

Trade name: Steramine®

1 Identification of the substance/mixture and of the company/undertaking

• 1.1 Product identifier

• Trade name: Steramine® ST-13, ST-147, ST-204, ST-718, ST-722, ST-723, ST-767, ST-906, ST-1266,

ST-1267, ST-2010

• Article number: SL10 EPA Registration No. 10324-63-3640

• 1.2 Relevant identified uses of the substance or mixture and uses advised against

No further relevant information available.

• Application of the substance / the preparation Surface Disinfectant and Sanitizer.

Product dilution information: 1 fl. oz. (29.57 ml) 1-1/4 gallons of water for disinfection.

1-2 oz. (29.57-59.14 ml) per 4 gallons of water for food contact saniting.

• 1.3 Details of the supplier of the Safety Data Sheet

Stearns Packaging Corporation 4200 Sycamore Avenue (53714)

PO Box 3216

Madison, WI 53704-0216 Phone: 800-655-5008

Email: stearns@stearnspkg.com Website: www.stearnspkg.com

• 1.4 Emergency telephone number:

ChemTel Inc.

(800)255-3924, +1 (813)248-0585

2 Hazards identification

• 2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008		
ISE DILUTION		
eye irritation.		
e		

Classification according to Directive 67/548/EEC or Directive 1999/45/EC

C: Corrosive	Xi: Irritant
R34: Causes burns.	R36: Causes eye irritation.

• Information concerning particular hazards for human and environment:

The product has to be labeled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

The product has to be labeled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

· Classification system:

The classification is according to the latest editions of the EU-lists, and extended by company and literature data.

The classification is in accordance with the latest editions of international substances lists, and is supplemented by information from technical literature and by information provided by the company.

Trade name: Steramine®	
	(Contd. from page 1)
• 2.2 Label elements	
Labeling according to Regulation (EC) No 1272/2008	
Product as SOLD	Product at USE DILUTION
The product is classified and labeled according to the CLP regulation.	The product is classified and labeled according to the CLP regulation.
Hazard pictograms	
GHS05	None
Signal word Danger	Warning
Hazard-determining components of labelling:	
Alkyl (C12-C14) Dimethyl (Ethylbenzyl) Ammonium Chloride Alkyl (C12,C14,C16,C18) Dimethyl Benzyl Ammonium Chloride	Alkyl (C12-C14) Dimethyl (Ethylbenzyl) Ammonium Chloride Alkyl (C12,C14,C16,C18) Dimethyl Benzyl Ammonium Chloride
Hazard statements	
H314+H318 Causes severe burns and serious eye damage.	H320 Causes eye irritation.
Precautionary statements	
P280 Wear protective gloves/eye protection. P264 Wash hands thoroughly after handling. P260 Do not breathe mists. P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. P337+P313: If eye irritation persists get medical advice/attention P303+P361+P353+P363: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water. Wash contaminated clothing before reuse. P332+P313 If skin irritation occurs: Get medical advice/attention. P301+P330+P331: IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. P304+P340: IF INHALED: Remove person to fresh air and keep comfortable for breathing. P310: Immediately call a POISON CENTER or doctor. P405: Store locked up. P501 Dispose of contents/container in accordance with local	Wash hands thoroughly after handling. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If eye irritation persists get medical attention.

3 Composition/information on ingredients

• 3.2 Mixtures

regulations.

• Description: Mixture of substances listed below with nonhazardous additions.

Dangerous components:		
CAS: 85409-23-0	Alkyl (C12-C14) Dimethyl (Ethylbenzyl) Ammonium Chloride	<5%
	C R34; Xn R22; Xi R37]
	Skin Corr. 1B, H314; Eye Dam. 1, H318	
	Acute Tox. 4, H302; STOT SE 3, H335	
CAS: 68391-01-5	Alkyl (C12,C14,C16,C18) Dimethyl Benzyl Ammonium Chloride	<5%
	C R35; ■ Xn R22; ■ Xi R41	
	Skin Corr. 1A, H314; Eye Dam. 1, H318	
	Acute Tox. 4. H302	

• Additional information: For the wording of the listed risk phrases refer to section 16.

