

# CYCLOHEXANONE

0425  
April 2004

**CAS No: 108-94-1**  
RTECS No: GW1050000  
UN No: 1915  
EC No: 606-010-00-7

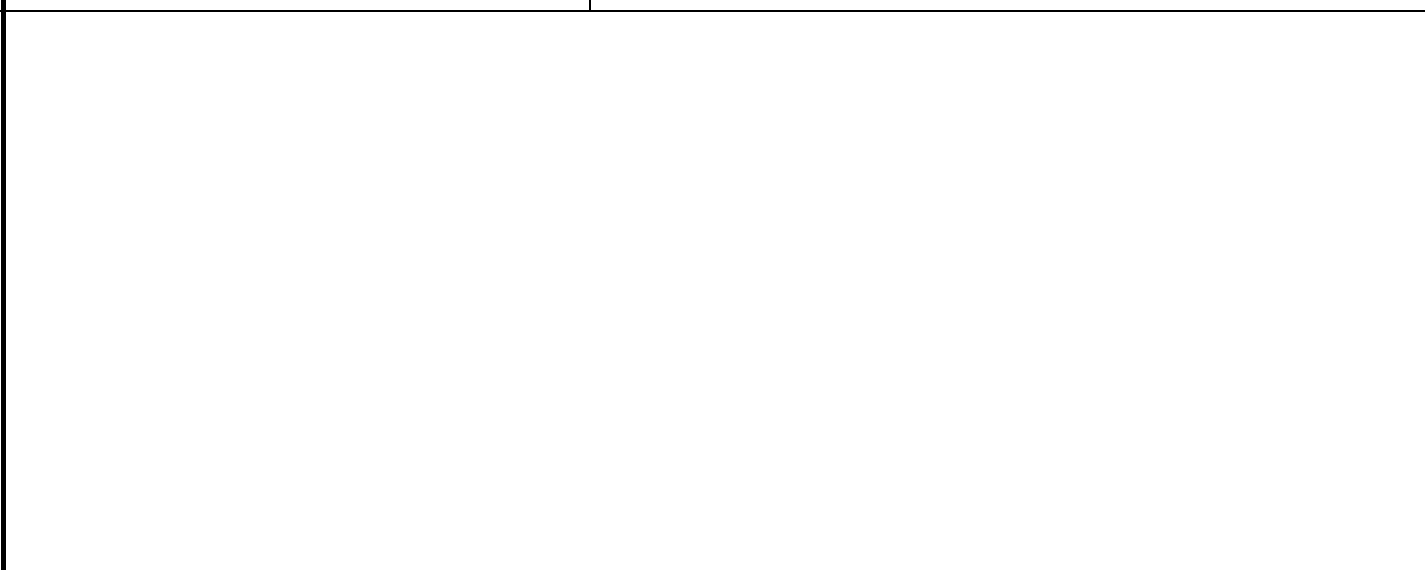
Ketohexamethylene  
Pimelic ketone  
Cyclohexyl ketone  
 $C_6H_{10}O$   
Molecular mass: 98.14

TYPES OF HAZARD/ EXPOSURE	ACUTE HAZARDS/SYMPTOMS	PREVENTION	FIRST AID/FIRE FIGHTING
<b>FIRE</b>	Flammable.	NO open flames, NO sparks, and NO smoking.	Alcohol-resistant foam, carbon dioxide, powder.
<b>EXPLOSION</b>	Above 44/C explosive vapour/air mixtures may be formed.	Above 44/C use a closed system, ventilation, and explosion-proof electrical equipment. Prevent build-up of electrostatic charges (e.g., by grounding).	In case of fire: keep drums, etc., cool by spraying with water.

EXPOSURE			
<b>Inhalation</b>	Cough. Sore throat. Dizziness. Drowsiness.	Ventilation, local exhaust, or breathing protection.	Fresh air, rest. Refer for medical attention.
<b>Skin</b>	MAY BE ABSORBED! Dry skin. Redness.	Protective gloves. Protective clothing.	Remove contaminated clothes. Rinse skin with plenty of water or shower. Refer for medical attention.
<b>Eyes</b>	Redness. Pain.	Safety goggles, or eye protection in combination with breathing protection.	First rinse with plenty of water for several minutes (remove contact lenses if easily possible), then take to a doctor.
<b>Ingestion</b>	Abdominal pain. Burning sensation.	Do not eat, drink, or smoke during work.	Rinse mouth. Give one or two glasses of water to drink. Refer for medical attention.

SPILLAGE DISPOSAL	PACKAGING & LABELLING
Personal protection: filter respirator for organic gases and vapours adapted to the airborne concentration of the substance. Chemical protection suit. Remove all ignition sources. Ventilation. Collect leaking and spilled liquid in sealable containers as far as possible. Absorb remaining liquid in sand or inert absorbent and remove to safe place.	<b>EU classification</b> Xn Symbol R: 10-20 S: (2)-25 <b>UN classification</b> UN Hazard Class: 3 UN Pack Group: III

EMERGENCY RESPONSE	SAFE STORAGE
Transport Emergency Card: TEC (R)-30S1915. NFPA Code: H1; F2; R0	Fireproof. Separated from strong oxidants.



### IMPORTANT DATA

**Physical State; Appearance**

COLOURLESS OILY LIQUID, WITH CHARACTERISTIC ODOUR.

**Physical dangers**

The vapour is heavier than air. As a result of flow, agitation, etc., electrostatic charges can be generated.

**Chemical dangers**

Reacts with strong oxidants such as nitric acid causing fire and explosion hazard.

**Occupational exposure limits**

TLV: 20 ppm as TWA; 50 ppm as STEL; (skin); A3; (ACGIH 2004).  
EU OEL: 10 ppm, 40.8 mg/m<sup>3</sup> as TWA; 20 ppm, 81.6 mg/m<sup>3</sup> as STEL; (skin); (EU 2000).

**Routes of exposure**

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

**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 and the vapour is irritating to the eyes, the skin and the respiratory tract. Exposure far above the OEL could cause lowering of consciousness.

### PHYSICAL PROPERTIES

Boiling point: 156/C  
Melting point: -32.1/C  
Relative density (water = 1): 0.95  
Solubility in water, g/100 ml at 20/C: 8.7  
Vapour pressure, Pa at 20/C: 500  
Relative vapour density (air = 1): 3.4

Relative density of the vapour/air-mixture at 20/C (air = 1): 1.01  
Flash point: 44/C c.c.  
Auto-ignition temperature: 420/C  
Explosive limits, vol% in air: 1.1 (at 100/C) -9.4  
Octanol/water partition coefficient as log Pow: 0.81

### ENVIRONMENTAL DATA

### NOTES

Card has been partially updated in July 2007: see Occupational Exposure Limits, Ingestion First Aid, Spillage Disposal.

### ADDITIONAL INFORMATION

**LEGAL NOTICE**

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