

Safety Data Sheet

according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

VELTEK ASSOCIATES, INC. Date of issue: 03/04/2013 Revision date: 06/25/2019 Supersedes: 04/16/2018 Version: 4.1

SECTION 1: Identification

1.1. Identification

Product form : Mixture

Product name : HYPO-CHLOR® 5.25%

Product code : SDS HC-98-01

1.2. Recommended use and restrictions on use

Use of the substance/mixture : Cleaning agent

1.3. Supplier

Veltek Associates, Inc.

15 Lee Blvd

Malvern, PA 19355-1234 USA

Telephone: +1 610-644-8335 - Fax: +1 610-644-8336

E-mail: vai@sterile.com

In Canada distributed by: Canada Clean Room (CCR) 200 Terence Matthews

Kanata, ONT K2M 2C6, Canada Telephone: 888-595-8070

1.4. Emergency telephone number

Emergency number : CARECHEM 24: 1-215-207-0061

1-866-928-0789 (toll free) Canada: 1-800-579-7421 (toll free) Mexico: +52-55-5004-8763

SECTION 2: Hazard(s) identification

2.1. Classification of the substance or mixture

GHS-US classification

Corrosive to metals Category 1 H290 May be corrosive to metals Skin corrosion/irritation Category 2 H315 Causes skin irritation Serious eye damage/eye irritation Category 1 H318 Causes serious eye damage Hazardous to the aquatic environment - Acute Hazard Category 1 H400 Very toxic to aquatic life

Hazardous to the aquatic environment - Chronic Hazard Category 2 H411 Toxic to aquatic life with long lasting effects

Full text of H statements : see section 16

2.2. GHS Label elements, including precautionary statements

GHS US labeling

Hazard pictograms (GHS US)





Signal word (GHS US) : Danger

Hazard statements (GHS US)

: H290 - May be corrosive to metals

H315 - Causes skin irritation

H318 - Causes serious eve damage

H318 - Causes serious eye damage H400 - Very toxic to aquatic life

H411 - Toxic to aquatic life with long lasting effects

Precautionary statements (GHS US) : P234 - Keep only in original container.

P264 - Wash hands thoroughly after handling. P273 - Avoid release to the environment.

P280 - Wear eye protection; protective gloves; protective clothing. P302+P352 - IF ON SKIN: Wash with plenty of soap and water. P332+P313 - If skin irritation occurs: Get medical advice/attention.

P305+P351+P338 - If in eyes: Rinse cautiously with water for several minutes. Remove contact

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lenses, if present and easy to do. Continue rinsing

P310 - Immediately call a doctor

P362+P364 - Take off contaminated clothing and wash it before reuse.

P390 - Absorb spillage to prevent material-damage.

P391 - Collect spillage.

P406 - Store in corrosive resistant container with a resistant inner liner.
P501 - Dispose of contents/container to an authorized waste collection point

2.3. Other hazards which do not result in classification

No additional information available

2.4. Unknown acute toxicity (GHS US)

Not applicable

SECTION 3: Composition/Information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	GHS-US classification
Sodium hypochlorite	(CAS-No.) 7681-52-9	4.0 - 6.5	Met. Corr. 1, H290 Skin Corr. 1B, H314 Eye Dam. 1, H318 STOT SE 3, H335 Aquatic Acute 1, H400 Aquatic Chronic 1, H410

Full text of hazard classes and H-statements : see section 16

SECTION 4: First-aid measures

4.1. Description of first aid measures

First-aid measures general : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical

advice (show the label where possible).

First-aid measures after inhalation : Remove person to fresh air and keep at rest in a position comfortable for breathing. If

symptoms develop obtain medical attention.

First-aid measures after skin contact : Remove affected clothing and wash all exposed skin area with mild soap and water, followed

by warm water rinse. If skin irritation occurs: Get medical advice/attention.

First-aid measures after eye contact : Rinse immediately with plenty of water (for at least 15 minutes). Remove contact lenses, if

present and easy to do. Continue rinsing. Obtain immediate medical attention.

First-aid measures after ingestion : Do NOT induce vomiting. Rinse mouth. Never give anything by mouth to an unconscious

person. Obtain immediate medical attention.

4.2. Most important symptoms and effects (acute and delayed)

Symptoms/effects after skin contact : Causes skin irritation.

Symptoms/effects after eye contact : Causes serious eye damage.