Trade name: Steramine®

(Contd. from page 2)

4 First-aid measures

Product as SOLD	Product at USE DILUTION
General information: Take affected persons out into the fresh air.	No special measures required.
 After inhalation: Supply fresh air; consult doctor in case of complaints. 	Remove victim to fresh air and keep comfortable for breathing.
After skin contact: Immediately rinse with water. Immediately remove any clothing soiled by product. If skin irritation continues, consult a doctor.	If irritation occurs, rinse skin with water. If irritation persists get medical attention.
After eye contact: Remove contact lenses if worn. Rinse opened eye for several minutes under running water. Then consult a doctor.	Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If eye irritation persists get medical attention.
After swallowing: Rinse out mouth and then drink plenty of water. Do not induce vomiting; call for medical help immediately.	Rinse mouth. Do NOT induce vomiting. Call a POISON CENTER or doctor/physician if you feel unwell.
4.2 Most important symptoms and effects, both acute and delayed Strong caustic effect on skin and mucous membranes. Gastric or intestinal disorders. Nausea Headache Dizziness Coughing	No known effects.
Hazards Danger of severe eye injury. Danger of gastric perforation. Danger of impaired breathing.	No known effects.
• 4.3 Indication of any immediate medical attention and spe	cial treatment needed
Monitor circulation, possible shock treatment.	Treat symptomatically.
Medical supervision for at least 48 hours.	
If necessary oxygen respiration treatment.	
If swallowed, gastric irrigation.	

5 Fire-fighting measures

- 5.1 Extinguishing media
- Suitable extinguishing agents: Use fire extinguishing methods suitable to surrounding conditions.
- For safety reasons unsuitable extinguishing agents: None.
- 5.2 Special hazards arising from the substance or mixture During heating or in case of fire poisonous gases are produced.
- 5.3 Advice for firefighters
- Protective equipment:

Wear self-contained respiratory protective device.

Wear fully protective suit.

• Additional information No further relevant information available.

Trade name: Steramine®

(Contd. from page 3)

6 Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures		
Product as SOLD Product at USE DILUTION		
Use respiratory protective device against the effects of fumes/dust/aerosol. Wear protective equipment. Keep unprotected persons away. Ensure adequate ventilation Particular danger of slipping on leaked/spilled product.	Use personal protective equipment as required.	
6.2 Environmental precautions:		
Do not allow to enter sewers/ surface or ground water. Inform respective authorities in case of seepage into water course or sewage system.	Avoid contact of large amounts of spilled material and run off with soil and surface waterways.	
6.3 Methods and material for containment and cleaning up:		
Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust). Dispose contaminated material as waste according to item 13. Send for recovery or disposal in suitable receptacles.	Large Spills: Flush area with water. Prevent entry into waterways. Small Spills: Wipe up with absorbent material.	
6.4 Reference to other sections		
See Section 7 for information on safe handling. See Section 8 for information on personal protection equipment. See Section 13 for disposal information.	See Section 7 for information on safe handling. See Section 8 for information on personal protection equipment. See Section 13 for disposal information.	

7 Handling and storage

• 7.1 Precautions for safe handling		
Product as SOLD	Product at USE DILUTION	
Prevent formation of aerosols. Store in cool, dry place in tightly closed receptacles. Avoid splashes or spray in enclosed areas. Use only in well ventilated areas.	No special measures required.	
Information about fire - and explosion protection:		
No special measures required.	No special measures required.	
• 7.2 Conditions for safe storage, including any incompati	ibilities	
• Storage:		
• Requirements to be met by storerooms and receptacles:		
Avoid storage near extreme heat, ignition sources or open flame. Unsuitable material for receptacle: aluminium. Unsuitable material for receptacle: steel.	Keep out of reach of children.	

