CAS No	Volatile organic compounds (VOC) content	CAA (Clean Air Act)
Potassium iodide (KI)	7681-11-0	Not applicable	-
Sodium hydroxide	1310-73-2	No data available	-
Decyl phenoxybenzenedisulfonic acid, disodium salt	36445-71-3	Not applicable	-
Tetrasodium EDTA, dihydrate	10378-23-1	Not applicable	-
Benzenesulfonic acid, oxybis[decyl-, disodium salt	70146-13-3	No data available	-
Sodium sulfate	7757-82-6	No data available	-

# **Explosive properties**

Upper explosion limitNot applicableLower explosion limitNot applicable

Flammable properties

Flash point No data available

Flammability Limit in Air

Upper flammability limit:No data availableLower flammability limit:No data available

EN / AGHS Page 6/16

Revision Date 31-Mar-2022

Product Name Total Chlorine Buffer Solution

**Page** 7 / 16

**Oxidizing properties** No data available.

**Bulk density** Not applicable

### 10. STABILITY AND REACTIVITY

#### Reactivity

Corrosive on contact with water. Corrosive to metal.

#### Chemical stability

Stable under normal conditions.

#### **Explosion data**

Sensitivity to Mechanical Impact None. Sensitivity to Static Discharge None.

### Possibility of hazardous reactions

None under normal processing.

#### Hazardous polymerization

Hazardous polymerization does not occur.

#### Conditions to avoid

Exposure to air or moisture over prolonged periods.

### Incompatible materials

Oxidizing agent. Acids. Bases.

### Hazardous decomposition products

Thermal decomposition can lead to release of irritating and toxic gases and vapors.

### 11. TOXICOLOGICAL INFORMATION

# Information on likely routes of exposure

#### **Product Information**

Inhalation Corrosive by inhalation. Inhalation of corrosive fumes/gases may cause coughing, choking,

> headache, dizziness, and weakness for several hours. Pulmonary edema may occur with tightness in the chest, shortness of breath, bluish skin, decreased blood pressure, and increased heart rate. Inhaled corrosive substances can lead to a toxic edema of the lungs.

Pulmonary edema can be fatal.

Eye contact Causes burns. Corrosive to the eyes and may cause severe damage including blindness.

Causes serious eye damage. May cause irreversible damage to eyes.

Skin contact Corrosive. Causes severe burns. Avoid contact with skin and clothing.

Causes burns. Ingestion causes burns of the upper digestive and respiratory tracts. May Ingestion

> cause severe burning pain in the mouth and stomach with vomiting and diarrhea of dark blood. Blood pressure may decrease. Brownish or yellowish stains may be seen around the mouth. Swelling of the throat may cause shortness of breath and choking. May cause lung

damage if swallowed. May be fatal if swallowed and enters airways.

**Symptoms** Redness. Burning. May cause blindness. Coughing and/ or wheezing.

EN / AGHS Page 7/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

**Page** 8 / 16

# **Acute toxicity**

Based on available data, the classification criteria are not met

#### **Product Acute Toxicity Data**

No data available.

# **Ingredient Acute Toxicity Data**

Test data reported below.

### **Oral Exposure Route**

Chemical name	Endpoint type	Reported dose	Exposure time	Toxicological effects	Key literature references and sources for data
Potassium iodide (KI) (<10%) CAS#: 7681-11-0	Rat LD <sub>50</sub>	2779 mg/kg	None reported	None reported	RTECS (Registry of Toxic Effects of Chemical Substances)
Decyl phenoxybenzenedisul fonic acid, disodium salt (<1%) CAS#: 36445-71-3	Rat LD₅o	1000 mg/kg	None reported	None reported	EPA (United States Environmental Protection Agency)
Tetrasodium EDTA, dihydrate (<1%) CAS#: 10378-23-1	Rat LD₅o	2700 mg/kg	None reported	None reported	IUCLID (The International Uniform Chemical Information Database)

### **Dermal Exposure Route**

Chemical name	Endpoint	Reported	Exposure	Toxicological effects	Key literature references and
	type	dose	time		sources for data
Decyl	Rabbit	> 2000 mg/kg	None	None reported	No information available
phenoxybenzenedisul	LD50		reported		
fonic acid, disodium					
salt					
(<1%)					!
CAS#: 36445-71-3					

# **Unknown Acute Toxicity**

0% of the mixture consists of ingredient(s) of unknown toxicity.