Symptoms/effects after ingestion : Ingestion may cause irritation of the gastrointestinal tract.

4.3. Immediate medical attention and special treatment, if necessary

Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1. Suitable (and unsuitable) extinguishing media

Suitable extinguishing media : Not combustible. Use extinguishing media appropriate for surrounding fire.

Unsuitable extinguishing media : Do not use a heavy water stream.

5.2. Specific hazards arising from the chemical

Fire hazard : Not flammable.

5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions : Use water spray or fog for cooling exposed containers. Exercise caution when fighting any

chemical fire. Prevent fire-fighting water from entering environment.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection. Use

self-contained breathing apparatus when in close proximity to fire.

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SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Emergency procedures : Ventilate area. Avoid inhalation of vapors. Do not get in eyes, on skin, or on clothing. Evacuate

unnecessary personnel.

6.1.2. For emergency responders

Protective equipment : Equip cleanup crew with proper protection. Use chemically protective clothing.

Emergency procedures : Ventilate area. Avoid inhalation of vapors. Do not get in eyes, on skin, or on clothing.

6.2. Environmental precautions

Do not allow to enter drains or water courses. Notify authorities if product enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible. Collect

spillage. Store away from other materials.

6.4. Reference to other sections

SECTION 8: Exposure controls/personal protection, SECTION 13: Disposal considerations,

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Provide good ventilation in process area to prevent formation of vapor. Avoid inhalation of

vapors. Do not get in eyes, on skin, or on clothing. Wear suitable protective clothing, gloves

and eye or face protection.

Hygiene measures : Do not eat, drink or smoke when using this product. Handle in accordance with good industrial

hygiene and safety practice. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Take off immediately all

contaminated clothing and wash it before reuse.

7.2. Conditions for safe storage, including any incompatibilities

Technical measures : Comply with applicable regulations.

Storage conditions : Store in original container or corrosive resistant and/or lined container. Keep in a cool, well-

ventilated place. Keep away from : Incompatible materials. Keep container closed when not in

use. Store locked up.

Incompatible materials : Acids, alkalis, Water reactive materials, Organic solvents,

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

No additional information available.

8.2. Appropriate engineering controls

Appropriate engineering controls : Provide good ventilation in process area to prevent formation of vapor. Emergency eye wash

fountains and safety showers should be available in the immediate vicinity of any potential

exposure.

Environmental exposure controls : Contain any spills with dikes or absorbents to prevent migration and entry into sewers or

streams.

8.3. Individual protection measures/Personal protective equipment

Personal protective equipment:

Avoid all unnecessary exposure. Wear suitable protective clothing.

Hand protection:

Wear chemically resistant protective gloves. The exact breakthrough time has to be found out by the manufacturer of the protective gloves and has to be observed. Gloves should be removed and replaced if there are any signs of degradation or breakthrough.

Eye protection:

Chemical goggles or face shield

Skin and body protection:

Wear suitable working clothes

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Respiratory protection:

In case of inadequate ventilation wear respiratory protection.

Thermal hazard protection:

Not required for normal conditions of use.

Other information:

Do not eat, drink or smoke during use. Handle in accordance with good industrial hygiene and safety procedures.

: No data available

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state : Liquid

Appearance : Colorless to straw-colored liquid.

Color : Colorless to straw yellow

Odor : Chlorine

Odor threshold : No data available

рН : 11 - 13 Melting point Not applicable Freezing point : No data available : 212 °F (100 °C) Boiling point Flash point : Not applicable Relative evaporation rate (butyl acetate=1) : No data available Flammability (solid, gas) : Not applicable. Vapor pressure : No data available

Relative vapor density at 20 °C : No data available
Relative density : 1.05 - 1.09 (Water = 1)
Solubility : Water: Miscible

Auto-ignition temperature : Not applicable

Decomposition temperature : No data available

Viscosity, kinematic : No data available

Viscosity, dynamic : No data available

Explosion limits : Not applicable

Explosive properties : Not applicable.

Oxidizing properties : Slightly oxidizing.

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Log Pow

Stable under recommended handling and storage conditions (see section 7).

10.2. Chemical stability

Slowly decomposes on contact with air.

10.3. Possibility of hazardous reactions

Contact with acids liberates toxic gas (chlorine).

10.4. Conditions to avoid

Extremely high or low temperatures.

10.5. Incompatible materials

Acids. alkalis. Water reactive materials. Organic solvents.