(Contd. on page 5)

Trade name: Steramine®

(Contd. from page 4)

Product as SOLD	Product at USE DILUTION	
Information about storage in one common storage facility:		
Store away from foodstuffs. Store away from oxidizing agents. Store away from reducing agents. Do not store together with acids.	No storage precautions necessary.	
• Further information about storage conditions:		
Keep container tightly closed. Protect from freezing.	No storage precautions necessary.	
• 7.3 Specific end use(s) No further relevant information available.		

8 Exposure controls/personal protection

 Additional information about design of technical facilities: No further data; see item 7. 		
Product as SOLD Product at USE DILUTION		
8.1 Control parameters		
• Ingredients with limit values that require monitoring at t	the workplace:	
The product does not contain any relevant quantities of materior DNELs No further relevant information available. • PNECs No further relevant information available. • Additional information: The lists valid during the making was a superior of the product of the produc	als with critical values that have to be monitored at the workplace.	
• 8.2 Exposure controls		
Personal protective equipment:		
General protective and hygienic measures:		
The usual precautionary measures are to be adhered to when handling chemicals. Keep away from foodstuffs, beverages and feed. Immediately remove all soiled and contaminated clothing. Wash hands before breaks and at the end of work. Avoid contact with the eyes and skin. Do not inhale gases / fumes / aerosols.	Not required under normal conditions of use.	
Respiratory protection:		
Use suitable respiratory protective device in case of insufficient ventilation. Use suitable respiratory protective device when aerosol or mist is formed. For spills, respiratory protection may be advisable. NIOSH approved organic vapor respirator equipped with a dust/mist prefilter should be used.	A respirator is not required under normal and intended conditions of use.	
Protection of hands:		
Protective gloves	No protective equipment is needed under normal conditions.	



The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation.

Trade name: Steramine®

(Contd. from page 5)

Product as SOLD	Product at USE DILUTION	
Material of gloves		
The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.	No protective equipment is needed under normal conditions.	
Penetration time of glove material		
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.	No protective equipment is needed under normal conditions.	
• For the permanent contact gloves made of the following r	materials are suitable:	
Neoprene gloves Butyl rubber, BR Nitrile rubber, NBR	No protective equipment is needed under normal conditions.	
Eye protection:		
Safety glasses	No protective equipment is needed under normal conditions.	
Body protection:		
Protective work clothing	No protective equipment is needed under normal conditions.	
• Limitation and supervision of exposure into the environm	ent	
No further relevant information available.	No further relevant information available.	
Risk management measures		
See Section 7 for additional information. No further relevant information available.	See Section 7 for additional information. No further relevant information available.	

9 Physical and chemical properties

	Product as SOLD	Product at USE DILUTION
9.1 Information on basic physical a	and chemical properties	
General Information Appearance: Form: Color: Odor: Odor threshold:	Liquid Clear Like aldehyde Not determined.	Liquid Clear Odorless Not determined.
• pH-value at 20 °C:	7.0 - 9.0 for concentrate	7.0 ± 0.5
Change in condition Melting point/Melting range: Boiling point/Boiling range:	Undetermined. Undetermined.	Not applicable. 100° C / 212° F
• Flash point:	>212 °F / >100 °C	Not determined.
Flammability (solid, gaseous):	Not applicable.	Not applicable.

