

## SULPHURIC ACID 0.25M (0.5N) STANDARDIZED SOLUTION

# **MATERIAL SAFETY DATA SHEET** SDS/MSDS

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

1.1	Product identifiers		
	Product name	Sulphuric Acid 0.25M (0.5N) Standardized Solution	
1.2	Relevant identified uses of the substance or mixture and uses advised against		
	Identified uses	: Laboratory chemicals, Industrial & for professional use only.	
1.3	3 Details of the supplier of the safety data sheet		
	Company	: Central Drug House (P) Ltd 7/28 Vardaan House New Delhi -110002 INDIA	
	Telephone Email	: +91 11 49404040 : <u>care@cdhfinechemical.com</u>	
1.4	Emergency telephone nu	nber	

#### Emergency Phone # : +91 11 49404040 (9:00am - 6:00 pm) [Office hours]

### **SECTION 2: Hazards identification**

#### 2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008 Corrosive to metals (Category 1), H290

For the full text of the H-Statements mentioned in this Section, see Section 16.

#### 2.2 Label elements

## Labelling according Regulation (EC) No 1272/2008

Pictogram

Pictogram	GHS05
Signal word	Warning
Hazard statement(s) H290	May be corrosive to metals.
Precautionary statement(s)	none
Supplemental Hazard Statements	none

#### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

#### **SECTION 3: Composition/information on ingredients**

#### 3.1 Mixtures

Hazardous ingredie Component	nts according to Regulation	n (EC) No 1272/2008 Classification	Concentration
Sulphuric acid CAS-No. EC-No. Index-No.	7664-93-9 231-639-5 016-020-00-8	Met. Corr. 1; Skin Corr. 1A; H290, H314 Concentration limits: >= 15 %: Skin Corr. 1A, H314; 5 - < 15 %: Skin Irrit. 2, H315; 5 - < 15 %: Eye Irrit. 2, H319; 0.1 - 100 %: Met. Corr. 1, H290;	>= 1 - < 5 %

For the full text of the H-Statements mentioned in this Section, see Section 16.

#### **SECTION 4: First aid measures**

#### 4.1 Description of first aid measures

#### **General advice**

Consult a physician. Show this safety data sheet to the doctor in attendance.

#### If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

#### In case of skin contact

Wash off with soap and plenty of water. Consult a physician.

#### In case of eye contact

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

#### If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

- **4.2** Most important symptoms and effects, both acute and delayed The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11
- **4.3 Indication of any immediate medical attention and special treatment needed** No data available

#### **SECTION 5: Firefighting measures**

#### 5.1 Extinguishing media

### **Suitable extinguishing media** Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

5.2 Special hazards arising from the substance or mixture Sulphur oxides

#### 5.3 Advice for firefighters Wear self-contained breathing apparatu

Wear self-contained breathing apparatus for firefighting if necessary.

# 5.4 Further information No data available

#### **SECTION 6: Accidental release measures**

- 6.1 Personal precautions, protective equipment and emergency procedures Wear respiratory protection. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. For personal protection see section 8.
- 6.2 Environmental precautions Do not let product enter drains.
- **6.3** Methods and materials for containment and cleaning up Soak up with inert absorbent material and dispose of as hazardous waste. Keep in suitable, closed containers for disposal.
- 6.4 **Reference to other sections** For disposal see section 13.

#### **SECTION 7: Handling and storage**

#### 7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. For precautions see section 2.2.

# 7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Storage class (TRGS 510): Non-combustible, corrosive hazardous materials

#### 7.3 Specific end use(s)

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

#### **SECTION 8: Exposure controls/personal protection**

#### 8.1 Control parameters

#### 8.2 Exposure controls

#### Appropriate engineering controls

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

#### Personal protective equipment

#### **Eye/face protection**

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

#### **Skin protection**

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

#### **Body Protection**

Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

#### **Respiratory protection**

Where risk assessment shows air-purifying respirators are appropriate use (US) or type ABEK (EN 14387) respirator cartridges as a backup to enginee protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

#### Control of environmental exposure

Do not let product enter drains.

