Material Safety Data Sheet

Goggle Chemical Protective (RXSOL-64-2625-001)

http://www.ostrem.com/msds/English/S751%20MSDS.pdf

1. Product and Company Identifaction

Product Name	RXSOL-51-6004-025
Product Type	NO. 125 BOILER CLEANING COMPOUND

Company Details:

RX MARINE INTERNATIONAL
105, A wing , BSEL , TECH PARK.
VASHI ,NEW BOMBAY 400703 INDIA

Phone	+91 22 65113333 / 5555 / 9999
Fax	+91 22 2781 1318 :::AOH :0091 9821214367
Email	mail@rxmarine.com

2. Composition / informationon ingredients

INGREDIENT	%W/W	CAS number
lactic acid (88%)	15-40	79-33-4

3. Hazards Identification

Corrosive liquid. Causes burns. Harmful if swallowed.

4. First Aid Measures

Inhalation	Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.
Ingestion	Induce vomiting only on the direct advice of a poison control centre. Drink 1-2 glasses of water. Never give anything by mouth to an unconscious person. Get medical attention
Eye contact	Flush with plenty of water for at least 15 minutes. Get medical attention.
Skin contact	Remove contaminated clothing and flush with plenty of water.

5. Fire-fighting Measures

Flash point (test method)	Not applicable
Flammable limits (%)	Non-flammable
Lower	Not applicable
Upper	Not applicable
Fire extinguishing substances	Use extinguishing media appropriate for surrounding fire.
Autoignition temperatures	Not applicable
Hazardous combustion products	May liberate carbon monoxide, carbon dioxide and oxides of sodium.
Explosion data	

Sensitivity to mechanical impact	Not applicable
Sensitivity to static discharge	Not applicable
Special firefighting procedures	As for surrounding fire. Fire fighters should wear full protective clothing and self contained breathing equipment.

6. Accidental Release Measures

Personal precautions	Wear appropriate protective equipment.
Environmental precautions	Prevent from entering sewers, waterways or low areas.
Methods for cleaning up	Isolate hazard area and restrict access. Small spills: soak up with inert absorbent material and scoop into containers. Large spills: prevent contamination of waterways. Dike and pump into suitable containers. Clean up residual with absorbent material, place in appropriate container and flush with water.

7. Handling and Storage

Handling	Do not ingest. Avoid contact with eyes, skin and clothing. Wash thoroughly after handling.
Storage	Keep out of reach of children. Keep container tightly closed. Store in a cool, dry area.

8. Exposure controls and personal protection

Engineering controls	Provide exhaust ventilation to keep airborne levels below recommended exposure limits.
Respiratory protection	If exposure exceeds occupational exposure limits, use an appropriate NIOSH approved respirator
Eye protection	Chemical goggles. Wear a face shield if splashing hazards exists.
Other protection	Wear protective clothing as necessary to prevent skin contact.

Exposure limits:

INGREDIENT	ACGIH	OSHA	Other
lactic acid (88%)	Not available		

9. Physical and chemical properties

Physical state	Liquid
Solubility in water	100%
Boiling point	Not available
Vapour pressure	Not available
Vapour density	Not available
Evaporation rate	Not available
Freezing point	Not available
Odour threshold	Not available
Sp. Gravity	1.069
pH	1
Appearance & odour	Clear, colourless liquid

10. Stability and reactivity

Stability	Stable
Conditions of instability	Not available
Incompatibility	( ) Water (X) Oxidizers ( ) Acid (X) Base ( ) Other:
Conditions of reactivity	Reacts with metals
Hazardous decomposition products	Not available

11. Toxicological information

POTENTIAL ACUTE HEALTH EFFECTS

Inhalation	Corrosive to respiratory system.
Ingestion	Harmful if swallowed. Causes burns to mouth, throat and stomach.
Eye contact	Corrosive to eyes. Causes severe burns.
Skin contact	Corrosive to skin. Causes severe burns.
Skin absorption	Not applicable
POTENTIAL CHRONIC HEALTH EFFECTS	
Inhalation	Repeat or prolonged exposure may cause damage to lungs.
Ingestion	Not available
Eye contact	Not available
Skin contact	Not applicable
Skin absorption	Not applicable
Irritancy of product	See WHMIS criteria
Sensitization of product	Not available
Carcinogenicity:	
IARC (1, 2A or 2B)	No known significant effects.
ACGIH: (A1, A2 or A3)	No known significant effects.
Reproductive toxicity	No known significant effects.
Teratogenicity	No known significant effects.
Mutagenicity	No known significant effects.
Synergistic product	Not available

HAZARDOUS INGREDIENTS	CAS NO	TOXICITY DATA
lactic acid (88%)	79-33-4	LD50 Oral (rabbit) 37 LD50 Dermal (rabbit)

12. Ecological information

Ecotoxicological information	Not available
Other information	

13. Disposal considerations

Waste disposal	Disposal of all waste must be done according to local, provincial and federal regulations.

14. Transport information

TDG classification	Corrosive Liquid,Acidic,Organic,N.O.S.(lactic acid); 8;UN 3265,PG III

15. Regulatory information

WHMIS	E	Corrosive material

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

16. Other information

The information contained in this safety data sheet is given in good faith. It is accurate to the best of our knowledge and belief and represents the most up to date information. The information given in this data sheet does not constitute or replace the users own assessment of workplace risk as required by other health and safety legislation.

