KRONES colclean IC 5005

Safety Data Sheet

According to the United Nations GHS (Rev. 8, 2019)

Issue date:05/06/2020 Revision date: 05/06/2020 : Version: 1.0

SECTION 1: Identification

1.1. GHS Product identifier

Product form : Mixture

Trade name : KRONES colclean IC 5005

1.2. Other means of identification

Other means of identification : No information available

1.3. Recommended use of the chemical and restrictions on use

Use of the substance/mixture : Cleaning compound.

Recommended use : No information available

1.4. Supplier's details

Supplier

KIC KRONES Internationale Cooperationsgesellschaft mbH
Böhmerwaldstraße 5
93073 Neutraubling
Germany
T: +49940170-3020 – F: +49940170-3696
kic@kic-krones.com

Importer

KRONES LCS Center West Africa Ltd.
Acme Road, Ogba Industrial Scheme, Plot 7A, Block C
100211 Ikeja - Lagos
Nigeria
T: +234 1 463 11 30
helmut.rumm@krones.com.ng

1.5. Emergency phone number

Emergency number : +44 1235 239671 (NCEC, National Chemical Emergency Centre)

SECTION 2: Hazard identification

2.1. Classification of the substance or mixture

Classification according to the United Nations GHS

Corrosive to metals, Category 1	H290
Skin corrosion/irritation, Category 1	H314
Serious eye damage/eye irritation, Category 1	H318

Full text of H statements : see section 16

Adverse physicochemical, human health and environmental effects : No information available.

2.2. GHS Label elements, including precautionary statements

Labelling according to the United Nations GHS

Hazard pictograms (GHS UN) :

GHS05

Signal word (GHS UN) : Danger

Hazard statements (GHS UN) : H290 - May be corrosive to metals
H314 - Causes severe skin burns and eye damage

Precautionary statements (GHS UN) : P234 - Keep only in original packaging.
P260 - Do not breathe dust/fume/gas/mist/vapours/spray.
P264 - Wash thoroughly after handling.
P280 - Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.
P301+P330+P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting.
P303+P361+P353 - IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water .
P304+P340 - IF INHALED: Remove person to fresh air and keep 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/doctor.
P321 - Specific treatment see this label.
P363 - Wash contaminated clothing before reuse.
P390 - Absorb spillage to prevent material damage.
P405 - Store locked up.
P406 - Store in a corrosive resistant container with a resistant inner liner.
P501 - Dispose of contents/container in accordance with local/regional/national/international regulations.

2.3. Other hazards which do not result in classification

Other hazards not contributing to the classification : No information available

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%
Nitric acid	(CAS-No.) 7697-37-2	>= 10.00 - < 25.00
Sulfuric acid	(CAS-No.) 7664-93-9	>= 5.00 - < 10.00
Sodium p-cumenesulphonate	(CAS-No.) 15763-76-5	>= 5.00 - < 10.00
L-Lactic acid	(CAS-No.) 79-33-4	>= 5.00 - < 10.00
Hydroxyacetic acid	(CAS-No.) 79-14-1	< 2.50

Full text of H-statements: see section 16

SECTION 4: First-aid measures

4.1. Description of necessary first-aid measures

First-aid measures general : Take off immediately all contaminated clothing and wash it before reuse. In case of doubt or persistent symptoms, consult always a physician.

First-aid measures after inhalation : Remove person to fresh air and keep comfortable for breathing. If necessary seek medical advice.

First-aid measures after skin contact : Wash immediately with plenty of soap and water. Take off immediately all contaminated clothing. Call a physician immediately.

First-aid measures after eye contact : Remove contact lenses, if present and easy to do. Continue rinsing. Rinse cautiously with water for several minutes. Call a physician immediately.

First-aid measures after ingestion : Do NOT induce vomiting. Rinse mouth thoroughly with water. Never give anything by mouth to an unconscious person. Call a physician immediately.

4.2. Most important symptoms/effects, acute and delayed

Most Important Symptoms/Effects : Causes severe skin burns and eye damage.

