

according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 1 of 12

## SECTION 1: Identification of the substance/mixture and of the company/undertaking

#### 1.1. Product identifier

Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

REACH Registration Number: 01-2119480404-41-XXXX

CAS No: 75-09-2 Index No: 602-004-00-3 EC No: 200-838-9

### 1.2. Relevant identified uses of the substance or mixture and uses advised against

### Use of the substance/mixture

Laboratory chemicals

Industrial uses: Uses of substances as such or in preparations at industrial sites

Professional uses: Public domain (administration, education, entertainment, services, craftsmen)

#### Uses advised against

Do not use for private purposes (household).

# 1.3. Details of the supplier of the safety data sheet

Company name: AnalytiChem GmbH

ACD

Street: Stempelstraße 6
Place: D-47167 Duisburg

Telephone: 0203/5194-0 Telefax: 0203/5194-290

E-mail: info@analytichem.de

Contact person: Abteilung Produktsicherheit Telephone: 0203/5194-107/117

E-mail: produktsicherheit@analytichem.de

Internet: www.analytichem.de

Responsible Department: Abteilung Produktsicherheit

1.4. Emergency telephone For Hazardous Materials [or Dangerous Goods] Incidents Spill, Leak, Fire,

number: Exposure, or Accident Call CHEMTREC Day or Night Within USA and Canada:

1-800-424-9300 Outside USA and Canada: +1 703-741-5970 (collect calls

accepted)

#### **Further Information**

No data available

### **SECTION 2: Hazards identification**

### 2.1. Classification of the substance or mixture

### Regulation (EC) No 1272/2008

Carc. 2; H351 Skin Irrit. 2; H315 Eye Irrit. 2; H319 STOT SE 3; H336

Full text of hazard statements: see SECTION 16.

# 2.2. Label elements

## Regulation (EC) No 1272/2008

Signal word: Warning

Pictograms:







according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 2 of 12

#### **Hazard statements**

H315 Causes skin irritation.
 H319 Causes serious eye irritation.
 H336 May cause drowsiness or dizziness.
 H351 Suspected of causing cancer.

#### **Precautionary statements**

P201 Obtain special instructions before use.

P280 Wear protective gloves/protective clothing and eye protection/face protection.

P302+P352 IF ON SKIN: Wash with plenty of water.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Continue rinsing.

P308+P313 IF exposed or concerned: Get medical advice/attention. P337+P313 If eye irritation persists: Get medical advice/attention.

### 2.3. Other hazards

No data available

## **SECTION 3: Composition/information on ingredients**

### 3.1. Substances

Sum formula: CH2Cl2
Molecular weight: 84,93 g/mol

### Relevant ingredients

CAS No	Chemical name			Quantity
	EC No	Index No	REACH No	
	Classification (Regulation	on (EC) No 1272/2008)		
75-09-2	dichloromethane			100 %
	200-838-9	602-004-00-3	01-2119480404-41-XXXX	
	Carc. 2, Skin Irrit. 2, Eye	e Irrit. 2, STOT SE 3; H351 H315 H3	9 H336	

Full text of H and EUH statements: see section 16.

#### Specific Conc. Limits, M-factors and ATE

CAS No	EC No	Chemical name	Quantity
	Specific Conc. I	Limits, M-factors and ATE	
75-09-2	200-838-9	dichloromethane	100 %
	dermal: LD50 =	= > 2000 mg/kg; oral: LD50 = > 2000 mg/kg	

#### **Further Information**

This product does not contain substances of very high concern according to Regulation (EC) No 1907/2006 (REACH), Article 57 above the respective regulatory concentration limit of = 0.1 % (w/w).

## **SECTION 4: First aid measures**

# 4.1. Description of first aid measures

#### **General information**

First aider: Pay attention to self-protection!

#### After inhalation

Provide fresh air.

Call a physician immediately.

## After contact with skin

Wash immediately with: Water

Take off immediately all contaminated clothing and wash it before reuse.

Call a physician immediately.



according to Regulation (EC) No 1907/2006

# Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 3 of 12

### After contact with eyes

In case of contact with eyes flush immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart and consult an ophthalmologist.

Remove contact lenses, if present and easy to do. Continue rinsing.

Protect uninjured eye.

### After ingestion

Observe risk of aspiration if vomiting occurs.

Call a physician immediately.

## 4.2. Most important symptoms and effects, both acute and delayed

Irritant, Vapours may cause drowsiness and dizziness.

Dizziness, Inebriation

Gastrointestinal complaints, Vomiting

Unconsciousness, Cough

Respiratory complaints, Dyspnoea

Corneal opacity. Circulatory collapse

Liver and kidney damage

## 4.3. Indication of any immediate medical attention and special treatment needed

No data available

### **SECTION 5: Firefighting measures**

### 5.1. Extinguishing media

### Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

### Unsuitable extinguishing media

no restriction

### 5.2. Special hazards arising from the substance or mixture

Non-combustible liquids

Hazardous combustion products

In case of fire may be liberated:

Hydrogen chloride (HCI)

Phosgene

### 5.3. Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

In case of fire and/or explosion do not breathe fumes.