### **Acute Toxicity Estimations (ATE)**

# The following values are calculated based on chapter 3.1 of the GHS document

ATEmix (oral)	No information available
ATEmix (dermal)	No information available
ATEmix (inhalation-dust/mist)	No information available
ATEmix (inhalation-vapor)	No information available
ATEmix (inhalation-gas)	No information available

# Skin corrosion/irritation

Causes severe burns.

### **Product Skin Corrosion/Irritation Data**

No data available.

# Ingredient Skin Corrosion/Irritation Data

Test data reported below.

EN / AGHS Page 8/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

**Page** 9 / 16

Chemical name	Test method	Species	Reported dose	Exposure time	Results	Key literature references and sources for data
Sodium hydroxide (1 - 5%) CAS#: 1310-73-2	Patch test	Human	20 mg	24 hours	Corrosive to skin	RTECS (Registry of Toxic Effects of Chemical Substances)
Sodium sulfate (<0.01%) CAS#: 7757-82-6	Standard Draize Test	Rabbit	500 mg	4 hours	Not corrosive or irritating to skin	ECHA (The European Chemicals Agency)

### Serious eye damage/irritation

Classification based on data available for ingredients. Causes burns. Risk of serious damage to eyes.

# **Product Serious Eye Damage/Eye Irritation Data**

No data available.

# Ingredient Eye Damage/Eye Irritation Data

Test data reported below.

Chemical name	Test method	Species	Reported dose	Exposure time	Results	Key literature references and sources for data
Sodium hydroxide (1 - 5%) CAS#: 1310-73-2	Standard Draize Test	Rabbit	0.05 mg	24 hours	Corrosive to eyes	RTECS (Registry of Toxic Effects of Chemical Substances)
Decyl phenoxybenzenedisul fonic acid, disodium salt (<1%) CAS#: 36445-71-3	None reported	Rabbit	None reported	None reported	Corrosive to eyes	No information available
Sodium sulfate (<0.01%) CAS#: 7757-82-6	Standard Draize Test	Rabbit	90 mg	24 hours	Not corrosive or irritating to eyes	ECHA (The European Chemicals Agency)

# Respiratory or skin sensitization

Based on available data, the classification criteria are not met.

# **Product Sensitization Data**

No data available.

#### **Ingredient Sensitization Data**

Test data reported below.

### **Skin Sensitization Exposure Route**

Chemical name	Test method	Species	Results	Key literature references and
				sources for data
Potassium iodide (KI) (<10%) CAS#: 7681-11-0	Patch test	Human	Not confirmed to be a skin sensitizer	ERMA (New Zealands Environmental Risk Management Authority)
Sodium sulfate (<0.01%) CAS#: 7757-82-6	OECD Test No. 406: Skin Sensitization	Guinea pig	Not confirmed to be a skin sensitizer	HSDB (Hazardous Substances Data Bank)

# STOT - single exposure

Based on available data, the classification criteria are not met.

### **Product Specific Target Organ Toxicity Single Exposure Data**

EN / AGHS Page 9/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

Page 10 / 16

No data available.

# Ingredient Specific Target Organ Toxicity Single Exposure Data

Test data reported below.

### **Oral Exposure Route**

Chemical name	Endpoint	Reported	Exposure	Toxicological effects	Key literature references and
	type	dose	time		sources for data
Potassium iodide (KI)	Mouse	1862 mg/kg	None	Lungs, Thorax, or	RTECS (Registry of Toxic
(<10%)	LDLo		reported	Respiration	Effects of Chemical
CAS#: 7681-11-0				Dyspnea	Substances)

# **STOT - repeated exposure**

Causes damage to organs through prolonged or repeated exposure.

# **Product Specific Target Organ Toxicity Repeat Dose Data**

No data available.

