

1. IDENTIFICATION OF THE PREPARATION AND OF THE COMPANY

Catalogue No. : I 10371

Product Name : IODOMETHANE 99% (METHYL IODIDE)

Manufacturer / supplier identification

Company : NICE CHEMICALS PVT.LTD., Cochin, India

Tel - 0484 2800212, 2802755

Contact for Information : Tel . No. – 0484 2802536 Fax : 0484 2802483 Emergency Telephone No. : 0484 2801583 Tele fax No. : 0484 2802483

2. COMPOSITION / INFORMATION ON INGREDIENTS

CAS-No : 74-88-4 EC -No. 200-819-5

Molar mass : 141.94 g/mol Molecular formula : CH₃I

3. HAZARDS IDENTIFICATION: Harmful in contact with skin. Toxic by inhalation and if swallowed. Irritating to respiratory system and skin. Limited evidence of a carcinogenic effect.

4. FIRST AID MEASURES

After inhalation: Fresh air. If necessary, apply mouth to mouth resuscitation or mechanical ventilation. Immediately call in physician.

After skin contact: wash off with plenty of water. Dab with polyethylene glycol 400.

Immediately remove contaminated clothing. Call in physician.

After eye contact : Rinse out with plenty of water for at least 10 minutes with the eyelid held

wide open. Immediately call in ophthalmologist.

After swallowing : Make victim drink plenty of water, induce vomiting, summon doctor.

5. FIRE – FIGHTING MEASURES

Suitable extinguishing media: Powder.

Extinguishing media not to be used: water.

Special risks: Non-combustible. Ambient fire may liberate hazardous vapours.



Product Name : IODOMETHANE 99% (METHYL IODIDE)

The following may develop in event of fire: Hydrogen iodide.

Special protective equipment for fire fighting: Do not stay in dangerous zone without suitable chemical protection clothing and self-contained breathing apparatus.

Other information: Keep work place dry. Do not allow product to come into contact with water. Contain escaping vapours with water. Prevent fire-fighting water from entering surface water or ground water.

6. ACCIDENTAL RELEASE MEASURES

Procedures for cleaning/absorption: Take up with liquid-absorbent material. Forward for

disposal. Clean up affected area.

Person-related precautionary measures: Do not inhale vapours/aerosols. Avoid substance

contact. Ensure supply of fresh air in enclosed rooms.

Environmental-protection measures: Do not allow to enter sewerage system.

7. HANDLING AND STORAGE

Handling: Notes for safe handling: work under hood. Do not inhale substance.

Storage: At +15°C to +25°C. Tightly closed. Dry. In a well-ventilated place.

Accessible only for authorised persons.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Specific control parameters:

Name : Methyl Iodide

Carcinogenic : C3 : owing possible carcinogenic effects for man.

Personal protective equipment:

Protective clothing should be selected specifically for the working place, depending on concentration and quantity of the hazardous substances handled. The resistance of the protective clothing to chemicals should be ascertained with the respective supplier.



Product Name : IODOMETHANE 99% (METHYL IODIDE)

Respiratory protection: required when vapours/aerosols are generated.

Eye protection : required Hand protection : required

Industrial hygiene : Immediately change contaminated clothing. Application of skinprotective barrier cream. Wash hands and face after working with substance. Under no circumstances eat or drink at work place. Work under hood. Do not inhale substance.

9. PHYSICAL AND CHEMICAL PROPERTIES

Form : Liquid

Colour : colourless

Odour : ether like

PH value at $50 \text{ g/l H}_2\text{O} (20^0\text{C})$: Not available

Viscosity dynamic $(20^{\circ}C)$: 0.5 mPas

Melting temperature : -66 $^{\circ}$ C

Boiling temperature : 42 °C

Ignition temperature : $352 \, {}^{0}\text{C}$

Flash point : Not available

Explosion limits Lower: 8.5 vol %

Upper: 66 vol %

Vapour pressure (20°C) : 500 hPa

Relative vapour density : 4.89

Density (20°C) : 2.28 g/cm^{3}

Solubility in water(20°C) : 14 g/l

Ethanol (20^oC) : soluble

Ether $(20^{\circ}C)$: soluble

Thermal decomposition : > 270 $^{\circ}$ C

Log Pow : 1.68

Bioconcentration factor : 8.3 (calculated)



Product Name : IODOMETHANE 99% (METHYL IODIDE)

10. STABILITY AND REACTIVITY

Conditions to be avoided : Moisture air. Action of light (decompostion).