(Contd. on page 7)

Trade name: Steramine®

		(Contd. from pag
	Product as SOLD	Product at USE DILUTION
• Ignition temperature:	Not determined.	Not applicable.
• Self-igniting:	Product is not self-igniting.	Product is not self-igniting.
Danger of explosion:	Product does not present an explosion hazard.	Product does not present an explosion hazard.
• Explosion limits: Lower: Upper:	Not determined. Not determined.	Not determined. Not determined.
• Vapor pressure at 20 °C:	23 hPa	Not determined.
 Density at 20 °C: Relative density Vapor density Evaporation rate 	0.99 g/cm³ Not determined. Not applicable. Not applicable.	1.00 g/cm³ Not determined. Not applicable. Not applicable.
Solubility in / Miscibility with water:	Fully miscible.	Complete
Partition coefficient (n-octanol/water):	Not determined.	Not determined.
Viscosity: Dynamic: Kinematic:	Not applicable. Not applicable.	Not determined. Not determined.
• 9.2 Other information	No further relevant information available.	No further relevant information available.

10 Stability and reactivity

- 10.1 Reactivity Not determined.
- 10.2 Chemical stability
- Thermal decomposition / conditions to be avoided:

No decomposition if used and stored according to specifications.

10.3 Possibility of hazardous reactions

Reacts with reducing agents.

Reacts with oxidizing agents.

Contact with acids releases toxic gases.

Contact with acids releases irritant gases.

Toxic fumes may be released if heated above the decomposition point.

Reacts with certain metals.

- 10.4 Conditions to avoid Store away from oxidizing agents.
- 10.5 Incompatible materials:

Warning! Do not use together with other products. May release dangerous gases (chlorine).

• 10.6 Hazardous decomposition products:

Hydrocarbons

Carbon monoxide and carbon dioxide

Chlorine compounds

Ammonia

Trade name: Steramine®

(Contd. from page 7)

Product as SOLD		duct as SOLD	Product at USE DILUTION	
• 11.1 Information on toxicological effects		icological effects		
Acute toxic	ity:			
• LD/LC50	values relev	ant for classification	Non-toxic at use-dilution.	
68391-01-5 Alkyl (C12,C14,C16,C18) Dimethyl Benzyl Ammonium Chloride		C14,C16,C18) Dimethyl Benzyl		
Oral	LD50	650 mg/kg (rat)		
Primary irri	tant effect:			
on the skin				
Caustic effe	ct on skin an	d mucous membranes.	Non-hazardous at use-dilution.	
on the eye:				
Strong caus	tic effect.		Non-hazardous at use-dilution.	
Sensitization: No sensitizing effects known.		zing effects known.	No sensitizing effects known.	
Additional t	oxicologica	l information:		
		ollowing dangers according to the cal- for Preparations as issued in the late		
Corrosive Swallowing will lead to a strong caustic effect on mouth and throat and to the danger of perforation of esophagus and stomach.			Not classified No known significant effects or critical hazards.	
Acute effec	ts (acute tox	cicity, irritation and corrosivity):		
Danger three	ugh skin abs	orntion	Non-hazardous at use-dilution.	

12 Ecological information

- 12.1 Toxicity
- Aquatic toxicity: This product contains materials that are harmful to the environment.
- 12.2 Persistence and degradability biodegradable
- 12.3 Bioaccumulative potential No further relevant information available.
- 12.4 Mobility in soil No further relevant information available.
- Ecotoxical effects:
- Remark: Harmful to algae
- Additional ecological information:
- General notes:

This statement was deduced from products with similar structure or composition.

Water hazard class 2 (German Regulation) (Self-assessment): hazardous for water

Must not reach sewage water or drainage ditch undiluted or unneutralized.

Do not allow product to reach ground water, water course or sewage system.

Due to available data on eliminability/decomposition and bioaccumulation potential a prolonged damage of the environment is unlikely.

- 12.5 Results of PBT and vPvB assessment
- PBT: Not applicable.
- vPvB: Not applicable.
- 12.6 Other adverse effects No further relevant information available.

