# Material Safety Data Sheet

## -- Resorcinol

### 1. PRODUCT AND COMPANY IDENTIFICATION

Product name: Resorcinol

Company: ORCHID CHEMICAL SUPPLIES LTD

Address: 1812, No.607, North Zhongshan Road, Hangzhou, Zhejiang Province 310014 China

Tel: +86-571-56880366 / 85395792

### 2. HAZARDS IDENTIFICATION

**Emergency Overview**

**OSHA Hazards**

Target Organ Effect, Toxic by ingestion, Irritant

**Target Organs**

Liver, Kidney, Spleen., Heart, Blood

**GHS Label elements, including precautionary statements**

**Hazard statement(s)**

| | |
|---|---|
| H302 | Harmful if swallowed. |
| H313 | May be harmful in contact with skin. |
| H315 | Causes skin irritation. |
| H318 | Causes serious eye damage.. |
| H400 | Very toxic to aquatic life. |

**Precautionary statement(s)**

| | |
|---|---|
| P273 | Avoid release to the environment. |
| P280 | Wear protective gloves/eye protection/face protection. |
| P305 + P351 + P338 | IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. |

**HMIS Classification**

| | |
|---|---|
| **Health Hazard:** | 2 |
| **Chronic Health Hazard**: | * |
| **Flammability:** | 1 |
| **Physical hazards:** | 0 |

**NFPA Rating**

| | |
|---|---|
| **Health Hazard:** | 2 |
| **Fire:** | 1 |
| **Reactivity Hazard:** | 0 |

**Potential Health Effects**

| | |
|---|---|
| **Inhalation** | May be harmful if inhaled. Causes respiratory tract irritation. |
| **Skin** | May be harmful if absorbed through skin. Causes skin irritation. |
| **Eyes** | Causes eye irritation. |
| **Ingestion** | Toxic if swallowed. |

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

Synonyms : 1,3-Benzenediol
CAS-No. 108-46-3
EC-No. 203-585-2

## 4. FIRST AID MEASURES

**General advice**
Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area.
**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.

## 5. FIRE-FIGHTING MEASURES

**Suitable extinguishing media**
Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
**Special protective equipment for fire-fighters**
Wear self contained breathing apparatus for fire fighting if necessary.

## 6. ACCIDENTAL RELEASE MEASURES

**Personal precautions**
Use personal protective equipment. Avoid dust formation. Avoid breathing dust. Ensure adequate ventilation.
**Environmental precautions**
Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.
**Methods and materials for containment and cleaning up**
Pick up and arrange disposal without creating dust. Keep in suitable, closed containers for disposal.

## 7. HANDLING AND STORAGE

**Precautions for safe handling**
Avoid contact with skin and eyes. Avoid formation of dust and aerosols.

Provide appropriate exhaust ventilation at places where dust is formed. Normal measures for preventive fire protection.

**Conditions for safe storage**

Keep container tightly closed in a dry and well-ventilated place.
Air and light sensitive.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

**Personal protective equipment**

**Respiratory protection**

Where risk assessment shows air-purifying respirators are appropriate use a dust mask type N95 (US) or type P1 (EN 143) respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

**Hand protection**

Handle with gloves.

**Eye protection**

Face shield and safety glasses.

**Skin and body protection**

Choose body protection according to the amount and concentration of the dangerous substance at the work place.

**Hygiene measures**

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

## 9. PHYSICAL AND CHEMICAL PROPERTIES

**Appearance**

Form: solid

**Safety data**

| | |
|---|---|
| pH | 4.4 at 50 g/l at 20 °C (68 °F) |
| Melting/freezing point | 109 - 112 °C (228 - 234 °F) - lit. |
| Boiling point | 178 °C (352 °F) at 21 hPa (16 mmHg) - lit. |
| Flash point | 127 °C (261 °F) - closed cup |
| Ignition temperature | 608 °C (1,126 °F) |
| Lower explosion limit | 1.4 %(V) |
| Vapour pressure | 1 hPa (1 mmHg) at 21.1 °C (70.0 °F) |
| Density | 1.272 g/cm$^3$ |
| Water solubility | soluble |
| Partition coefficient: n-octanol/water | log Pow: 0.88 |

## 10. STABILITY AND REACTIVITY

**Chemical stability**
Stable under recommended storage conditions.
**Possibility of hazardous reactions**
no data available
**Conditions to avoid**
no data available
**Materials to avoid**
Oxidizing agents, Iron and iron salts.
**Hazardous decomposition products**
Hazardous decomposition products formed under fire conditions. - Carbon oxides

