

# Safety data sheet Safety data sheet

acc. to Regulation (EC) No. 1907/2006 (REACH)



## Sulphuric acid ROTIPURAN® 96 %, p.a., ISO

article number: **4623**  
Version: **5.0 en**  
Replaces version of: 2021-08-24  
Version: (4)

date of compilation: 2015-10-15  
Revision: 2023-09-21

## SECTION 1: Identification of the substance/mixture and of the company/undertaking

### 1.1 Product identifier

|                                 |  |
|---------------------------------|--|
| Identification of the substance | <b>Sulphuric acid ROTIPURAN® 96 %, p.a., ISO</b> |
| Article number                  | 4623   |
| Index No (GB CLP)               | 016-020-00-8                                     |
| EC number                       | 231-639-5  |
| CAS number                      | 7664-93-9  |

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

|                           |  |
|---------------------------|--|
| Relevant identified uses: | Laboratory chemical<br>Laboratory and analytical use   |
| Uses advised against:     | Do not use for squirting or spraying. Do not use for products which come into direct contact with the skin. Do not use for private purposes (household). Food, drink and animal feedingstuffs. |

### 1.3 Details of the supplier of the safety data sheet

Carl Roth GmbH + Co KG  
Schoemperlenstr. 3-5  
D-76185 Karlsruhe  
Germany

**Telephone:** +49 (0) 721 - 56 06 0

**Telefax:** +49 (0) 721 - 56 06 149

**e-mail:** [sicherheit@carlroth.de](mailto:sicherheit@carlroth.de)

**Website:** [www.carlroth.de](http://www.carlroth.de)

Competent person responsible for the safety data sheet: Department Health, Safety and Environment

**e-mail (competent person):** [sicherheit@carlroth.de](mailto:sicherheit@carlroth.de)

### 1.4 Emergency telephone number

| Name  | Street    | Postal code/city     | Telephone    | Website |
|---|-----------|----------------------|--------------|---------|
| National Poisons Information Service<br>City Hospital | Dudley Rd | B187QH<br>Birmingham | 844 892 0111 |         |

## SECTION 2: Hazards identification

### 2.1 Classification of the substance or mixture

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### Classification acc. to GHS

| Section | Hazard class                             | Cat-egory | Hazard class and category | Hazard statement |
|---------|--|-----------|---------------------------|------------------|
| 2.16    | Substance or mixture corrosive to metals | 1         | Met. Corr. 1              | H290             |
| 3.2     | Skin corrosion/irritation                | 1A        | Skin Corr. 1A             | H314             |
| 3.3     | Serious eye damage/eye irritation        | 1         | Eye Dam. 1                | H318             |

For full text of abbreviations: see SECTION 16

### The most important adverse physicochemical, human health and environmental effects

Skin corrosion produces an irreversible damage to the skin; namely, visible necrosis through the epidermis and into the dermis.

## 2.2 Label elements

### Labelling

#### Signal word

**Danger**

#### Pictograms

GHS05



#### Hazard statements

H290

May be corrosive to metals

H314

Causes severe skin burns and eye damage

#### Precautionary statements

##### Precautionary statements - prevention

P280

Wear protective gloves/protective clothing/eye protection/face protection

##### Precautionary statements - response

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 [or shower]

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

## 2.3 Other hazards

### Results of PBT and vPvB assessment

According to the results of its assessment, this substance is not a PBT or a vPvB.

### Endocrine disrupting properties

Does not contain an endocrine disruptor (EDC) in a concentration of  $\geq 0,1\%$ .

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## SECTION 3: Composition/information on ingredients

### 3.1 Substances

|                   |                                 |
|-------------------|---------------------------------|
| Name of substance | Sulphuric acid                  |
| Molecular formula | H <sub>2</sub> O <sub>4</sub> S |
| Molar mass        | 98,07 g/mol                     |
| CAS No            | 7664-93-9                       |
| EC No             | 231-639-5                       |
| Index No (GB CLP) | 016-020-00-8                    |

#### Substance, Specific Conc. Limits, M-factors, ATE

| Specific Conc. Limits  | M-Factors | ATE | Exposure route |
|--|-----------|-----|----------------|
| Skin Corr. 1A; H314: C ≥ 15 %<br>Skin Irrit. 2; H315: 5 % ≤ C < 15 %<br>Eye Dam. 1; H318: C ≥ 15 %<br>Eye Irrit. 2; H319: 5 % ≤ C < 15 % | -         | -   |                |

## SECTION 4: First aid measures

### 4.1 Description of first aid measures



#### General notes

Take off immediately all contaminated clothing. Self-protection of the first aider.