Trade name: Steramine®

(Contd. from page 8)

13 Disposal considerations

• 13.1 Waste treatment methods		
Product as SOLD	Product at USE DILUTION	
Recommendation		
Small amounts may be diluted with plenty of water and washed away. Dispose of bigger amounts in accordance with Local Authority requirements. Can be burned with household garbage after consulting with the waste disposal facility operator and the pertinent authorities and adhering to the necessary technical regulations.	Diluted product can be flushed to sanitary sewer. Discard empty container in trash.	
Uncleaned packaging:		
• Recommendation: Disposal must be made according to official regulations.	Diluted product can be flushed to sanitary sewer. Discard empty container in trash.	
 Recommended cleansing agents: Water, if necessary together with cleansing agents. 		

14	Trans	port	info	rmation
		PULL		····

Product as SOLD	
• 14.1 UN-Number • DOT, ADR, ADN, IMDG, IATA	UN1903
• 14.2 UN proper shipping name • DOT (ST-13, ST-718, ST-722, ST-723, ST-767, ST-906, ST-1266, ST-1267)	Disinfectants, NOI, liquid
• DOT (ST-147, ST-204, ST-2010)	UN1903, disinfectants, liquid, corrosive, n.o.s. (quaternary ammonium compound), 8, PG III
• ADR	1903 DISINFECTANT, LIQUID, CORROSIVE, N.O.S. (Alkyl dimethyl ethyl benzyl ammonium chloride, quaternary ammonium compound, benzyl-C12-18-alkydimethyl, chlorides)
• IMDG, IATA	DISINFECTANT, LIQUID, CORROSIVE, N.O.S. (Alkyl dimethyl ethyl benzyl ammonium chloride, quaternary ammonium compound, benzyl-C12-18-alkydimethyl, chlorides)
• 14.3 Transport hazard class(es)	
• DOT (ST-13, ST-718, ST-722, ST-723, ST-767, ST-906, ST-1266, ST-1267)	
• Class • Label	Not applicable. LTD. QTY.

Trade name: Steramine®

	(Contd. from pa
• DOT (ST-147, ST-204, ST-2010)	
C01610 SWE	
Class	8 Corrosive substances.
Label	8
ADR	
CORROSVE	
Class	8 (C9) Corrosive substances.
· Label	8
· IMDG, IATA	
COMPOSITE	
Class	8 Corrosive substances.
Label	8
• 14.4 Packing group • DOT, ADR, IMDG, IATA	III
• 14.5 Environmental hazards:	III
• Marine pollutant:	No
• 14.6 Special precautions for user	Warning: Corrosive Substances
Danger Code:	80
EMS Number	F-A,S-B
14.7 Transport in bulk according to Annex II of	
MARPOL73/78 and the IBC Code	Not applicable.
Transport/Additional information:	
ADR	
Limited quantities (LQ)	5L
Transport category	3
Tunnel restriction code	E
• UN "Model Regulation": (ST-13, ST-718, ST-722, ST-723, ST-767, ST-906, ST-1266, ST-1267)	Disinfectants, NOI, liquid
UN "Model Regulation": (ST-147, ST-204, ST-2010)	UN1903, disinfectants, liquid, corrosive, n.o.s. (quaternary
	ammonium compound), 8, PG III. Item 44155, Sub 4, Class 70
	IIGIII 44 100, OUD 4, CIASS 70

15 Regulatory information

- 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture United States (USA)
- SARA

Product as SOLD Product at USE DILUTION		
Section 355 (extremely hazardous substances):		
None of the ingredients is listed.	Not applicable.	

(Contd. on page 11)