### Ingredient Specific Target Organ Toxicity Repeat Exposure Data

Test data reported below.

### **Oral Exposure Route**

Chemical name	Endpoint	Reported	Exposure	Toxicological effects	Key literature references and
	type	dose	time		sources for data
Potassium iodide (KI) (<10%) CAS#: 7681-11-0	Rat NOAEL	0.5 mg/kg	90 days	None reported	ECHA (The European Chemicals Agency)

### Carcinogenicity

Based on available data, the classification criteria are not met.

# **Product Carcinogenicity Data**

No data available.

### **Ingredient Carcinogenicity Data**

No data available.

Chemical name	CAS No	ACGIH	IARC	NTP	OSHA
Potassium iodide (KI)	7681-11-0	-	-	-	-
Sodium hydroxide	1310-73-2	-	-	-	-
Decyl	36445-71-3	-	-	-	-
phenoxybenzenedisulfonic					
acid, disodium salt					
Tetrasodium EDTA, dihydrate	10378-23-1	-	-	-	-
Benzenesulfonic acid, oxybis[decyl-, disodium salt	70146-13-3	-	-	-	-
Sodium sulfate	7757-82-6	-	-	-	-

# **Legend**

ACGIH (American Conference of Governmental Industrial Hygienists)	Does not apply
IARC (International Agency for Research on Cancer)	Does not apply
NTP (National Toxicology Program)	Does not apply
OSHA (Occupational Safety and Health Administration of the US Department of	Does not apply
Labor)	

EN / AGHS Page 10/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

**Page** 11 / 16

Germ cell mutagenicity

Based on available data, the classification criteria are not met.

Product Germ Cell Mutagenicity invitro Data

No data available.

Ingredient Germ Cell Mutagenicity invitro Data

Test data reported below.

Chemical name	Test	Cell Strain	Reported dose	Exposure time	Results	Key literature references and
Potassium iodide (KI)	Cytogenetic	Rat ascites tumor	500 mg/kg	None	Positive test result for	RTECS (Registry
(<10%) CAS#: 7681-11-0	analysis			reported	mutagenicity	of Toxic Effects of Chemical
						Substances)

### Product Germ Cell Mutagenicity invivo Data

No data available.

#### Ingredient Germ Cell Mutagenicity invivo Data

No data available.

#### Reproductive toxicity

Based on available data, the classification criteria are not met.

### **Product Reproductive Toxicity Data**

No data available.

#### **Ingredient Reproductive Toxicity Data**

Test data reported below.

# **Oral Exposure Route**

Chemical name	Endpoint	Reported	Exposure	Toxicological effects	Key literature references and
	type	dose	time		sources for data
Potassium iodide (KI)	Human	2700 mg/kg	39 weeks	Specific Developmental	RTECS (Registry of Toxic
(<10%)	TDLo			Abnormalities	Effects of Chemical
CAS#: 7681-11-0				Endocrine System	Substances)
Sodium sulfate	Mouse	14000 mg/kg	4 days	Effects on Newborn	RTECS (Registry of Toxic
(<0.01%)	$TD_Lo$			Other neonatal measures or	Effects of Chemical
CAS#: 7757-82-6				effects	Substances)

# **Aspiration hazard**

Based on available data, the classification criteria are not met.

# 12. ECOLOGICAL INFORMATION

**Ecotoxicity** Based on available data, the classification criteria are not met.

Unknown aquatic toxicity 0 % of the mixture consists of component(s) of unknown hazards to the aquatic

environment.

**Product Ecological Data** 

**Aquatic Acute Toxicity** 

No data available.

**Aquatic Chronic Toxicity** 

No data available.

EN / AGHS Page 11/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

Page 12 / 16

# **Ingredient Ecological Data**

#### **Aquatic Acute Toxicity**

Test data reported below.