#### Following inhalation

Provide fresh air. In all cases of doubt, or when symptoms persist, seek medical advice.

#### Following skin contact

Remove mechanically (e.g. dab away using wadding or cellulose material) then thoroughly wash the affected skin with a mild cleansing agent and water. Immediate medical treatment required because corrosive injuries that are not treated are hard to cure.

#### Following eye contact

In case of contact with eyes flush immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart and consult an ophthalmologist. Protect uninjured eye.

#### Following ingestion

Rinse mouth immediately and drink plenty of water. Call a physician immediately. If swallowed danger of perforation of the esophagus and the stomach (strong corrosive effects).

### 4.2 Most important symptoms and effects, both acute and delayed

Corrosion, Gastric perforation, Risk of serious damage to eyes, Risk of blindness

### 4.3 Indication of any immediate medical attention and special treatment needed

none

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## SECTION 5: Firefighting measures

### 5.1 Extinguishing media



#### Suitable extinguishing media

co-ordinate firefighting measures to the fire surroundings  
water spray, dry extinguishing powder, BC-powder, carbon dioxide (CO<sub>2</sub>)

#### Unsuitable extinguishing media

water jet

### 5.2 Special hazards arising from the substance or mixture

Non-combustible.

#### Hazardous combustion products

In case of fire may be liberated: Sulphur oxides (SO<sub>x</sub>)

### 5.3 Advice for firefighters

In case of fire and/or explosion do not breathe fumes. Fight fire with normal precautions from a reasonable distance. Wear self-contained breathing apparatus. Wear full chemical protective clothing.

## SECTION 6: Accidental release measures

### 6.1 Personal precautions, protective equipment and emergency procedures



#### For non-emergency personnel

Use personal protective equipment as required. Avoid contact with skin, eyes and clothes. Do not breathe vapour/spray.

### 6.2 Environmental precautions

Keep away from drains, surface and ground water. Retain contaminated washing water and dispose of it. The product is an acid. Before discharge into sewage plants the product normally needs to be neutralised.

### 6.3 Methods and material for containment and cleaning up

#### Advice on how to contain a spill

Covering of drains.

#### Advice on how to clean up a spill

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents).

#### Other information relating to spills and releases

Place in appropriate containers for disposal.

### 6.4 Reference to other sections

Hazardous combustion products: see section 5. Personal protective equipment: see section 8. Incompatible materials: see section 10. Disposal considerations: see section 13.

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### SECTION 7: Handling and storage

#### 7.1 Precautions for safe handling

Handle and open container with care. Clear contaminated areas thoroughly.

#### Advice on general occupational hygiene

Wash hands before breaks and after work. Keep away from food, drink and animal feedingstuffs.

#### 7.2 Conditions for safe storage, including any incompatibilities

Keep container tightly closed. Store in a dry place. Hygroscopic.

#### Incompatible substances or mixtures

Observe hints for combined storage.

#### Protect against external exposure, such as

humidity

#### Consideration of other advice:

#### Specific designs for storage rooms or vessels

Recommended storage temperature: 15 - 25 °C

#### 7.3 Specific end use(s)

No information available.

### SECTION 8: Exposure controls/personal protection

#### 8.1 Control parameters

##### National limit values

##### Occupational exposure limit values (Workplace Exposure Limits)

| Country | Name of agent | CAS No    | Identifier | TWA [ppm] | TWA [mg/m <sup>3</sup> ] | STEL [ppm] | STEL [mg/m <sup>3</sup> ] | Ceiling-C [ppm] | Ceiling-C [mg/m <sup>3</sup> ] | Notation | Source      |
|---------|---------------|-----------|------------|-----------|--------------------------|------------|---------------------------|-----------------|--------------------------------|----------|-------------|
| EU      | sulfuric acid | 7664-93-9 | IOELV      |           | 0,05                     |            |                           |                 |                                | mist, t  | 2009/161/EU |
| GB      | sulfuric acid | 7664-93-9 | WEL        |           | 0,05                     |            |                           |                 |                                | t, mist  | EH40/2005   |

##### Notation

Ceiling-C Ceiling value is a limit value above which exposure should not occur

mist As mists

STEL Short-term exposure limit: a limit value above which exposure should not occur and which is related to a 15-minute period (unless otherwise specified)

t Thoracic fraction

TWA Time-weighted average (long-term exposure limit): measured or calculated in relation to a reference period of 8 hours time-weighted average (unless otherwise specified)