Avoid contact with skin, eyes and clothes.

## **Additional information**

Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.

Move undamaged containers from immediate hazard area if it can be done safely.

Use water spray jet to protect personnel and to cool endangered containers.

## **SECTION 6: Accidental release measures**

### 6.1. Personal precautions, protective equipment and emergency procedures

# For non-emergency personnel

Provide adequate ventilation.

Use personal protection equipment.

Avoid contact with skin, eyes and clothes.

Remove persons to safety.

Emergency procedures

Consult an expert

Do not breathe dust/fume/gas/mist/vapours/spray.

Print date: 06.03.2025



# **Safety Data Sheet**

according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 4 of 12

#### For emergency responders

Precautionary statements For emergency responders: Personal protection equipment: see section 8

#### 6.2. Environmental precautions

Do not allow to enter into surface water or drains.

#### 6.3. Methods and material for containment and cleaning up

### For containment

Cover drains.

Prevent spread over a wide area (e.g. by containment or oil barriers).

Collect in closed and suitable containers for disposal.

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents).

#### For cleaning up

Clean contaminated articles and floor according to the environmental legislation.

#### Other information

Provide adequate ventilation.

Do not breathe dust/fume/gas/mist/vapours/spray.

Wear breathing apparatus if exposed to vapours/dusts/aerosols.

### 6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

## **SECTION 7: Handling and storage**

### 7.1. Precautions for safe handling

#### Advice on safe handling

Avoid exposure - obtain special instructions before use.

Read label before use. Handle and open container with care.

When using do not eat, drink, smoke, sniff. Use personal protection equipment.

Provide adequate ventilation. Avoid contact with skin, eyes and clothes.

Do not breathe vapour/aerosol.

### Advice on protection against fire and explosion

Usual measures for fire prevention.

### Advice on general occupational hygiene

Keep away from food, drink and animal feedingstuffs. Remove contaminated, saturated clothing immediately. Draw up and observe skin protection programme. Wash hands and face before breaks and after work and take a shower if necessary. When using do not eat or drink. Avoid: aerosol or mist formation Do not breathe vapour/aerosol.

## Further information on handling

Draw up and observe skin protection programme.

Wash hands and face before breaks and after work and take a shower if necessary.

Take off immediately all contaminated clothing and wash it before reuse.

# 7.2. Conditions for safe storage, including any incompatibilities

# Requirements for storage rooms and vessels

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

Store in a place accessible by authorized persons only.

Protect against: Light

# Hints on joint storage

national regulations

# Further information on storage conditions

Keep container tightly closed.

storage temperature +2°C - +25°C

Print date: 06.03.2025



# **Safety Data Sheet**

according to Regulation (EC) No 1907/2006

# Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 5 of 12

# 7.3. Specific end use(s)

Laboratory chemicals

## **SECTION 8: Exposure controls/personal protection**

# 8.1. Control parameters

# **Occupational exposure limits**

CAS No	Substance	ppm	mg/m³	fib/cm³	Category	Origin
75-09-2	Methylene chloride	100	353		TWA (8 h)	
		200	706		STEL (15 min)	

# **Biological limit values**

CAS No	Substance	Parameter	Value	Test material	Sampling time
75-09-2	Dichloromethane/Methylene chloride	СОНЬ	4 %	J 3	Measure at end of shift

### **DNEL/DMEL values**

04044				
CAS No	Substance			
DNEL type		Exposure route	Effect	Value
75-09-2	dichloromethane			
Worker DNEL	., long-term	inhalation	systemic	353 mg/m³
Worker DNEL	., acute	inhalation	systemic	706 mg/m³
Worker DNEL	., long-term	dermal	systemic	12 mg/kg bw/day
Consumer DN	NEL, long-term	inhalation	systemic	88,3 mg/m³
Consumer DN	NEL, acute	inhalation	systemic	353 mg/m³
Consumer DN	NEL, long-term	dermal	systemic	5,82 mg/kg bw/day
Consumer DN	NEL, long-term	oral	systemic	0,06 mg/kg bw/day

# **PNEC** values

CAS No	Substance	
Environmental compartment Value		Value
75-09-2	dichloromethane	
Freshwater		0,31 mg/l
Freshwater (intermittent releases) 0,27 mg/l		0,27 mg/l
Marine water 0,031 mg/l		0,031 mg/l
Freshwater sediment 2,57 mg/kg		2,57 mg/kg
Marine sediment 0,26 mg/kg		0,26 mg/kg
Micro-organisms in sewage treatment plants (STP)  26 mg/l		26 mg/l
Soil 0,33 m		0,33 mg/kg

## 8.2. Exposure controls

# Appropriate engineering controls

Technical measures and the application of suitable work processes have priority over personal protection equipment.

If handled uncovered, arrangements with local exhaust ventilation have to be used.

