



Alpha Chemika



ISO 9001 QUALITY SYSTEM CERTIFIED ORGANIZATION

MATERIAL SAFETY DATA SHEET

MSDS

Savgan Heights ; 102 ,B Wing ; R.T.O. Lane ,Andheri (West) Mumbai - 400053 , INDIA

Section 1 - Chemical Product and Company Identification

Product Name : 1,2-DINITROBENZENE

Synonyms:

CAS No.: 528-29-0

Molecular Weight: 168.11

Chemical Formula: C₆H₄N₂O₄

Section 2 - Composition, Information on Ingredients

Ingredient	CAS No	Percent	Hazardous
1,2-Dinitrobenzene	528-29-0	100%	Yes

Section 3 - Hazardous Identification

Risk advice to man and the environment

Very toxic by inhalation, in contact with skin and if swallowed. Danger of cumulative effects. Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Section 4 - 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. Take victim immediately to hospital. 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.

Section 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.

Section 6 - Accidental Release Measures

Personal precautions

Wear respiratory protection. Avoid dust formation. Avoid breathing dust. Ensure adequate ventilation. Evacuate personnel to safe areas.

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 for cleaning up

Pick up and arrange disposal without creating dust. Keep in suitable, closed containers for disposal.

Section 7 - Handling and Storage

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.

Storage

Store in cool place. Keep container tightly closed in a dry and well-ventilated place.

Section 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. Where risk assessment shows air-purifying respirators are appropriate use a full-face particle respirator type N99 (US) or type P2 (EN 143) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of 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).

Hand protection

The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it. 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

Avoid contact with skin, eyes and clothing. Wash hands before breaks and immediately after handling the product.

Section 9 - Physical and Chemical Properties

Appearance Form

crystalline Colour

light yellow **Safety**

data

pH no data available

Melting point 114 - 117 °C

114 - 117 °C

Boiling point 319 °C at 1.031 hPa

Flash point 150 °C - closed cup

Ignition temperature no data available

Lower explosion limit no data available

Upper explosion limit no data available

Water solubility no data available

Section 10 - Stability and Reactivity

Storage stability

Stable under recommended storage conditions.

Materials to avoid

Oxidizing agents, Reducing agents, Strong bases

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, nitrogen oxides (NO_x)

Section 11 - Toxicological Information

Acute toxicity

no data available

Irritation and corrosion

no data available

Sensitisation

no data available

Chronic exposure

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.

May cause reproductive disorders.

Signs and Symptoms of Exposure

Absorption into the body leads to the formation of methemoglobin which in sufficient concentration causes cyanosis. Onset may be delayed 2 to 4 hours or longer., Cough, Shortness of breath, Headache, Nausea, Vomiting

Potential Health Effects

Inhalation May be fatal if inhaled. May cause respiratory tract irritation.

Skin May cause skin irritation. May be fatal if absorbed through skin.

Eyes May cause eye irritation.

Ingestion May be fatal if swallowed.

Target Organs Blood, Liver,

Section 12 - Ecological Information

Elimination information (persistence and degradability)

no data available

Ecotoxicity effects

Toxicity to fish LC50 - Pimephales promelas (fathead minnow) - 0,6 mg/l - 96 h

Further information on ecology

Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Section 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

Section 14 - Transport Information

ADR/RID

UN-Number: 3443 Class: 6.1 Packing group: II

Proper shipping name: DINITROBENZENES, SOLID

IMDG

UN-Number: 3443 Class: 6.1 Packing group: II EMS-No: F-A, S-A

Proper shipping name: DINITROBENZENES, SOLID

Marine pollutant: No

IATA

UN-Number: 3443 Class: 6.1 Packing group: II

Proper shipping name: Dinitrobenzenes, solid

Section 15 - Regulatory Information

Labelling according to EC Directives

EC Label

Hazard symbols

T+ Very toxic

N Dangerous for the environment

R-phrase(s)

R26/27/28 Very toxic by inhalation, in contact with skin and if swallowed.

R33 Danger of cumulative effects.

R50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

S-phrase(s)

S28 After contact with skin, wash immediately with plenty of water.

S36/37 Wear suitable protective clothing and gloves.

S45 In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

S60 This material and its container must be disposed of as hazardous waste.

S61 Avoid release to the environment. Refer to special instructions/ Safety data sheets.

Section 16 - Additional Information

Not Available