##### Human health values

| Relevant DNELs and other threshold levels |                        |                                    |                   |                         |
|---|------------------------|------------------------------------|-------------------|-------------------------|
| Endpoint                                  | Threshold level        | Protection goal, route of exposure | Used in           | Exposure time           |
| DNEL                                      | 0,05 mg/m <sup>3</sup> | human, inhalatory                  | worker (industry) | chronic - local effects |
| DNEL                                      | 0,1 mg/m <sup>3</sup>  | human, inhalatory                  | worker (industry) | acute - local effects   |

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### Environmental values

| Relevant PNECs and other threshold levels |                 |                   |                              |                              |
|---|-----------------|-------------------|------------------------------|------------------------------|
| End-point                                 | Threshold level | Organism          | Environmental compartment    | Exposure time                |
| PNEC                                      | 0,003 mg/l      | aquatic organisms | freshwater                   | short-term (single instance) |
| PNEC                                      | 0 mg/l          | aquatic organisms | marine water                 | short-term (single instance) |
| PNEC                                      | 8,8 mg/l        | aquatic organisms | sewage treatment plant (STP) | short-term (single instance) |
| PNEC                                      | 0,002 mg/kg     | aquatic organisms | freshwater sediment          | short-term (single instance) |
| PNEC                                      | 0,002 mg/kg     | aquatic organisms | marine sediment              | short-term (single instance) |

## 8.2 Exposure controls

### Individual protection measures (personal protective equipment)

#### Eye/face protection



Use safety goggle with side protection. Wear face protection.

#### Skin protection



#### • hand protection

Wear suitable gloves. Chemical protection gloves are suitable, which are tested according to EN 374. Check leak-tightness/impermeability prior to use. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves. The times are approximate values from measurements at 22 ° C and permanent contact. Increased temperatures due to heated substances, body heat etc. and a reduction of the effective layer thickness by stretching can lead to a considerable reduction of the breakthrough time. If in doubt, contact manufacturer. At an approx. 1.5 times larger / smaller layer thickness, the respective breakthrough time is doubled / halved. The data apply only to the pure substance. When transferred to substance mixtures, they may only be considered as a guide.

#### • type of material

FKM (fluoro rubber)

#### • material thickness

≥0,4 mm

#### • breakthrough times of the glove material

>480 minutes (permeation: level 6)

#### • Splash protection - Protective gloves

• type of material: Butyl caoutchouc (butyl rubber)

• material thickness: 0,7mm

• breakthrough times of the glove material: >120 minutes (permeation: level 4)

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### • other protection measures

Take recovery periods for skin regeneration. Preventive skin protection (barrier creams/ointments) is recommended.

### Respiratory protection



Respiratory protection necessary at: Aerosol or mist formation. Type: E (against acidic gases like sulphur dioxide or hydrogen chloride, colour code: Yellow). Type: B-P2 (combined filters for acidic gases and particles, colour code: Grey/White).

### Environmental exposure controls

Keep away from drains, surface and ground water.

## SECTION 9: Physical and chemical properties

### 9.1 Information on basic physical and chemical properties

|  |                                   |
|--|-----------------------------------|
| Physical state   | liquid                            |
| Colour   | colourless                        |
| Odour  | odourless                         |
| Melting point/freezing point                             | -15 °C                            |
| Boiling point or initial boiling point and boiling range | 295 – 315 °C                      |
| Flammability   | non-combustible                   |
| Lower and upper explosion limit                          | not determined                    |
| Flash point  | not determined                    |
| Auto-ignition temperature                                | not determined                    |
| Decomposition temperature                                | 338 °C                            |
| pH (value)   | <1 (20 °C)                        |
| Kinematic viscosity                                      | 14,62 mm <sup>2</sup> /s at 20 °C |
| Dynamic viscosity  | 26,9 mPa s at 20 °C               |
| <u>Solubility(ies)</u>                                   |                                   |
| Water solubility   | (soluble)                         |
| <u>Partition coefficient</u>                             |                                   |
| Partition coefficient n-octanol/water (log value):       | not relevant (inorganic)          |
| Vapour pressure  | <0,01 hPa at 20 °C                |
| <u>Density and/or relative density</u>                   |                                   |
| Density  | 1,84 g/cm <sup>3</sup> at 20 °C   |

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Relative vapour density information on this property is not available

Particle characteristics not relevant (liquid)

### Other safety parameters

Oxidising properties none

## 9.2 Other information

Information with regard to physical hazard classes:

Corrosive to metals category 1: corrosive to metals

Other safety characteristics: There is no additional information.