# **Fish**

Chemical name	Exposure time	Species	Endpoint type	Reported dose	Key literature references and sources for data
Sodium hydroxide (1 - 5%) CAS#: 1310-73-2	96 hours	Oncorhynchus mykiss	LC <sub>50</sub>	45.4 mg/L	IUCLID (The International Uniform Chemical Information Database)
Decyl phenoxybenzenedisul fonic acid, disodium salt (<1%) CAS#: 36445-71-3	96 hours	None reported	LC50	3 mg/L	No information available
Sodium sulfate (<0.01%) CAS#: 7757-82-6	96 hours	None reported	LC <sub>50</sub>	56 mg/L	IUCLID (The International Uniform Chemical Information Database)

#### Crustacea

Chemical name	Exposure	Species	Endpoint	Reported	Key literature references and
	time		type	dose	sources for data
Sodium hydroxide	48 Hours	Daphnia sp.	EC <sub>50</sub>	40.4 mg/L	IUCLID (The International
(1 - 5%)				_	Uniform Chemical Information
CAS#: 1310-73-2					Database)
Sodium sulfate	48 Hours	Daphnia magna	EC <sub>50</sub>	3150 mg/L	IUCLID (The International
(<0.01%)				_	Uniform Chemical Information
CAS#: 7757-82-6					Database)

### **Aquatic Chronic Toxicity**

No data available.

# Persistence and degradability

**Product Biodegradability Data** 

No data available.

**Product Bioaccumulation Data** 

No data available.

Partition Coefficient (n-octanol/water)

No data available

**Mobility** 

Soil Organic Carbon-Water Partition Coefficient No data available

Other adverse effects
No information available

# 13. DISPOSAL CONSIDERATIONS

### Waste treatment methods

Waste from residues/unused Dispose of in accordance with local regulations. Dispose of waste in accordance with

EN / AGHS Page 12/16

Product Code(s) 2263511 Issue Date 07-Aug-2019

Version 4.1

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

Page 13 / 16

**products** environmental legislation.

**Contaminated packaging**Do not reuse empty containers.

US EPA Waste Number D002

**Special instructions for disposal** Work in an approved fume hood. Dilute to 3 to 5 times the volume with cold water. Adjust to

a pH between 6 and 9 with an acid, such as sulfuric or citric. Open cold water tap completely, slowly pour the reacted material to the drain. Allow cold water to run for 5

minutes to completely flush the system.

### 14. TRANSPORT INFORMATION

DOT

UN/ID no UN1824

Proper shipping name SODIUM HYDROXIDE SOLUTION

Transport hazard class(es) 8
Packing Group | |

**Description** UN1824, SODIUM HYDROXIDE SOLUTION, 8, II

Emergency Response Guide 154

Number

TDG

UN/ID no UN1824

Proper shipping name SODIUM HYDROXIDE SOLUTION

Transport hazard class(es) 8
Packing Group | |

**Description** UN1824, SODIUM HYDROXIDE SOLUTION, 8, II

<u>IATA</u>

UN number or ID number UN1824

Proper shipping name Sodium hydroxide solution

Transport hazard class(es) 8
Packing group II
ERG Code 8L

**Description** UN1824, Sodium hydroxide solution, 8, II

**IMDG** 

UN number or ID number UN1824

Proper shipping name SODIUM HYDROXIDE SOLUTION

Transport hazard class(es) 8
Packing Group |

**EmS-No** F-A, S-B

Description UN1824, SODIUM HYDROXIDE SOLUTION, 8, II

**Note:** No special precautions necessary.

# **Additional information**

There is a possibility that this product could be contained in a reagent set or kit composed of various compatible dangerous goods.

If the item is not in a reagent set or kit, the classification given above applies.

If the item is part of a reagent set or kit the classification would change to the following:

UN3316 Chemical Kit, Hazard Class 9, Packing Group II or III.

If the item is not regulated, the Chemical Kit classification does not apply.