10.6. Hazardous decomposition products

Thermal decomposition generates: Chlorine.

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1	1.1.	Information	on toxico	logical effects

Acute toxicity (oral) : Not classified
Acute toxicity (dermal) : Not classified
Acute toxicity (inhalation) : Not classified

Sodium hypochlorite (7681-52-9)	
LD50 oral, rat	8830 mg/kg (12.5% Aqueous solution)
LD50 dermal, rabbit	> 20000 mg/kg (12.5% Aqueous solution)

Skin corrosion/irritation : Causes skin irritation.

pH: 11 - 13

Serious eye damage/irritation : Causes serious eye damage.

pH: 11 - 13

Respiratory or skin sensitization : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified
Reproductive toxicity : Not classified
Specific target organ toxicity – single exposure : Not classified

Sodium hypochlorite (7681-52-9)

Specific target organ toxicity – single exposure May cause respiratory irritation.

Specific target organ toxicity – repeated

exposure

: Not classified

Aspiration hazard : Not classified
Viscosity, kinematic : No data available
Symptoms/effects after skin contact : Causes skin irritation.

Symptoms/effects after eye contact : Causes serious eye damage.

Symptoms/effects after ingestion : Ingestion may cause irritation of the gastrointestinal tract.

SECTION 12: Ecological information

12.1. Toxicity

Ecology - general : Very toxic to aquatic life. Toxic to aquatic life with long lasting effects.

Sodium hypochlorite (7681-52-9)	
LC50 fish	0.023 - 0.052 mg/l - 96 Hours (Oncorhynchus gorbuscha)
EC50 Daphnia	0.141 mg/l - 48 Hours (Daphnia magna)
NOEC chronic fish	0.04 mg/l - 28 days (Menidia peninsulae)
NOEC chronic crustacea	0.007 mg/l - 15 days (estimated)

12.2. Persistence and degradability

HYPO-CHLOR® 5.25%	
Persistence and degradability	Readily biodegradable.

12.3. Bioaccumulative potential

HYPO-CHLOR® 5.25%	
Bioaccumulative potential	Low bioaccumulation potential.
Sodium hypochlorite (7681-52-9)	
Log Pow	-3.42 (20 °C, pH 12.5, Quantitative structure-activity relationship (QSAR))

12.4. Mobility in soil

HYPO-CHLOR® 5.25%	
Ecology - soil	Very mobile.

12.5. Other adverse effects

Other information : Avoid release to the environment.

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SECTION 13: Disposal considerations

13.1. Disposal methods

Waste disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Ecology - waste materials : Avoid release to the environment.

SECTION 14: Transport information

Department of Transportation (DOT)

In accordance with DOT

Transport document description : UN1791 Hypochlorite solutions, 8, III

UN-No.(DOT) : UN1791

Proper Shipping Name (DOT) : Hypochlorite solutions

Transport hazard class(es) (DOT) : 8 - Class 8 - Corrosive material 49 CFR 173.136

Packing group (DOT) : III - Minor Danger Hazard labels (DOT) : 8 - Corrosive



Dangerous for the environment : Yes

Marine pollutant : Yes



DOT Packaging Non Bulk (49 CFR 173.xxx) : 203
DOT Packaging Bulk (49 CFR 173.xxx) : 241

DOT Special Provisions (49 CFR 172.102) : IB3, N34, T4, TP2, TP24

DOT Packaging Exceptions (49 CFR 173.xxx) : 154
DOT Quantity Limitations Passenger aircraft/rail : 5 L

(49 CFR 173.27)

DOT Quantity Limitations Cargo aircraft only (49 : 60 L

CFR 175.75)

DOT Vessel Stowage Location : B
DOT Vessel Stowage Other : 26
Emergency Response Guide (ERG) Number : 154

Other information : No supplementary information available.