## SECTION 10: Stability and reactivity

### 10.1 Reactivity

It's a reactive substance. Substance or mixture corrosive to metals.

### 10.2 Chemical stability

The material is stable under normal ambient and anticipated storage and handling conditions of temperature and pressure.

### 10.3 Possibility of hazardous reactions

**Violent reaction with:** Aldehydes, Alkali (lye), Alkali metals, Ammonia (NH<sub>3</sub>), Bromates, Carbide, Chlorates, Alkaline earth metal, Halogenated hydrocarbons, Metals, Metal powder, Nitrate, Nitriles, Nitro compound, Organic substances, Perchlorates, Permanganates, Peroxides, Phosphorus, Phosphorus oxides (e.g. P<sub>2</sub>O<sub>5</sub>), Acids, Strong alkali, Water, Hydrogen peroxide

### 10.4 Conditions to avoid

Keep away from heat. Decomposition takes place from temperatures above: 338 °C.

### 10.5 Incompatible materials

different metals

### 10.6 Hazardous decomposition products

Hazardous combustion products: see section 5.

## SECTION 11: Toxicological information

### 11.1 Information on toxicological effects

#### Classification acc. to GHS

#### Acute toxicity

Shall not be classified as acutely toxic.

GHS of the United Nations, annex 4. May be harmful if swallowed.

| Acute toxicity |          |             |         |        |        |
|----------------|----------|-------------|---------|--------|--------|
| Exposure route | Endpoint | Value       | Species | Method | Source |
| oral           | LD50     | 2.140 mg/kg | rat     |        | ECHA   |



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### **Skin corrosion/irritation**

Causes severe skin burns and eye damage.

### **Serious eye damage/eye irritation**

Causes serious eye damage.

### **Respiratory or skin sensitisation**

Shall not be classified as a respiratory or skin sensitiser.

### **Germ cell mutagenicity**

Shall not be classified as germ cell mutagenic.

### **Carcinogenicity**

Shall not be classified as carcinogenic.

### **Reproductive toxicity**

Shall not be classified as a reproductive toxicant.

### **Specific target organ toxicity - single exposure**

Shall not be classified as a specific target organ toxicant (single exposure).

### **Specific target organ toxicity - repeated exposure**

Shall not be classified as a specific target organ toxicant (repeated exposure).

### **Aspiration hazard**

Shall not be classified as presenting an aspiration hazard.

### **Symptoms related to the physical, chemical and toxicological characteristics**

#### **• If swallowed**

If swallowed danger of perforation of the esophagus and the stomach (strong corrosive effects)

#### **• If in eyes**

causes burns, Causes serious eye damage, risk of blindness

#### **• If inhaled**

cough, pain, choking, and breathing difficulties

#### **• If on skin**

causes severe burns, causes poorly healing wounds

#### **• Other information**

none

### **11.2 Endocrine disrupting properties**

Does not contain an endocrine disruptor (EDC) in a concentration of  $\geq 0,1\%$ .

### **11.3 Information on other hazards**

There is no additional information.

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## SECTION 12: Ecological information

### 12.1 Toxicity

Shall not be classified as hazardous to the aquatic environment.

| Aquatic toxicity (acute) |           |                       |        |               |
|--------------------------|-----------|-----------------------|--------|---------------|
| Endpoint                 | Value     | Species               | Source | Exposure time |
| EC50                     | >100 mg/l | aquatic invertebrates | ECHA   | 48 h          |
| ErC50                    | >100 mg/l | algae                 | ECHA   | 72 h          |

### 12.2 Persistence and degradability

Data are not available.

### 12.3 Bioaccumulative potential

Data are not available.

### 12.4 Mobility in soil

Data are not available.

### 12.5 Results of PBT and vPvB assessment

According to the results of its assessment, this substance is not a PBT or a vPvB.

### 12.6 Endocrine disrupting properties

Does not contain an endocrine disruptor (EDC) in a concentration of  $\geq 0,1\%$ .

### 12.7 Other adverse effects

Data are not available.

## SECTION 13: Disposal considerations

### 13.1 Waste treatment methods



This material and its container must be disposed of as hazardous waste. Dispose of contents/container in accordance with local/regional/national/international regulations.