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1. Product and Company Identifaction

Product Name	RXSOL-51-6004-025
Product Type	Muriatic Acid

Company Details:

RX MARINE INTERNATIONAL
105, A wing , BSEL , TECH PARK.

VASHI ,NEW BOMBAY 400703 INDIA

Phone	+91 22 65113333 / 5555 / 9999
Fax	+91 22 2781 1318 :::AOH :0091 9821214367
Email	mail@rxmarine.com

2. Composition / informationon ingredients

INGREDIENT	%W/W	CAS number
muriatic acid	60-100	7647-01-0

3. Hazards Identification

Corrosive liquid. Causes burns. Harmful if swallowed.
Do not mix with bleach; poisonous chlorine gas will be liberated.

4. First Aid Measures

Inhalation	Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.
Ingestion	Induce vomiting only on the direct advice of a poison control centre. Drink 1-2 glasses of water. Never give anything by mouth to an unconscious person. Get medical attention
Eye contact	Flush with plenty of water for at least 15 minutes. Get medical attention.
Skin contact	Remove contaminated clothing and flush with plenty of water.

5. Fire-fighting Measures

Flash point (test method)	Not applicable
Flammable limits (%)	Non-flammable
Lower	Not applicable
Upper	Not applicable
Fire extinguishing substances	Use extinguishing media appropriate for surrounding fire.
Autoignition temperatures	Not applicable
Hazardous combustion products	Hydrogen and chlorine gas formed at temperatures over 1500C.
Explosion data	
Sensitivity to mechanical impact	Not applicable
Sensitivity to static discharge	Not applicable
Special firefighting procedures	As for surrounding fire.

6. Accidental Release Measures

Personal precautions	Wear appropriate protective equipment.
Environmental precautions	Prevent from entering sewers, waterways or low areas.

Methods for cleaning up	Isolate hazard area and restrict access. Small spills: soak up with inert absorbent material and scoop into containers. Large spills: prevent contamination of waterways. Dike and pump into suitable containers. Clean up residual with absorbent material, place in appropriate container and flush with water.

7. Handling and Storage

Handling	Do not ingest. Avoid contact with eyes, skin and clothing. Wash thoroughly after handling.
Storage	Keep out of reach of children. Keep container tightly closed. Store in a cool, dry area.

8. Exposure controls and personal protection

Engineering controls	Provide exhaust ventilation to keep airborne levels below recommended exposure limits.
Respiratory protection	If exposure exceeds occupational exposure limits, use an appropriate NIOSH approved respirator
Eye protection	Chemical goggles. Wear a face shield if splashing hazards exists.
Other protection	Wear protective clothing as necessary to prevent skin contact.

Exposure limits:

INGREDIENT	ACGIH	OSHA	Other
muriatic acid	5ppm PEL-C		

9. Physical and chemical properties

Physical state	Liquid
Solubility in water	Complete
Boiling point	90.5C
Vapour pressure	100mm Hg at 20C
Vapour density	1.268
Evaporation rate	1
Freezing point	-51C
Odour threshold	1-5ppm
Sp. Gravity	1.12
pH	1
Appearance & odour	colouless or slightly yellow, fuming liquid with a pungent odour

10. Stability and reactivity

STABILITY	Stable
Conditions of instability	Not available
Incompatibility	Incompatible with strong bases, metals, phosphines, acetylides, borides, carbides, silicides, vinyl acetate, formaldehyde, hypochlorites,
Conditions of reactivity	Not available
Hazardous decomposition products	Contact with hypochlorites (bleach) liberates chlorine gas. May react violently with incompatible substances.

11. Toxicological information

POTENTIAL ACUTE HEALTH EFFECTS

Inhalation	Irritating to respiratory system.
Ingestion	Harmful if swallowed. Causes burns to mouth, throat and stomach.
Eye contact	Corrosive to eyes. Causes severe burns.
Skin contact	Causes burns.
Skin absorption	Not availbale
POTENTIAL CHRONIC HEALTH EFFECTS	
Inhalation	Repeat or prolonged exposure may cause damage to lungs.
Ingestion	Not available
Eye contact	Not available
Skin contact	Not available
Skin absorption	Not available
Irritancy of product	See WHMIS criteria
Sensitization of product	Not available
Carcinogenicity:	
IARC (1, 2A or 2B)	No known significant effects.
ACGIH: (A1, A2 or A3)	No known significant effects.
Reproductive toxicity	No known significant effects.
Teratogenicity	No known significant effects.
Mutagenicity	No known significant effects.
Synergistic product	Not available

HAZARDOUS INGREDIENTS	CAS NO	TOXICITY DATA
muriatic acid	7647-01-0	LC50 (inhalation) mo LD50 (oral) rabbit:90

12. Ecological information

Ecotoxicological information	Not available
Other information	

13. Disposal considerations

Waste disposal	Disposal of all waste must be done according to local, provincial and federal regulations.

14. Transport information

TDG classification	HYDROCHLORIC ACID, Class 8, UN 1789, PG II

15. Regulatory information

WHMIS	E	Corrosive material
	D1A	Very Toxic Material

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

16. Other information

The information contained in this safety data sheet is given in good faith. It is accurate to the best of our knowledge and belief and represents the most up to date information. The information given in this data sheet does not constitute or replace the users own assessment of workplace risk as required by other health and safety legislation.