4.3. Indication of immediate medical attention and special treatment needed, if necessary

Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1. Suitable extinguishing media

Suitable extinguishing media : Use extinguishing media appropriate for surrounding fire.

Unsuitable extinguishing media : High volume water jet.

5.2. Specific hazards arising from the chemical

Fire hazard : Thermal decomposition generates toxic vapours: carbon oxides, nitrogen oxides, sulfur oxides.

Hazardous decomposition products in case of fire : Toxic fumes may be released.

5.3. Special protective actions for fire-fighters

Protection during firefighting : Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Protective equipment : Wear personal protective equipment.

Emergency procedures : Ventilate spillage area. Remove all sources of ignition. Avoid contact with skin and eyes. Do not breathe dust/fume/gas/mist/vapours/spray.

6.1.2. For emergency responders

Protective equipment : Do not attempt to take action without suitable protective equipment. For further information refer to section 8: "Exposure controls/personal protection".

6.2. Environmental precautions

Avoid release to the environment. Do not discharge into drains or rivers. Advise local authorities if considered necessary.

6.3. Methods and materials for containment and cleaning up

For containment : Collect spillage.

Methods for cleaning up : Take up liquid spill into absorbent material. Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents).

Other information : Dispose of materials or solid residues at an authorized site.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Ensure good ventilation of the work station. Wear personal protective equipment. Respiratory protection equipment may be necessary. Keep away from sources of ignition. Avoid contact with skin and eyes. Do not breathe dust/fume/gas/mist/vapours/spray.

Hygiene measures : Keep away from food and drink. Do not eat, drink or smoke when using this product. Always wash hands after handling the product. Do not breathe dust/fume/gas/mist/vapours/spray. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Store in a well-ventilated place. Keep cool. Keep container tightly closed. Store in corrosive resistant container with a resistant inner liner. Keep only in original container. Store locked up.

Storage area : Containers which are opened should be properly resealed and kept upright to prevent leakage. Keep only in original container. Protect from heat and direct sunlight.

Incompatible materials : Alkalies, base metals

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Nitric acid (7697-37-2)	
EU - Occupational Exposure Limits	
IOELV STEL (mg/m³)	2.6 mg/m³
IOELV STEL (ppm)	1 ppm
India - Occupational Exposure Limits	
PEL TWA (mg/m³)	5 mg/m³
PEL TWA (ppm)	2 ppm
PEL STEL (mg/m³)	10 mg/m³
PEL STEL (ppm)	4 ppm
USA - ACGIH - Occupational Exposure Limits	
ACGIH TWA (ppm)	2 ppm
ACGIH STEL (ppm)	4 ppm

Sulfuric acid (7664-93-9)	
EU - Occupational Exposure Limits	
IOELV TWA (mg/m³)	0.05 mg/m³ (taking into account potential limitations and interferences which take place in the presence of other Sulphur compounds-mist)
India - Occupational Exposure Limits	
PEL TWA (mg/m³)	1 mg/m³
USA - ACGIH - Occupational Exposure Limits	
ACGIH TWA (mg/m³)	0.2 mg/m³ (thoracic particulate matter)
ACGIH chemical category	Suspected Human Carcinogen contained in strong inorganic acid mists

Monitoring methods	
Monitoring methods	No information available

8.2. Appropriate engineering controls

Appropriate engineering controls : Keep away from sources of ignition. Ensure good ventilation of the work station.

Environmental exposure controls : Avoid release to the environment.

8.3. Individual protection measures, such as personal protective equipment (PPE)

Hand protection	:	Protective gloves (EN 374) Appropriate Material: nitrile rubber Appropriate Material: butyl rubber
Eye protection	:	Safety glasses with side shields (EN 166)
Skin and body protection	:	Wear suitable protective clothing
Respiratory protection	:	In case of insufficient ventilation, wear suitable respiratory equipment
Thermal hazard protection	:	No information available.