#### Sewage disposal-relevant information

Do not empty into drains.

#### Waste treatment of containers/packagings

It is a dangerous waste; only packagings which are approved (e.g. acc. to ADR) may be used. Handle contaminated packages in the same way as the substance itself. Completely emptied packages can be recycled.

### 13.2 Relevant provisions relating to waste

The allocation of waste identity numbers/waste descriptions must be carried out according to the EEC, specific to the industry and process.

#### Properties of waste which render it hazardous

**HP 4** irritant - skin irritation and eye damage  
**HP 8** corrosive

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### 13.3 Remarks

Waste shall be separated into the categories that can be handled separately by the local or national waste management facilities. Please consider the relevant national or regional provisions. Non-contaminated packages may be recycled.

## SECTION 14: Transport information

### 14.1 UN number or ID number

|           |         |
|-----------|---------|
| ADRRID    | UN 1830 |
| IMDG-Code | UN 1830 |
| ICAO-TI   | UN 1830 |

### 14.2 UN proper shipping name

|           |                |
|-----------|----------------|
| ADRRID    | SULPHURIC ACID |
| IMDG-Code | SULPHURIC ACID |
| ICAO-TI   | Sulphuric acid |

### 14.3 Transport hazard class(es)

|           |   |
|-----------|---|
| ADRRID    | 8 |
| IMDG-Code | 8 |
| ICAO-TI   | 8 |

### 14.4 Packing group

|           |    |
|-----------|----|
| ADRRID    | II |
| IMDG-Code | II |
| ICAO-TI   | II |

### 14.5 Environmental hazards

non-environmentally hazardous acc. to the dangerous goods regulations

### 14.6 Special precautions for user

Provisions for dangerous goods (ADR) should be complied within the premises.

### 14.7 Maritime transport in bulk according to IMO instruments

The cargo is not intended to be carried in bulk.

### 14.8 Information for each of the UN Model Regulations

#### Agreement concerning the International Carriage of Dangerous Goods by Road (ADR) Additional information

|                                       |                                    |
|---------------------------------------|------------------------------------|
| Proper shipping name                  | SULPHURIC ACID                     |
| Particulars in the transport document | UN1830, SULPHURIC ACID, 8, II, (E) |
| Classification code                   | C1                                 |
| Danger label(s)                       | 8                                  |



|                          |    |
|--------------------------|----|
| Excepted quantities (EQ) | E2 |
|--------------------------|----|

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|-------------------------------|-----|
| Limited quantities (LQ)       | 1 L |
| Transport category (TC)       | 2   |
| Tunnel restriction code (TRC) | E   |
| Hazard identification No      | 80  |
| <b>Emergency Action Code</b>  | 2P  |

### Regulations concerning the International Carriage of Dangerous Goods by Rail (RID) Additional information

|                            |    |
|----------------------------|----|
| <b>Classification code</b> | C1 |
| <b>Danger label(s)</b>     | 8  |



|                                 |     |
|---------------------------------|-----|
| <b>Excepted quantities (EQ)</b> | E2  |
| <b>Limited quantities (LQ)</b>  | 1 L |
| <b>Transport category (TC)</b>  | 2   |
| <b>Hazard identification No</b> | 80  |

### International Maritime Dangerous Goods Code (IMDG) - Additional information

|  |                               |
|--|-------------------------------|
| Proper shipping name                     | SULPHURIC ACID                |
| Particulars in the shipper's declaration | UN1830, SULPHURIC ACID, 8, II |
| Marine pollutant                         | -                             |
| Danger label(s)                          | 8                             |



|                          |           |
|--------------------------|-----------|
| Excepted quantities (EQ) | E2        |
| Limited quantities (LQ)  | 1 L       |
| EmS                      | F-A, S-B  |
| Stowage category         | C         |
| <b>Segregation group</b> | 1 - Acids |

### International Civil Aviation Organization (ICAO-IATA/DGR) - Additional information

|  |                               |
|--|-------------------------------|
| Proper shipping name                     | Sulphuric acid                |
| Particulars in the shipper's declaration | UN1830, Sulphuric acid, 8, II |
| Danger label(s)                          | 8                             |



|                          |       |
|--------------------------|-------|
| Excepted quantities (EQ) | E2    |
| Limited quantities (LQ)  | 0,5 L |

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## SECTION 15: Regulatory information