## 11. TOXICOLOGICAL INFORMATION

**Acute toxicity**
LD50 Oral - rat - 301 mg/kg
Remarks: Behavioral:Convulsions or effect on seizure threshold. Gastrointestinal:Changes in structure or function of salivary glands. Lungs, Thorax, or Respiration:Dyspnea.
LD50 Dermal - rabbit - 3,360 mg/kg
Remarks: Skin irritation Nutritional and Gross Metabolic:Weight loss or decreased weight gain.
**Skin corrosion/irritation**
Skin - rabbit - Skin irritation - 24 h
**Serious eye damage/eye irritation**
Eyes - rabbit - Severe eye irritation
**Respiratory or skin sensitization**
no data available
**Germ cell mutagenicity**
Genotoxicity in vitro - rat - Liver
DNA damage
Genotoxicity in vitro - Human - lymphocyte
Cytogenetic analysis
**Carcinogenicity**
Carcinogenicity - mouse - Skin
Tumorigenic:Equivocal tumorigenic agent by RTECS criteria. Skin and Appendages: Other: Tumors. This product is or contains a component that is not classifiable as to its carcinogenicity based on its IARC, ACGIH, NTP, or EPA classification..

| | |
|---|---|
| IARC: | 3 - Group 3: Not classifiable as to its carcinogenicity to humans (1,3-Benzenediol) |
| NTP: | No component of this product present at levels greater than or equal to |

OSHA: 0.1% is identified as a known or anticipated carcinogen by NTP. No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

**Reproductive toxicity**

no data available

**Specific target organ toxicity - single exposure (Globally Harmonized System)**

no data available

**Specific target organ toxicity - repeated exposure (Globally Harmonized System)**

no data available

**Aspiration hazard**

no data available

**Potential Health Effects**

| | |
|---|---|
| **Inhalation** | May be harmful if inhaled. Causes respiratory tract irritation. |
| **Ingestion** | Toxic if swallowed. |
| **Skin** | May be harmful if absorbed through skin. Causes skin irritation. |
| **Eyes** | Causes eye irritation. |

**Signs and Symptoms of Exposure**

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

**Additional Information**

RTECS: VG9625000

## 12. ECOLOGICAL INFORMATION

**Toxicity**

| | |
|---|---|
| Toxicity to daphnia and other aquatic invertebrates. | EC50 - Daphnia magna (Water flea) - 0.25 mg/l - 96 h |
| Toxicity to algae | EC50 - Chlorella pyrenoidosa - 1.1 - 72 mg/l - 72 h |

**Persistence and degradability**

Biodegradability Biotic/Aerobic Chemical oxygen demand

**Bioaccumulative potential**

no data available

**Mobility in soil**

no data available

**PBT and vPvB assessment**

no data available

**Other adverse effects**

An environmental hazard cannot be excluded in the event of unprofessional handling or disposal. Very toxic to aquatic organisms.

## 13. DISPOSAL CONSIDERATIONS

**Product**

Observe all federal, state, and local environmental regulations. Contact a licensed professional waste disposal service to dispose of this material. Dissolve or mix the material

with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber.

**Contaminated packaging**

Dispose of as unused product.

## 14. TRANSPORT INFORMATION

**DOT (US)**

UN-Number: 2876 Class: 6.1 Packing group: III

Proper shipping name: Resorcinol

Reportable Quantity (RQ): 5000 lbs

Marine pollutant: No

Poison Inhalation Hazard: No

**IMDG**

UN-Number: 2876 Class: 6.1 Packing group: III EMS-No: F-A, S-A

Proper shipping name: RESORCINOL

Marine pollutant: No

**IATA**

UN-Number: 2876 Class: 6.1 Packing group: III

Proper shipping name: Resorcinol

## 15. REGULATORY INFORMATION

**OSHA Hazards**

Target Organ Effect, Toxic by ingestion, Irritant

**DSL Status**

All components of this product are on the Canadian DSL list.

**SARA 302 Components**

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

**SARA 313 Components**

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

**SARA 311/312 Hazards**

Acute Health Hazard, Chronic Health Hazard

**Massachusetts Right To Know Components**

1,3-Benzenediol CAS No. 108-46-3 Revision Date 1993-04-24

**Pennsylvania Right To Know Components**

1,3-Benzenediol CAS No. 108-46-3 Revision Date 1993-04-24

**New Jersey Right To Know Components**

1,3-Benzenediol CAS No. 108-46-3 Revision Date 1993-04-24

**California Prop. 65 Components**

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

## 16. OTHER INFORMATION

**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 appropriate safety precautions.