

ETHYLENE GLYCOL ISOPROPYL ETHER

1491

October 2004

CAS No: 109-59-1
 RTECS No: KL5075000
 UN No: 1993
 EC No: 603-013-00-5

2-Isopropoxyethanol
 2-(1-Methoxyethoxy)-ethanol
 Isopropyl glycol
 4-Methyl-3-oxa-1-pentanol
 Isopropyl oxitol
 EGiPE
 $C_5H_{12}O_2$ / $(CH_3)_2CHOCH_2CH_2OH$
 Molecular mass: 104.1

TYPES OF HAZARD/ EXPOSURE	ACUTE HAZARDS/SYMPTOMS	PREVENTION	FIRST AID/FIRE FIGHTING
FIRE	Flammable.	NO open flames, NO sparks, and NO smoking.	Powder, water spray, foam, carbon dioxide.
EXPLOSION	Above 44/C explosive vapour/air mixtures may be formed.	Above 44/C use a closed system, ventilation, and explosion-proof electrical equipment.	In case of fire: keep drums, etc., cool by spraying with water.
EXPOSURE			
Inhalation	Cough.	Ventilation, local exhaust, or breathing protection.	Fresh air, rest.
Skin	MAY BE ABSORBED! Redness.	Protective gloves. Protective clothing.	Remove contaminated clothes. Rinse skin with plenty of water or shower.
Eyes	Redness. Pain.	Safety goggles.	First rinse with plenty of water for several minutes (remove contact lenses if easily possible), then take to a doctor.
Ingestion	Nausea.	Do not eat, drink, or smoke during work.	Rinse mouth. Give plenty of water to drink.

SPILLAGE DISPOSAL

Remove all ignition sources. Ventilation. Collect leaking and spilled liquid in sealable containers as far as possible. Personal protection: filter respirator for organic gases and vapours.

PACKAGING & LABELLING

Xn Symbol
 R: 20/21-36
 S: (2-)24/25
 UN Hazard Class: 3
 UN Pack Group: III

EMERGENCY RESPONSE

Transport Emergency Card: TEC (R)-30GF1-III
 NFPA Code: H1; F3; R0

SAFE STORAGE

Cool. Fireproof. Separated from strong oxidants.

IMPORTANT DATA

Physical State; Appearance

COLOURLESS LIQUID, WITH CHARACTERISTIC ODOUR.

Chemical dangers

The substance can presumably form explosive peroxides. Reacts violently with strong oxidants.

Occupational exposure limits

TLV: 25 ppm as TWA; (skin); (ACGIH 2004).

MAK: 5 ppm, 22 mg/m³; skin absorption (H); Peak limitation category: II(8); Pregnancy risk group: C; (DFG 2004).

Routes of exposure

The substance can be absorbed into the body by inhalation of its vapour and through the skin.

Inhalation risk

A harmful contamination of the air will be reached rather slowly on evaporation of this substance at 20/C.

Effects of short-term exposure

The substance is irritating to the eyes, and is mildly irritating to the skin and the respiratory tract.

Effects of long-term or repeated exposure

The substance may have effects on the blood, resulting in anaemia.

PHYSICAL PROPERTIES

Boiling point at 99kPa: 139.5-144.5/C

Melting point: -60/C

Relative density (water = 1): 0.903 at 20/C

Solubility in water, g/100 ml at 25/C: 100

Vapour pressure, kPa at 20/C: 0.44

Relative vapour density (air = 1): 3.6

Flash point: 44/C c.c.

Auto-ignition temperature: 240/C

Explosive limits, vol% in air: 1.6-13

Octanol/water partition coefficient as log Pow: 0.05

ENVIRONMENTAL DATA

NOTES

Isopropyl cellosolve is a trade name.

ADDITIONAL INFORMATION

LEGAL NOTICE

Neither the EC nor the IPCS nor any person acting on behalf of the EC or the IPCS is responsible for the use which might be made of this information