### 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

#### Relevant provisions of the European Union (EU)

##### Seveso Directive

| 2012/18/EU (Seveso III) |                                       |   |       |
|-------------------------|---------------------------------------|---|-------|
| No                      | Dangerous substance/hazard categories | Qualifying quantity (tonnes) for the application of lower and upper-tier requirements | Notes |
|                         | not assigned                          |   |       |

##### Deco-Paint Directive

|             |       |
|-------------|-------|
| VOC content | 0 %   |
| VOC content | 0 g/l |

##### Industrial Emissions Directive (IED)

|             |       |
|-------------|-------|
| VOC content | 0 %   |
| VOC content | 0 g/l |

##### Directive on the restriction of the use of certain hazardous substances in electrical and electronic equipment (RoHS)

not listed

##### Regulation concerning the establishment of a European Pollutant Release and Transfer Register (PRTR)

not listed

##### Water Framework Directive (WFD)

| List of pollutants (WFD) |   |        |           |         |
|--------------------------|---|--------|-----------|---------|
| Name of substance        | Name acc. to inventory  | CAS No | Listed in | Remarks |
| Sulphuric acid           | Substances and preparations, or the breakdown products of such, which have been proved to possess carcinogenic or mutagenic properties or properties which may affect steroidogenic, thyroid, reproduction or other endocrine-related functions in or via the aquatic environment |        | a)        |         |

##### Legend

A) Indicative list of the main pollutants

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### Regulation on the marketing and use of explosives precursors

| Explosives precursors which are subject to restrictions |           |     |                      |              |                |  |
|---|-----------|-----|----------------------|--------------|----------------|--|
| Name of substance                                       | CAS No    | Wt% | Type of registration | Re-<br>marks | Limit<br>value | Upper<br>limit<br>value<br>for the<br>pur-<br>pose of<br>licens-<br>ing un-<br>der Art-<br>icle 5(3) |
| Sulphuric acid  | 7664-93-9 | 100 | Annex I              |              | 15 % w/w       | 40 % w/w   |

#### Legend

annex I Substances which shall not be made available to members of the general public on their own, or in mixtures or substances including them, except if the concentration is equal to or lower than the limit values set out below

#### Additional statements

If the product is passed on to third parties, in accordance with Article 7 "Notification of the supply chain" of Regulation EU 2019/1148, the information obligation is subject to the entire supply chain and all other provisions mentioned in Article 7 on restricted and regulated raw materials.

### Regulation on drug precursors

| Name of substance | CAS No    | Wt% | Classification | CN Code    | Threshold<br>level |
|-------------------|-----------|-----|----------------|------------|--------------------|
| Sulphuric acid    | 7664-93-9 | 100 | Category 3     | 2807 00 00 |                    |

### Regulation on substances that deplete the ozone layer (ODS)

not listed

### Regulation concerning the export and import of hazardous chemicals (PIC)

not listed

### Regulation on persistent organic pollutants (POP)

not listed

### National regulations(GB)

#### List of substances subject to authorisation (GB REACH, Annex 14) / SVHC - candidate list

not listed

#### Restrictions according to GB REACH, Annex 17

| Dangerous substances with restrictions (GB REACH, Annex 17) |  |        |    |
|---|--|--------|----|
| Name of substance   | Name acc. to inventory   | CAS No | No |
| Sulphuric acid  | this product meets the criteria for classification in accordance with Regulation No 1272/2008/EC |        | 3  |

#### Other information

Directive 94/33/EC on the protection of young people at work. Observe employment restrictions under the Maternity Protection Directive (92/85/EEC) for expectant or nursing mothers.

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## Sulphuric acid ROTIPURAN® 96 %, p.a., ISO

article number: 4623

### UN Convention against Illicit Traffic in Narcotic Drugs and Psychotropic Substances

| Name of substance | CAS No    | Listed in | HS code |
|-------------------|-----------|-----------|---------|
| Sulphuric acid    | 7664-93-9 | Table II  | 2807.00 |

### National inventories

| Country | Inventory  | Status                       |
|---------|------------|------------------------------|
| AU      | AIIC       | substance is listed          |
| CA      | DSL        | substance is listed          |
| CN      | IECSC      | substance is listed          |
| EU      | ECSI       | substance is listed          |
| EU      | REACH Reg. | substance is listed          |
| JP      | CSCL-ENCS  | substance is listed          |
| KR      | KECI       | substance is listed          |
| MX      | INSQ       | substance is listed          |
| NZ      | NZIoC      | substance is listed          |
| PH      | PICCS      | substance is listed          |
| TR      | CICR       | substance is listed          |
| TW      | TCSI       | substance is listed          |
| US      | TSCA       | substance is listed (ACTIVE) |
| VN      | NCI        | substance is listed          |

