



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 : 4-tert-BUTYLPHENOL 98%

Synonyms: terbutol

CAS No.: 98-54-4

Molecular Weight: 150.22

Chemical Formula: C₁₀H₁₄

Section 2 - Composition, Information on Ingredients

Ingredient	CAS No	Percent	Hazardous
4-tert-Butylphenol	98-54-4	98-100%	Yes

Section 3 - Hazardous Identification

Risk advice to man and the environment

May cause fire. Irritating to skin.

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. 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

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 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 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. 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

Safety glasses with side-shields conforming to EN166

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.

Section 9 - Physical and Chemical Properties

Appearance

Form powder

Colour white

Safety data

pH no data available Melting

point 96 - 101 °C Boiling point

236 - 238 °C Flash point 113

°C - closed cup Ignition

temperature 510 °C

Lower explosion limit no data available

Upper explosion limit no data available

Vapour pressure 1 hPa at 70 °C

Density 0,908 g/mL at 25 °C

Water solubility no data available

Partition coefficient:

n-octanol/water

log Pow: 3,29

Section 10 - Stability and Reactivity

Storage stability

Stable under recommended storage conditions.

Materials to avoid

Bases, Acid chlorides, Acid anhydrides, Oxidizing agents, Brass, CopperBases, Acid chlorides, Acid anhydrides, Oxidizing agents, Brass, Copper

Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section 11 - Toxicological Information

Acute toxicity

LD50 Oral - mouse - 1.030 mg/kg

Remarks: Behavioral:Tetany. Behavioral:Irritability.

LD50 Oral - Mammal - 1.500 mg/kg

LCLO Inhalation - rat - 5,6 mg/l

Remarks: Nutritional and Gross Metabolic:Weight loss or decreased weight gain.

LD50 Dermal - Mammal - 1.580 mg/kg

LD50 Intraperitoneal - mouse - 78 mg/kg

Irritation and corrosion

Skin - rabbit - Mild skin irritation - 24 h

Skin - rabbit - Mild skin irritation - 4 h

Eyes - rabbit - Severe eye irritation - 24 h

Sensitisation

no data available **Chronic**

exposure Carcinogenicity -

Hamster - Oral

Tumorigenic:Neoplastic by RTECS criteria. Gastrointestinal:Tumors.

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.

Signs and Symptoms of Exposure

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

Potential Health Effects

Inhalation May be harmful if inhaled. Causes respiratory tract irritation.

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

Eyes Causes serious eye irritation.

Ingestion May be harmful if swallowed.

Additional Information

RTECS: SJ8925000

Section 12 - Ecological Information

Elimination information (persistence and degradability)

no data available

Bioaccumulation *Leuciscus idus melanotus* - 3 d

Bioconcentration factor (BCF): 120

Ecotoxicity effects

Toxicity to fish LC50 - *Pimephales promelas* (fathead minnow) - 5,14 mg/l - 96 h

Toxicity to daphnia

and other aquatic

invertebrates.

EC50 - *Daphnia magna* (Water flea) - 3,9 mg/l - 48 h

Further information on ecology

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: 3077 Class: 9 Packing group: III

Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S.
(4-tert-Butylphenol)

IMDG

UN-Number: 3077 Class: 9 Packing group: III EMS-No: F-A, S-F

Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S.
(4-tert-Butylphenol)

Marine pollutant: No

IATA

UN-Number: 3077 Class: 9 Packing group: III

Proper shipping name: Environmentally hazardous substance, solid, n.o.s. (4-tert-Butylphenol)

Section 15 - Regulatory Information

Labelling according to EC Directives

Hazard symbols

Xi Irritant

N Dangerous for the environment

R-phrases(s)

R37 Irritating to respiratory system.

R41 Risk of serious damage to eyes.

R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

S-phrases(s)

S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S39 Wear eye/face protection.

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

Section 16 - Additional Information

Not Available