# 15. REGULATORY INFORMATION

National Inventories

TSCA Complies DSL/NDSL Complies

EN / AGHS Page 13/16

**Product Name** Total Chlorine Buffer Solution **Revision Date** 31-Mar-2022

Page 14 / 16

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

Complies

**International Inventories** 

EINECS/ELINCS

ENCS
Does not comply
IECSC

KECL - Existing substances
PICCS
TCSI
AICS

Complies
Complies
Complies
Complies
Complies
Complies

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

TCSI - Taiwan Chemical Substances Inventory

AICS - Australian Inventory of Chemical Substances

NZIoC - New Zealand Inventory of Chemicals

### **US Federal Regulations**

#### **SARA 313**

**NZIoC** 

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

### SARA 311/312 Hazard Categories

Acute health hazardYesChronic Health HazardYesFire hazardNoSudden release of pressure hazardNoReactive HazardNo

### **CWA (Clean Water Act)**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

Chemical name	CWA - Reportable Quantities	CWA - Toxic Pollutants	CWA - Priority Pollutants	CWA - Hazardous Substances
Sodium hydroxide 1310-73-2	1000 lb	-	-	Х

# **CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

Chemical name	Hazardous Substances RQs	CERCLA/SARA RQ	Reportable Quantity (RQ)
Sodium hydroxide	1000 lb	-	RQ 1000 lb final RQ
1310-73-2			RQ 454 kg final RQ

# **US State Regulations**

#### **California Proposition 65**

This product does not contain any Proposition 65 chemicals

IMERC: Not applicable

EN / AGHS Page 14/16

Product Name Total Chlorine Buffer Solution

Revision Date 31-Mar-2022

Page 15/16

### **U.S. State Right-to-Know Regulations**

This product may contain substances regulated by state right-to-know regulations.

Chemical name	New Jersey	Massachusetts	Pennsylvania
Sodium hydroxide 1310-73-2	Х	X	X
Sodium sulfate 7757-82-6	-	X	Х

#### **U.S. EPA Label Information**

Chemical name	FIFRA	FDA
Potassium iodide (KI)	180.0940	21 CFR 184.1634
Sodium hydroxide	180.0910	21 CFR 184.1763
Decyl phenoxybenzenedisulfonic acid, disodium	180.0910	-
salt		
Benzenesulfonic acid, oxybis[decyl-, disodium	180.0910	-
salt		
Sodium sulfate	-	21 CFR 186.1797

# 16. OTHER INFORMATION, INCLUDING DATE OF PREPARATION OF THE LAST REVISION

### **Special Comments**

None

### **Additional information**

**Global Automotive Declarable Substance List (GADSL)** 

Not applicable

**NFPA and HMIS Classifications** 

	NFPA	Health hazards - 3	Flammability - 0	Instability - 0	Physical and chemical properties -
Ī	HMIS	Health hazards - 3 - *	Flammability - 0	Physical hazards - 0	Personal protection - X - I

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

NIOSH IDLH Immediately Dangerous to Life or Health

ACGIH (American Conference of Governmental Industrial Hygienists)

NDF no data

### <u>Legend - Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION</u>

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

MAC Maximum Allowable Concentration Ceiling Ceiling Limit Value

X Listed Vacated These values have no official status. The only

binding levels of contaminants are those listed in the final OSHA PEL. These lists are for reference purposes only. Please note that some reference state regulations of these

EN / AGHS Page 15/16

Revision Date 31-Mar-2022

Product Name Total Chlorine Buffer Solution

Page 16 / 16

"liberated" exposure limits in their state

regulations.

SKN\* Skin designation SKN+ Skin sensitization Respiratory sensitization **Hazard Designation** RSP+ R Reproductive toxicant Carcinogen С

Μ mutagen

**Prepared By Hach Product Compliance Department** 

**Issue Date** 07-Aug-2019

**Revision Date** 31-Mar-2022

**Revision Note** None

#### **Disclaimer**

USER RESPONSIBILITY: Each user should read and understand this information and incorporate it in individual site safety programs in accordance with applicable hazard communication standards and regulations.

THE INFORMATION CONTAINED HEREIN IS BASED ON DATA CONSIDERED TO BE ACCURATE. HOWEVER, NO WARRANTY IS EXPRESSED OR IMPLIED REGARDING THE ACCURACY OF THESE DATA OR THE RESULTS TO BE **OBTAINED FROM THE USE THEREOF.** 

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**End of Safety Data Sheet** 

EN / AGHS Page 16/16