Heating (decomposition).

Substance to be avoided : Strong oxidizing agents, strong alkalis,

sodium, oxygen, mercury, alkali metals, water.

Hazardous decomposition products: In the event of fire: see chapter 5.

Stabilizer : Silver.

Further information : Light-sensitive, sensitive to air, sensitive to moisture.

11. TOXICOLOGICAL INFORMATION

Acute toxicity: LD₅₀ (oral, rat): 76 mg/kg. LC50 (inhalation, rat): 1300 mg/m³/4h.

The literature data available to us do not confirm with the labeling prescribed by the EC.

The EC has dossiers which have not been published.

Specific symptoms in animal studies: skin irritation test (rabbit): burns. Eye irritation

test (rabbit): burns.

Subacute to chronic toxicity: The carcinogenic potential requires further clarification.

Bacterial mutagenicity: Salmonella typhimurium: positive. Escherichia coli: positive.

Ames – test: positive.

Further toxicological information:

After inhalation: severe mucosal irritations, coughing and dyspnoea.

After skin contact: severe irritations. Danger of skin absorption.

After eye contact : severe irritations.

Property that cannot be excluded on the basis of structure-effect considerations:

Possible symptoms: Nausea, vomiting, drowsiness, impaired vision, unconsciousness,

coma, cardiac arrest. No description of any further symptoms is available.

Further data: The product should be handled with the care usual when dealing with

chemicals.



Product Name : IODOMETHANE 99% (METHYL IODIDE)

12. ECOLOGICAL INFORMATION

Abiotic degradation : Hydrolysis leads to formation of: methanol and hydrogen iodide. Air and water : slow degradation.

Biologic degradation: Slightly biodegradable.

Behavior in environmental compartments: concentration in organisms is not to be expected. Henry constant

: 532 Pam³/mol; Distribution preferentially in air.

Ecotoxic effects: Quantitative data on the ecological effect of this product are not available.

Further ecological data: Do not allow to enter waters, waste water or soil!

13. DISPOSAL METHOD

Product

There are no uniform EC Regulations for the disposal of chemicals or residues. Chemical residues generally count as special waste. The disposal of the latter is regulated in the EC Member countries through that you corresponding laws and regulations. We recommend contact either the authorities in charge or approved waste disposal companies which will advise you on how to dispose of special waste.

Packaging:

Disposal in compliance with official regulations. Handle contaminated packaging in the same way as the substance itself. If not officially specified differently, non-contaminated packaging may be treated like household waste or recycled.



Product Name : IODOMETHANE 99% (METHYL IODIDE)

14. TRANSPORT INFORMATION

Land transport : GGVS, GGVE, ADR, RID

Classification : 6.1/15a

Name : 2644 IODOMETHANE

Transport by river : ADN, ADNR
Classification : Not tested

Transport by sea : IMDG, GGVsee

Classification : 6.1 /UN 2644/PG I

Ems : 6.1- 0 MFAG : 345

Name : METHYL IODIDE

Transport by air : ICAO, IATA

Classification : 6.1 /UN 2644 / PG I Prohibited

Name : METHYL IODIDE

15. REGULATORY INFORMATION

Labelling according to EC Directives

Symbol : T Toxic

R-phrases: 21-23/25-37/38-40 Harmful in contact with skin. Toxic by inhalation

and if swallowed. Irritating to respiratory system and skin. Limited evidence of a carcinogenic.

S-phrases: 36/37-38-45 wear suitable protective clothing and gloves. In

case of insufficient ventilation, wear suitable

respiratory equipment. In case of accident or if you

feel unwell, seek medical advice immediately

EC No. : 200-819-5 EC label.



Product Name : IODOMETHANE 99% (METHYL IODIDE)

16. OTHER INFORMATION

Change in labelling.

Change/addition in the chapter 8 . specific control parameter.

Change in the chapter on first aid measures.

General update.

The information contained here in is based on the present state of our knowledge.

It characterizes the product with regard to the appropriate safety precautions.

It does not represent a guarantee of the properties of the product.