Transportation of Dangerous Goods

Transport document description : UN1791 HYPOCHLORITE SOLUTION, 8, III

UN-No. (TDG) : UN1791

Proper Shipping Name (Transportation of : HYPOCHLORITE SOLUTION

Dangerous Goods)

TDG Primary Hazard Classes : 8 - Class 8 - Corrosives
Packing group : III - Minor Danger

Transport by sea

Transport document description (IMDG) : UN 1791 HYPOCHLORITE SOLUTION, 8, III, MARINE POLLUTANT/ENVIRONMENTALLY

HAZARDOUS

UN-No. (IMDG) : 1791

Proper Shipping Name (IMDG) : HYPOCHLORITE SOLUTION Class (IMDG) : 8 - Corrosive substances

Packing group (IMDG) : III - substances presenting low danger

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Marine pollutant : Yes



Air transport

Transport document description (IATA) : UN 1791 Hypochlorite solution, 8, III, ENVIRONMENTALLY HAZARDOUS

UN-No. (IATA) : 1791

Proper Shipping Name (IATA) : Hypochlorite solution Class (IATA) : 8 - Corrosives Packing group (IATA) : III - Minor Danger

SECTION 15: Regulatory information

15.1. US Federal regulations

HYPO-CHLOR® 5.25%	
SARA Section 311/312 Hazard Classes	Physical hazard - Corrosive to metals
	Health hazard - Serious eye damage or eye irritation
	Health hazard - Skin corrosion or Irritation

Sodium hypochlorite (7681-52-9)	
Listed on the United States TSCA (Toxic Substances Control Act) inventory Not subject to reporting requirements of the United States SARA Section 313	
CERCLA RQ 100 lb	

15.2. International regulations

CANADA

Sodium hypochlorite (7681-52-9)

Listed on the Canadian DSL (Domestic Substances List)

EU-Regulations

No additional information available

National regulations

No additional information available

15.3. US State regulations

California Proposition 65 - This product does not contain any substances known to the state of California to cause cancer, developmental and/or reproductive harm

Component	State or local regulations
Sodium hypochlorite(7681-52-9)	U.S New Jersey - Right to Know Hazardous Substance List; U.S Pennsylvania - RTK (Right to Know) List

SECTION 16: Other information

Revision date : 06/25/2019

Data sources : US OSHA HazCom (GHS) 25 May 2012.

Full text of H-phrases:

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H290	May be corrosive to metals
H314	Causes severe skin burns and eye damage
H315	Causes skin irritation
H318	Causes serious eye damage

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H335	May cause respiratory irritation	
H400	Very toxic to aquatic life	
H410	Very toxic to aquatic life with long lasting effects	
H411	Toxic to aquatic life with long lasting effects	

Abbreviations and acronyms:

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	ACGIH (American Conference of Government Industrial Hygienists)		
	ATE (Acute Toxicity Estimate)		
	CAS (Chemical Abstracts Service) number		
	DNEL (Derived No Effect Level)		
	EC50 (Effective Concentration 50%)		
	IARC (International Agency for Research on Cancer)		
	IATA (International Air Transport Association)		
	IMDG (International Maritime Dangerous Goods Code)		
	IMO (International Maritime Organisation)		
	LC50 (Lethal Concentration 50%) LD50 (Lethal Dose 50%) OECD (Organisation for Economic Co-operation and Development)		
	OSHA (Occupational Safety and Health Administration) (US)		
	PBT (Persistent, Bioaccumulative and Toxic)		
	PNEC (Predicted No Effect Concentration) STEL (Short Term Exposure Limit)		
	TSCA (Toxic Substances Control Act) (US)		
	TWA (Time Weighted Average)		
	UNxxxx (Number assigned by the United Nations Committee of Experts on the Transport of Dangerous Goods)		
	vPvB (very Persistent and very Bioaccumulative)		

NFPA health hazard

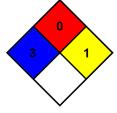
: 3 - Materials that, under emergency conditions, can cause serious or permanent injury.

NFPA fire hazard

: 0 - Materials that will not burn under typical fire conditions, including intrinsically noncombustible materials such as concrete, stone, and sand.

NFPA reactivity

: 1 - Materials that in themselves are normally stable but can become unstable at elevated temperatures and pressures.



Hazard Rating

Health

: 3 Serious Hazard - Major injury likely unless prompt action is taken and medical treatment is given

Flammability

: 0 Minimal Hazard - Materials that will not burn

Physical

: 1 Slight Hazard - Materials that are normally stable but can become unstable (self-react) at high temperatures and pressures. Materials may react non-violently with water or undergo hazardous polymerization in the absence of inhibitors.

Indication of changes:

Section	Changed item	Change	Comments
1	Identification	Modified	
12.	Ecological information	Modified	
16	Other information	Modified	

SDS US (GHS HazCom 2012)

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This SDS has been translated into the official language of the country/region in which the product is to be placed on the market. Where no official translation exists, the regulatory text is reported in English, as it appears in the relevant regulatory text.

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