#### **SECTION 9: Physical and chemical properties**

#### 9.1 Information on basic physical and chemical properties

		simulation on basic physic	ai and chemical pro
	a)	Appearance	Form: liquid
	b)	Odour	No data available
	c)	Odour Threshold	No data available
	d)	рН	No data available
	e)	Melting point/freezing point	No data available
	f)	Initial boiling point and boiling range	No data available
	g)	Flash point	No data available
	h)	Evaporation rate	No data available
	i)	Flammability (solid, gas)	No data available
	j)	Upper/lower flammability or explosive limits	No data available
	k)	Vapour pressure	No data available
	I)	Vapour density	No data available
	m)	Relative density	No data available
	n)	Water solubility	No data available
	0)	Partition coefficient: n- octanol/water	No data available
	p)	Auto-ignition temperature	No data available
	q)	Decomposition temperature	No data available
	r)	Viscosity	No data available
	s)	Explosive properties	No data available
	t)	Oxidizing properties	No data available
		<b>her safety information</b> data available	
T		10: Stability and reactivi	<b>+</b> \/

#### **SECTION 10: Stability and reactivity**

## 10.1 Reactivity No data available

9.2

- **10.2 Chemical stability** Stable under recommended storage conditions.
- **10.3 Possibility of hazardous reactions** No data available
- **10.4 Conditions to avoid** No data available
- **10.5** Incompatible materials Strong bases, Alkalis
- 10.6 Hazardous decomposition products
   Other decomposition products No data available
   Hazardous decomposition products formed under fire conditions. Sulphur oxides
   In the event of fire: see section 5

#### **SECTION 11: Toxicological information**

#### 11.1 Information on toxicological effects

Acute toxicity No data available

**Skin corrosion/irritation** No data available

Serious eye damage/eye irritation No data available

**Respiratory or skin sensitisation** No data available

Germ cell mutagenicity No data available

#### Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

Reproductive toxicity

No data available

Specific target organ toxicity - single exposure No data available

Specific target organ toxicity - repeated exposure No data available

Aspiration hazard

No data available

Additional Information

RTECS: Not available

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

#### **SECTION 12: Ecological information**

- 12.1 Toxicity No data available
- 12.2 Persistence and degradability No data available
- **12.3 Bioaccumulative potential** No data available
- 12.4 Mobility in soil No data available

#### 12.5 Results of PBT and vPvB assessment This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

**12.6 Other adverse effects** No data available

#### **SECTION 13: Disposal considerations**

13.1 Waste treatment methods

#### Product

Offer surplus and non-recyclable solutions to a licensed disposal company.

#### Contaminated packaging

Dispose of as unused product.

#### **SECTION 14: Transport information**

14.1	UN number ADR/RID: 3264		IMDG: 3264	IATA: 3264
14.2		CORROSIVE LIQUID	, ACIDIC, INORGANIC, N.O.S. (Sulf , ACIDIC, INORGANIC, N.O.S. (Sulf , inorganic, n.o.s. (Sulfuric acid)	
14.3	Transport ADR/RID: 8	<b>hazard class(es)</b> 3	IMDG: 8	IATA: 8
14.4	Packaging group ADR/RID: III		IMDG: III	IATA: III
14.5	Environmental hazards ADR/RID: no		IMDG Marine pollutant: no	IATA: no
14.6	Special precautions for user No data available			

#### **SECTION 15: Regulatory information**

- **15.1** Safety, health and environmental regulations/legislation specific for the substance or mixture This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.
- **15.2 Chemical safety assessment** For this product a chemical safety assessment was not carried out

#### **SECTION 16: Other information**

#### Full text of H-Statements referred to under sections 2 and 3.

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

H319 Causes serious eye irritation.

#### **Further information**

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Central Drug House (P) Ltd and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.cdhfinechemical.com for additional terms and conditions of sale.