8.4. Exposure limit values for the other components

No additional information available

SECTION 9: Physical and chemical properties

9.1. Basic physical and chemical properties

Physical state	:	Liquid
Appearance	:	Liquid
Colour	:	Colorless
Odour	:	Characteristic.
Odour threshold	:	Not available
Melting point	:	Not applicable
Freezing point	:	Not available
Boiling point	:	> 100 °C
Flammability (solid, gas)	:	Non flammable
Explosive limits	:	Not available
Lower explosive limit (LEL)	:	Not available
Upper explosive limit (UEL)	:	Not available
Flash point	:	Not available
Auto-ignition temperature	:	Not available
Decomposition temperature	:	Not available
pH	:	Ca. 1.6 (20 °C, 10 g/L)
pH solution	:	Not available
Viscosity, kinematic (calculated value) (40 °C)	:	Not available
Partition coefficient n-octanol/water (Log Kow)	:	Sulfuric acid (7664-93-9): Ca. -0.54 (25 °C, ECHA) Hydroxyacetic acid (79-14-1): -1.11 (19 °C)
Vapour pressure	:	Not available
Vapour pressure at 50 °C	:	Not available
Density	:	1.2 g/cm³ (20 °C)
Relative density	:	Not available
Relative vapour density at 20 °C	:	Not available
Solubility	:	Completely miscible.
Explosive properties	:	No data available
Oxidising properties	:	No data available

9.2. Data relevant with regard to physical hazard classes (supplemental)

Additional information : No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

Reactions with metals, with evolution of hydrogen. Exothermic reaction with: bases

10.4. Conditions to avoid

None under recommended storage and handling conditions (see section 7).

10.5. Incompatible materials
Alkalies, base metals.

10.6. Hazardous decomposition products
Nitrogen oxides, sulfur oxides.

SECTION 11: Toxicological information
11.1. Information on toxicological effects
Acute toxicity (oral) : Not classified

Acute toxicity (dermal) : Not classified

Acute toxicity (inhalation) : Not classified

KRONES colclean IC 5005	
LD50 oral rat	> 2000 mg/kg
LC50 inhalation rat (Gases)	> 20000 ppmV
LC50 inhalation rat (Vapours)	> 20 mg/L
LC50 inhalation rat (Dusts/Mists)	> 5 mg/L

Nitric acid (7697-37-2)	
LC50 inhalation rat (ppm)	2500 ppm/1h
LC50 inhalation rat (Vapours - mg/l/4h)	> 2.65 mg/L/4h (OECD 403, ECHA)

Sulfuric acid (7664-93-9)	
LD50 oral rat	2140 mg/kg (OECD 401, ECHA)
LC50 inhalation rat (mg/l)	85 – 103 mg/m³/1 h

L-Lactic acid (79-33-4)	
LD50 oral rat	3730 mg/kg
LD50 oral rat (female)	3543 mg/kg (EPA OPP 81-1, ECHA)
LD50 dermal rabbit	> 2000 mg/kg (EPA OPP 81-2, ECHA)
LC50 inhalation rat (Dusts/Mists)	> 7.94 mg/L/4 h (OECD 403, ECHA)

Hydroxyacetic acid (79-14-1)	
LD50 oral rat	1950 mg/kg
LC50 inhalation rat (mg/l)	3.6 mg/l/4h

Skin corrosion/irritation : Causes severe skin burns.
pH: Ca. 1.6 (20 °C, 10 g/L)

Serious eye damage/irritation : Causes serious eye damage.
pH: Ca. 1.6 (20 °C, 10 g/L)

Respiratory or skin sensitisation : L-Lactic acid: Non-sensitizing (guinea pig, with reference to CAS 28348-53-0, OECD 406, ECHA)

Germ cell mutagenicity : L-Lactic acid: Based on available data, the classification criteria are not met (Chromosome aberration test, with reference to CAS 28348-53-0, OECD 474, ECHA)

Carcinogenicity : Not classified

Reproductive toxicity : Sulfuric acid: Inhalational: NOAEC = 19.3 mg/m³/18 d. Based on available data, the classification criteria are not met (rabbit, OECD 414, ECHA)

STOT-single exposure : Not classified

STOT-repeated exposure : Sulfuric acid: Inhalational: LOAEC = 0.3 mg/m³/28 d. Based on available data, the classification criteria are not met (rat, OECD 412, ECHA)

Aspiration hazard : Not classified

SECTION 12: Ecological information
12.1. Toxicity
Ecology - general : The product is not considered harmful to aquatic organisms nor to cause long-term adverse effects in the environment. Before neutralisation, the product may represent a danger to aquatic organisms.

