

Doc. # Na<sub>2</sub>SO<sub>4</sub>-MSDS-10Rev. # 00Effective Date 01.01.2023

**TITLE:** MATERIAL SAFETY DATA SHEET (MSDS)  
SODIUM SULPHATE

**Section 1: Chemical Product and Company Identification**

**Product Name:** Sodium Sulfate**Contact Information:** ITTEHAD CHEMICALS LIMITED  
G.T.ROAD, KALA SHAH KAKU**Chemical Name:** Sodium Sulfate Anhydrous**Web:** [www.ittehadchemicals.com/](http://www.ittehadchemicals.com/)

Sodium Sulphate Decahydrate

**Synonyms/ Trade Name:** Kemsol, Glaubers Salt,**E-mail:** info@ittehadchemicals.com

Disodium Sulphate, Sulfate of Soda

**Phone No.** 0423-7950222-25**General Chemical formula:** Sodium Sulfate Anhydrous (Na<sub>2</sub>SO<sub>4</sub>) ,Sodium Sulphate Decahydrate (Na<sub>2</sub>SO<sub>4</sub>.10H<sub>2</sub>O)

**Recommended Use:** It is used to dry organic liquids. As a filler in powdered home laundry detergents. As a fining agent which removes small air bubbles from molten glass. Glauber's salt, the decahydrate was used as a laxative which removes the certain drugs such as acetaminophen from the body. Manufacture of Kraft paper pulp used as raw material, other uses are animal feed, enzymes, steel-making processes, textile industries.

**Restrictions on Use:** Not for food or household use

**Section 2 : Composition and Information on Ingredients**

**Substance type:** Mono constituent

Chemical Name	EC No.	CAS No.
Sodium Sulphate	231-820-9	7757-82-6

**SPECIFICATIONS**

Appearance	Na <sub>2</sub> SO <sub>4</sub> %	Moisture %	Water Insoluble %	NaCl %
White Powder	≥ 99.0	≤ 0.5	≤ 0.5	≤ 0.57

### Section 3: Hazards Identification

**Classification of the Substance or Mixture:**

In accordance with regulation, this product is not considered as a Hazardous Substance.

**Label Elements, including precautionary statements:**

Not classified as a hazardous chemical. Other hazards not contributing to the classification

**Other Hazards:**

No other risk is specified

### Section 4 : First Aid Measures

**Description of first aid measures**

**General Measures:** Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible)

**Eye Contact:** Make sure to remove any contact lenses from the eyes before rinsing. Promptly wash eyes with plenty of water while lifting the eye lids. Continue to rinse for at least 15 minutes. Get medical attention if any discomfort continues.

**Skin Contact:** Remove affected person from source of contamination. Remove contaminated clothing. Wash the skin immediately with soap and water. Get medical attention if any discomfort continues.

**Inhalation:** Move the exposed person to fresh air at once. Rinse nose and mouth with water. Get medical attention if any discomfort continues.

**Ingestion:** Immediately rinse mouth and provide fresh air. Get medical attention if any discomfort continues. Do not induce vomiting.

**Most important symptoms and effects (acute and delayed)**

**Symptoms/effects:** Not expected to present a significant hazard under anticipated conditions of normal use.

**Immediate medical attention and special treatment, if necessary**

Treat symptomatically.

### Section 5: Fire and Explosion Data

**Extinguishing media****Suitable extinguishing media:**

Not combustible. All types of extinguishing media are suitable. Use fire extinguishing methods suitable to surrounding conditions.

**Unsuitable extinguishing media:**

Water with full jet as this can form a dust cloud.

**Special hazards arising from the substance or mixture**

Thermal decomposition can lead to release of irritating and toxic gases and vapours.

**Hazardous combustion products:**

Oxides of sulphur

**Advice For firefighters:**

No special protective equipment required.

**Section 6: Accidental Release Measures****Personal Precautions:**

Wear protective clothing as described in Section 8 of this safety data sheet. Avoid contact with skin and eyes. Provide adequate ventilation.

**Environmental Precautions:**

Do not discharge onto the ground or into water resources.

**Spill Clean Up Methods:**

Avoid generation and spreading of dust. Shovel into dry containers. Cover and move the containers. Flush the area with water. Collect spillage in containers, seal securely and deliver for disposal according to local regulations.

**Section 7: Handling and Storage****Precautions for safe handling**

Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work place. Provide good ventilation in process area to prevent formation of vapor.

**Conditions for safe storage, including any incompatibilities****Storage Conditions:**

Keep container closed when not in use.

**Incompatible Products:**

Strong acids.