Trade name: Steramine®

	(Contd. from page
Product as SOLD	Product at USE DILUTION
Section 313 (Specific toxic chemical listings):	
None of the ingredients is listed.	None of the ingredients is listed.
TSCA (Toxic Substances Control Act):	
All ingredients are listed.	All ingredients are listed.
Proposition 65 (California):	
Chemicals known to cause cancer:	
None of the ingredients is listed.	None of the ingredients is listed.
Chemicals known to cause reproductive toxicity for fer	nales:
None of the ingredients is listed.	None of the ingredients is listed.
Chemicals known to cause reproductive toxicity for ma	iles:
None of the ingredients is listed.	None of the ingredients is listed.
Chemicals known to cause developmental toxicity:	
None of the ingredients is listed.	None of the ingredients is listed.
Carcinogenic Categories	
EPA (Environmental Protection Agency)	
None of the ingredients is listed.	None of the ingredients is listed.
IARC (International Agency for Research on Cancer)	
None of the ingredients is listed.	None of the ingredients is listed.
TLV (Threshold Limit Value established by ACGIH)	
None of the ingredients is listed.	None of the ingredients is listed.
NIOSH-Ca (National Institute for Occupational Safety a	nd Health)
None of the ingredients is listed.	None of the ingredients is listed.
OSHA-Ca (Occupational Safety & Health Administration	
All ingredients are listed.	All ingredients are listed.
Canada	
Canadian Domestic Substances List (DSL)	
All ingredients are listed.	All ingredients are listed.
Canadian Ingredient Disclosure list (limit 0.1%)	
- · · · · · · · · · · · · · · · · · · ·	Name of the formation to the dead
None of the ingredients is listed.	None of the ingredients is listed.
	None of the ingredients is listed.

Trade name: Steramine®

(Contd. from page 11)

16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

Relevant phrases

H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.
H320	Causes eye irritation.
H335	May cause respiratory irritation.

R22 Harmful if swallowed. R34 Causes burns. **R35** Causes severe burns. R36 Causes eye irritation Irritating to respiratory system. R37 R41 Risk of serious damage to eyes.

Product as SOLD	
 Hazardous Material Information System (U.S.A.) 	

Health	2
Flammability	0
Physical hazards	0

4=Very High; 3=High; 2=Moderate; 1=Slight; 0=Insignificant

Health 1 **Flammability** 0 **Physical hazards** 0

4=Very High; 3=High; 2=Moderate; 1=Slight; 0=Insignificant

Product at USE DILUTION

• NFPA ratings (scale 0 - 4)



Health = 2

Fire = 0

Reactivity = 0



Health = 1

Fire = 0

Reactivity = 0

SDS File Name: SL10 Steramine SDS

Abbreviations and acronyms:

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

DOT: US Department of Transportation

IATA: International Air Transport Association
GHS: Globally Harmonized System of Classification and Labeling of Chemicals
ACGIH: American Conference of Governmental Industrial Hygienists

EINECS: European Inventory of Existing Commercial Chemical Substances ELINCS: European List of Notified Chemical Substances CAS: Chemical Abstracts Service (division of the American Chemical Society) NFPA: National Fire Protection Association (USA) HMIS: Hazardous Materials Identification System (USA)

WHMIS: Workplace Hazardous Materials Information System (Canada) DNEL: Derived No-Effect Level (REACH)

PNEC: Predicted No-Effect Concentration (REACH)

Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

Sources

SDS Prepared by:

ChemTel Inc. 1305 North Florida Avenue

Tampa, Florida USA 33602-2902

Toll Free North America 1-888-255-3924 Intl. +01 813-248-0573

Website: www.chemtelinc.com Revision: 03/02/2015

Steams Packaging Corporation makes no warranty, representation or guarantee as to the accuracy, sufficiency or completeness of the material set forth herein. It is the user's responsibility to determine the safety, toxicity and suitability of his own use, handling and disposal of this product. Since actual use by others is beyond our control, no warranty, expressed or implied, is made by Steams Packaging Corporation as to the effects of such use, the results to be obtained or the safety and toxicity of this product, nor does Steams Packaging Corporation assume any liability arising out of the use by others of this product referred to herein. The data in this SDS relates only to the specific material designated herein and does not relate to use in combination with any other material or in any process. Steams Packaging Corporation does not recommend blending this product with any other chemicals. All information, recommendations and data contained herein concerning this product are based upon information available at the time of writing from recognized technical sources.