Hazardous to the aquatic environment, short-term (acute) : Not classified

Hazardous to the aquatic environment, long-term (chronic) : Not classified

Sulfuric acid (7664-93-9)	
LC50 fish 1	16 - 28 mg/L/96 h (Lepomis macrochirus, ECHA)
NOEC fish 1	0.025 mg/L/65 d (Jordanella floridae, ECHA)
EC50 crustacea 1	> 100 mg/L/48 h (Daphnia magna, OECD 202, ECHA)
NOEC crustacea 1	0.15 mg/L/35 d (T. dissimilis, ECHA)
EC50 algae 1	> 100 mg/L/72 h (Desmodesmus subspicatus, OECD 201, ECHA)

Hydroxyacetic acid (79-14-1)	
LC50 fish 1	> 5000 mg/L/96 h Brachydanio rerio [static]

12.2. Persistence and degradability

KRONES colclean IC 5005	
Persistence and degradability	No information available.

12.3. Bioaccumulative potential

Sulfuric acid (7664-93-9)	
Partition coefficient n-octanol/water (Log Kow)	Ca. -0.54 (25 °C, ECHA)

Hydroxyacetic acid (79-14-1)	
Partition coefficient n-octanol/water (Log Kow)	-1.11 (19 °C)

12.4. Mobility in soil

KRONES colclean IC 5005	
Mobility in soil	No additional information available

12.5. Other adverse effects

Ozone : Not classified

Other adverse effects : No additional information available

SECTION 13: Disposal considerations

13.1. Disposal methods

Waste treatment methods : Dispose of contents/container in accordance with licensed collector's sorting instructions.

Product/Packaging disposal recommendations : Dispose of contents/container in accordance with licensed collector's sorting instructions.

SECTION 14: Transport information

In accordance with IMDG / IATA / UN RTDG

UN RTDG	IMDG	IATA
14.1. UN number		
3264	3264	3264
14.2. UN Proper Shipping Name		
CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (Containing Nitric acid, Sulfuric acid)	CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (Containing Nitric acid, Sulfuric acid)	Corrosive liquid, acidic, inorganic, n.o.s. (Containing Nitric acid, Sulfuric acid)
14.3. Transport hazard class(es)		
8	8	8
		

14.4. Packing group		
II	II	II
14.5. Environmental hazards		
Dangerous for the environment : No	Dangerous for the environment : No Marine pollutant : No	Dangerous for the environment : No
No supplementary information available		

14.6. Special precautions for user

- UN RTDG

Special provisions (UN RTDG)	: 274
Limited quantities (UN RTDG)	: 1L
Excepted quantities (UN RTDG)	: E2
Packing instruction (UN RTDG)	: P001, IBC02
Portable tank and bulk container special instructions (UN RTDG)	: T11
Portable tank and bulk container special provisions (UN RTDG)	: TP2, TP27

- IMDG

Special provisions (IMDG)	: 274
Packing instructions (IMDG)	: P001
IBC packing instructions (IMDG)	: IBC02
Tank instructions (IMDG)	: T11
Tank special provisions (IMDG)	: TP2, TP27
EmS-No. (Fire)	: F-A - FIRE SCHEDULE Alfa - GENERAL FIRE SCHEDULE
EmS-No. (Spillage)	: S-B - SPILLAGE SCHEDULE Bravo - CORROSIVE SUBSTANCES
Stowage category (IMDG)	: B
Properties and observations (IMDG)	: Causes burns to skin, eyes and mucous membranes.