#### Legend

|            |   |
|------------|---|
| AIIC       | Australian Inventory of Industrial Chemicals                            |
| CICR       | Chemical Inventory and Control Regulation                               |
| CSCL-ENCS  | List of Existing and New Chemical Substances (CSCL-ENCS)                |
| DSL        | Domestic Substances List (DSL)  |
| ECSI       | EC Substance Inventory (EINECS, ELINCS, NLP)                            |
| IECSC      | Inventory of Existing Chemical Substances Produced or Imported in China |
| INSQ       | National Inventory of Chemical Substances                               |
| KECI       | Korea Existing Chemicals Inventory                                      |
| NCI        | National Chemical Inventory   |
| NZIoC      | New Zealand Inventory of Chemicals                                      |
| PICCS      | Philippine Inventory of Chemicals and Chemical Substances (PICCS)       |
| REACH Reg. | REACH registered substances   |
| TCSI       | Taiwan Chemical Substance Inventory                                     |
| TSCA       | Toxic Substance Control Act   |

## 15.2 Chemical safety assessment

No Chemical Safety Assessment has been carried out for this substance.

## SECTION 16: Other information

### Indication of changes (revised safety data sheet)

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| Section | Former entry (text/value)  | Actual entry (text/value)  | Safety-relevant |
|---------|--|--|-----------------|
| 2.2     | Labelling of packages where the contents do not exceed 125 ml:<br>Signal word: Danger                |  | yes             |
| 2.2     |  | Labelling of packages where the contents do not exceed 125 ml:<br>change in the listing (table)                        | yes             |
| 2.2     |  | Labelling of packages where the contents do not exceed 125 ml:<br>change in the listing (table)                        | yes             |
| 2.2     |  | Labelling of packages where the contents do not exceed 125 ml:<br>change in the listing (table)                        | yes             |
| 2.3     |  | Endocrine disrupting properties:<br>Does not contain an endocrine disruptor (EDC) in a concentration of $\geq 0,1\%$ . | yes             |
| 14.8    |  | Regulations concerning the International Carriage of Dangerous Goods by Rail (RID)Additional information               | yes             |
| 14.8    |  | Classification code:<br>C1   | yes             |
| 14.8    |  | Danger label(s):<br>8  | yes             |
| 14.8    |  | Danger label(s):<br>change in the listing (table)  | yes             |
| 14.8    |  | Excepted quantities (EQ):<br>E2  | yes             |
| 14.8    |  | Limited quantities (LQ):<br>1 L  | yes             |
| 14.8    |  | Transport category (TC):<br>2  | yes             |
| 14.8    |  | Hazard identification No:<br>80  | yes             |
| 15.1    | Restrictions according to REACH, Annex XVII  |  | yes             |
| 15.1    |  | Dangerous substances with restrictions (REACH, Annex XVII):<br>change in the listing (table)                           | yes             |
| 15.1    | List of substances subject to authorisation (REACH, Annex XIV)/SVHC - candidate list:<br>Not listed. |  | yes             |
| 15.1    | VOC content:<br>0 %<br>, 0 9/1   | VOC content:<br>0 %  | yes             |
| 15.1    |  | VOC content:<br>0 9/1  | yes             |
| 15.1    |  | Explosives precursors which are subject to restrictions:<br>change in the listing (table)                              | yes             |



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| Section | Former entry (text/value) | Actual entry (text/value)  | Safety-relevant |
|---------|---------------------------|--|-----------------|
| 15.1    |                           | Additional statements:<br>If the product is passed on to third parties, in accordance with Article 7 "Notification of the supply chain" of Regulation EU 2019/1148, the information obligation is subject to the entire supply chain and all other provisions mentioned in Article 7 on restricted and regulated raw materials.<br>- | yes             |
| 15.1    |                           | Regulation on drug precursors:<br>change in the listing (table)  | yes             |
| 15.1    |                           | National regulations(GB)   | yes             |
| 15.1    |                           | List of substances subject to authorisation (GB REACH, Annex 14) / SVHC - candidate list:<br>not listed  | yes             |
| 15.1    |                           | Restrictions according to GB REACH, Annex 17   | yes             |
| 15.1    |                           | Dangerous substances with restrictions (GB REACH, Annex 17):<br>change in the listing (table)  | yes             |
| 15.1    |                           | National inventories:<br>change in the listing (table)   | yes             |