**Incompatible Materials:**

Sources of ignition. Direct sunlight

### Section 8: Exposure Controls/Personal Protection

**Control Parameters:** No additional information available

**Appropriate Engineering Controls:**

Emergency eye wash fountains should be available in the immediate vicinity of any potential exposure.

**Individual Protection Measures/Personal Protective Equipment:**

**Eye protection:** Wear safety glasses with side shields (or goggles)

**Hand protection:** Protective gloves not really required. However, we recommend using protective gloves made of rubber. Chloroprene rubber, CR. Nitrile rubber, NBR.

**Skin of Body protection:** Normal work clothes for the chemical industry.

**Respiratory protection:** Wear respiratory device with dust filter (P3) in case of insufficient ventilation.

**Other information:** Do not eat, drink or smoke during use.

### Section 9: Physical and Chemical Properties

**Information on Basic Physical and Chemical Properties**

**Physical State:** Solid

**Appearance:** Powder or granules

**Colour:** White

**Odour:** Odourless

**Other Information:**

**Flash Point:** Not applicable

**Explosive Properties:** Non-explosive

**Combustion Temperature:** Non-combustible

**Decomposition Temperature:** 1200°C

**Solubility:**

**In Water:** 161 g/l at 20°C

**In Ethanol:** Insoluble

**In Glycol:** Insoluble

**Hygroscopicity:** Hygroscopic product

## Section 10: Stability and Reactivity Data

### Reactivity:

There exists no specific test data for this product. For further information, see the subsequent subsections of this chapter.

### Chemical Stability:

Stable under normal conditions.

### Possibility of Hazardous Reactions:

Contact of melted Sodium sulphate (melting point 884°C) with aluminium will cause violent reactions (formation of  $Al_2O_3$ ,  $Na_2O$  and  $SO_2/SO_3$ -gas). Danger of explosion!

### Conditions to Avoid:

Avoid contact with water or humidity. The product is: Hygroscopic.

### Incompatible Materials:

See above.

### Hazardous Decomposition Products:

Thermal decomposition can lead to release of toxic/corrosive gases and vapours; oxides of sulphur

## Section 11: Toxicological Information

### Information on Toxicological Effects:

**Likely Routes of Exposure:** Inhalation; Skin and eye contact

**Acute Toxicity:** Not classified

### Sodium Sulfate, Anhydrous (7757-82-6)

LD50 oral rat	10000 mg/kg
ATE US (oral)	10000 mg/kg

**Skin Corrosion/Irritation:** Not classified

**pH:** 5.2 - 9.2 (of 5% solution in distilled water)

**Serious eye Damage/Irritation:** Not classified

**Respiratory or skin Sensitization:** Not classified

**Germ Cell Mutagenicity:** Not classified

**Based on available data, the classification criteria are not met**

**Carcinogenicity:** Not classified

**Reproductive Toxicity:** Not classified

**Potential Adverse Human Health Effects and Symptoms:**

Based on available data, the classification criteria are not met

### Section 12: Ecological Information

**Ecotoxicity:**

The product components are not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

LC 50, 96 Hrs, FISH mg/l 1350

EC 50, 48 Hrs, DAPHNIA, mg/l 4580

**Mobility:** The product is soluble in water.

**Degradability:** The product is not biodegradable.

**Water Hazard Classification:** WGK 1

### Section 13: Disposal Considerations

**General Information:** Waste to be treated as controlled waste. Disposal to licensed waste disposal site in accordance with local Waste Disposal Authority.

**Disposal Methods:** Dispose of waste and residues in accordance with local authority requirements.

### Section 14: Transport Information

**General:** The product is not covered by international regulation on the transport of dangerous goods (IMDG, IATA, ADR/RID).

**Road Transport Notes:** Not Classified

**Rail Transport Notes:** Not classified.

**Sea Transport Notes:** Not classified.

**Air Transport Notes:** Not classified.

### Section 15: Other Regulatory Information

**EU Directives:**

Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing a European Chemicals Agency, amending Directive 1999/45/EC and repealing Council Regulation (EEC) No 793/93 and Commission Regulation (EC) No 1488/94 as well as Council Directive 76/769/EEC and Commission Directives 91/155/EEC, 93/67/EEC, 93/105/EC and 2000/21/EC, including amendments.

**Statutory Instruments:**

Chemicals (Hazard Information and Packaging) Regulations.

**Approved Code of Practice:**

Classification and Labelling of Substances and Preparations Dangerous for Supply. Safety Data Sheets for Substances and Preparations.

**Guidance Notes:**

CHIP for everyone HSG (108).

### Section 16: Other Information

**Other Special Considerations:** Not available

**Created on:** 01.01.2023

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