- IATA

PCA Excepted quantities (IATA)	: E2
PCA Limited quantities (IATA)	: Y840
PCA limited quantity max net quantity (IATA)	: 0.5L
PCA packing instructions (IATA)	: 851
PCA max net quantity (IATA)	: 1L
CAO packing instructions (IATA)	: 855
CAO max net quantity (IATA)	: 30L
Special provisions (IATA)	: A3, A803
ERG code (IATA)	: 8L

14.7. Transport in bulk according to IMO instruments

Not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations specific for the product in question

Nitric acid (7697-37-2)

Listed on the United States TSCA (Toxic Substances Control Act) inventory
Listed on the Canadian DSL (Domestic Substances List)
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)
Listed on the AICS (Australian Inventory of Chemical Substances)
Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China)
Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory
Listed on the Japanese ISHL (Industrial Safety and Health Law)
Listed on KECL/KECI (Korean Existing Chemicals Inventory)
Listed on NZIoC (New Zealand Inventory of Chemicals)
Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances)
Japanese Poisonous and Deleterious Substances Control Law
Listed on INSQ (Mexican National Inventory of Chemical Substances)
Listed on the TCSI (Taiwan Chemical Substance Inventory)

Sulfuric acid (7664-93-9)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Listed on the Canadian DSL (Domestic Substances List)
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)
Listed on IARC (International Agency for Research on Cancer)
Listed on the AICS (Australian Inventory of Chemical Substances)
Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China)
Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory
Listed on the Japanese ISHL (Industrial Safety and Health Law)
Listed on KECL/KECI (Korean Existing Chemicals Inventory)
Listed on NZIoC (New Zealand Inventory of Chemicals)
Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances)
Japanese Poisonous and Deleterious Substances Control Law
Listed on INSQ (Mexican National Inventory of Chemical Substances)
Listed on the TCSI (Taiwan Chemical Substance Inventory)

Sodium p-cumenesulphonate (15763-76-5)
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)
Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory
Listed on the Japanese ISHL (Industrial Safety and Health Law)
Listed on NZIoC (New Zealand Inventory of Chemicals)
Listed on the TCSI (Taiwan Chemical Substance Inventory)

L-Lactic acid (79-33-4)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Listed on the Canadian DSL (Domestic Substances List)
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)
Listed on the AICS (Australian Inventory of Chemical Substances)
Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China)
Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory
Listed on the Japanese ISHL (Industrial Safety and Health Law)
Listed on KECL/KECI (Korean Existing Chemicals Inventory)
Listed on NZIoC (New Zealand Inventory of Chemicals)
Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances)
Listed on INSQ (Mexican National Inventory of Chemical Substances)
Listed on the TCSI (Taiwan Chemical Substance Inventory)

Hydroxyacetic acid (79-14-1)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Listed on the Canadian DSL (Domestic Substances List)
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)
Listed on the AICS (Australian Inventory of Chemical Substances)
Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China)
Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory
Listed on the Japanese ISHL (Industrial Safety and Health Law)
Listed on KECL/KECI (Korean Existing Chemicals Inventory)
Listed on NZIoC (New Zealand Inventory of Chemicals)
Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances)
Japanese Poisonous and Deleterious Substances Control Law
Listed on INSQ (Mexican National Inventory of Chemical Substances)
Listed on the TCSI (Taiwan Chemical Substance Inventory)

SECTION 16: Other information

Issue date : 05/06/2020
Revision date : 05/06/2020

Indication of changes:
No information available.

Abbreviations and acronyms : ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
ADR - European Agreement concerning the International Carriage of Dangerous Goods by Road
EC50 - Median effective concentration
IATA - International Air Transport Association
IMDG - International Maritime Dangerous Goods
LC50 - Median lethal concentration
LD50 - Median lethal dose
RID - Regulations concerning the International Carriage of Dangerous Goods by Rail
SDS - Safety Data Sheet

Training advice : Normal use of this product shall imply use in accordance with the instructions on the packaging.

Other information : None.

Full text of H-statements:	
H290	May be corrosive to metals
H314	Causes severe skin burns and eye damage
H318	Causes serious eye damage

SDS UN

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.