### Abbreviations and acronyms

| Abbr.       | Descriptions of used abbreviations   |
|-------------|--|
| 2009/161/EU | Commission Directive establishing a third list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC and amending Commission Directive 2000/39/EC |
| ADR         | Accord relatif au transport international des marchandises dangereuses par route (Agreement concerning the International Carriage of Dangerous Goods by Road)                                |
| ATE         | Acute Toxicity Estimate  |
| CAS         | Chemical Abstracts Service (service that maintains the most comprehensive list of chemical substances)   |
| Ceiling-C   | Ceiling value  |
| CN Code     | Combined Nomenclature  |
| DGR         | Dangerous Goods Regulations (see IATA/DGR)   |
| DNEL        | Derived No-Effect Level  |
| EC50        | Effective Concentration 50 %. The EC50 corresponds to the concentration of a tested substance causing 50 % changes in response (e.g. on growth) during a specified time interval             |
| EC No       | The EC Inventory (EINECS, ELINCS and the NLP-list) is the source for the seven-digit EC number, an identifier of substances commercially available within the EU (European Union)            |
| EH40/2005   | EH40/2005 Workplace exposure limits ( <a href="http://www.nationalarchives.gov.uk/doc/open-government-licence/">http://www.nationalarchives.gov.uk/doc/open-government-licence/</a> )        |
| EINECS      | European Inventory of Existing Commercial Chemical Substances  |
| ELINCS      | European List of Notified Chemical Substances  |
| EmS         | Emergency Schedule   |
| ErC50       | ≡ EC50: in this method, that concentration of test substance which results in a 50 % reduction in either growth (EbC50) or growth rate (ErC50) relative to the control                       |

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| Abbr.     | Descriptions of used abbreviations  |
|-----------|---|
| GB CLP    | The Chemicals (Health and Safety) and Genetically Modified Organisms (Contained Use) (Amendment etc.) (EU Exit) Regulations 2019, SI 2019/720 (as amended)              |
| GB REACH  | The REACH etc. (Amendment etc.) (EU Exit) Regulations 2019, SI 2019/758 (as amended)  |
| GHS       | "Globally Harmonized System of Classification and Labelling of Chemicals" developed by the United Nations   |
| HS        | Harmonized Commodity Description and Coding System (Harmonized System, drawn up by the World Customs Organisation)  |
| IATA      | International Air Transport Association   |
| IATA/DGR  | Dangerous Goods Regulations (DGR) for the air transport (IATA)  |
| ICAO      | International Civil Aviation Organization   |
| ICAO-TI   | Technical instructions for the safe transport of dangerous goods by air   |
| IMDG      | International Maritime Dangerous Goods Code   |
| IMDG-Code | International Maritime Dangerous Goods Code   |
| index No  | The Index number is the identification code given to the substance in Part 3 of Annex VI to Regulation (EC) No 1272/2008  |
| IOELV     | Indicative occupational exposure limit value  |
| LD50      | Lethal Dose 50 %: the LD50 corresponds to the dose of a tested substance causing 50 % lethality during a specified time interval  |
| NLP       | No-Longer Polymer   |
| PBT       | Persistent, Bioaccumulative and Toxic   |
| PNEC      | Predicted No-Effect Concentration   |
| ppm       | Parts per million   |
| REACH     | Registration, Evaluation, Authorisation and Restriction of Chemicals  |
| RID       | Règlement concernant le transport International ferroviaire des marchandises Dangereuses (Regulations concerning the International carriage of Dangerous goods by Rail) |
| STEL      | Short-term exposure limit   |
| TWA       | Time-weighted average   |
| VOC       | Volatile Organic Compounds  |
| vPvB      | Very Persistent and very Bioaccumulative  |
| WEL       | Workplace exposure limit  |

### Key literature references and sources for data

Agreement concerning the International Carriage of Dangerous Goods by Road (ADR). Regulations concerning the International Carriage of Dangerous Goods by Rail (RID). International Maritime Dangerous Goods Code (IMDG). Dangerous Goods Regulations (DGR) for the air transport (IATA).

### List of relevant phrases (code and full text as stated in section 2 and 3)

| Code | Text                                     |
|------|--|
| H290 | May be corrosive to metals.              |
| H314 | Causes severe skin burns and eye damage. |
| H318 | Causes serious eye damage.               |

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### **Disclaimer**

This information is based upon the present state of our knowledge. This SDS has been compiled and is solely intended for this product.