## Individual protection measures, such as personal protective equipment



according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 6 of 12

### Eye/face protection

goggles

Wear eye/face protection.

#### Hand protection

When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits. The quality of the protective gloves resistant to chemicals must be chosen as a function of the specific working place concentration and quantity of hazardous substances. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves.

Protective gloves are recommended Company KCL GmbH, D-36124 Eichenzell, email: vertrieb@kcl.de With specification (test according to EN374):

By long-term hand contact: No data available

By short-term hand contact

Trade name/designation: KCL 890 Vitoject®

Recommended material: FKM (fluoro rubber) 0,7 mm
Wearing time with occasional contact (splashes): > 120 min

The breakthrough times stated above were determined by KCL in laboratory tests acc. to EN374 with samples of the recommended glove types. This recommendation applies only to the product stated in the safety data sheet<(>,<)> supplied by us and for the designated use. When dissolving in or mixing with other substances and under conditions deviating from those stated in EN374 please contact the supplier of CE-approved gloves (e.g. KCL GmbH, D-36124 Eichenzell, Internet: www.kcl.de).

## Skin protection

Wear suitable protective clothing. Take off immediately all contaminated clothing.

Wash hands before breaks and after work.

The choice of body protection depends on the concentration and quantity of hazardous substances. The chemical resistance of protective agents must be clarified with their suppliers.

#### Respiratory protection

Wear breathing apparatus if exposed to vapours/dusts/aerosols.

Filtering device with filter or ventilator filtering device of type: AX

The entrepeneur has to ensure that maintenance, cleaning and testing of respiratory protective devices are carried out according to the instructions of the producer. These measures have to be properly documented.

#### **Environmental exposure controls**

Do not allow to enter into surface water or drains.

### **SECTION 9: Physical and chemical properties**

### 9.1. Information on basic physical and chemical properties

Physical state: Liquid
Colour: clear
Odour: characteristic
Odour threshold: No data available

Melting point/freezing point:

Boiling point or initial boiling point and

40 °C

boiling range:

Flammability: No data available Lower explosion limits: 13 vol. % Upper explosion limits: 22 vol. % Flash point: X



according to Regulation (EC) No 1907/2006

# Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 7 of 12

Auto-ignition temperature: 605 °C

Decomposition temperature: >120 °C

pH-Value (at 20 °C): neutral

Viscosity / kinematic: No data available

Water solubility: 20 g/l

(at 20 °C)

Solubility in other solvents

No data available

Dissolution rate:

Partition coefficient n-octanol/water:

Dispersion stability:

Vapour pressure:

No data available

No data available

No data available

475 hPa

(at 20 °C)

Vapour pressure:No data availableDensity:1,336 g/cm³Relative density:No data availableBulk density:No data availableRelative vapour density:No data availableParticle characteristics:No data available

#### 9.2. Other information

## Information with regard to physical hazard classes

Explosive properties

No data available

Sustaining combustion:

No data available

Self-ignition temperature

Solid: No data available
Gas: No data available

Other safety characteristics

Evaporation rate:

Solvent separation test:

No data available
Solvent content:

No data available
Solid content:

Oublimation point:

Softening point:

No data available

No data available:

Viscosity / dynamic: 0,43 mPa⋅s

(at 20 °C)

Flow time: No data available

## **Further Information**

Corrosive to metals.

## **SECTION 10: Stability and reactivity**

#### 10.1. Reactivity

No data available

### 10.2. Chemical stability

Nitrogen oxides (NOx) Protect against: Light

## 10.3. Possibility of hazardous reactions

Alkali metals

Alkaline earth metal

Nitric acid



according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 8 of 12

**Amines** 

Hydrocarbons, aromatic

K, Na, Al

### 10.4. Conditions to avoid

No data available

## 10.5. Incompatible materials

Rubber articles

plastics

metals

Light metal

Steel

### 10.6. Hazardous decomposition products

In case of fire may be liberated:

**SECTION 5: Firefighting measures** 

#### **Further information**

No data available

# **SECTION 11: Toxicological information**

## 11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

### Toxicocinetics, metabolism and distribution

Avoid exposure - obtain special instructions before use.

## **Acute toxicity**

Based on available data, the classification criteria are not met.

Pulmonary oedema

Pneumonia

Mucous membrane irritation in the mouth, throat, esophagus and gastrointestinal tract.

CAS No	Chemical name					
	Exposure route	Dose		Species	Source	Method
75-09-2	dichloromethane					
	oral	LD50 mg/kg	> 2000	Rat	Other company data (1988)	OECD Guideline 401
	dermal	LD50 mg/kg	> 2000	Rat	Other company data (1988)	OECD Guideline 402

## Irritation and corrosivity

Skin corrosion/irritation: Causes skin irritation.

Serious eye damage/eye irritation: Causes serious eye irritation.

Has degreasing effect on the skin. Dermatitis

#### Sensitising effects

Based on available data, the classification criteria are not met.

## Carcinogenic/mutagenic/toxic effects for reproduction

Suspected of causing cancer. (dichloromethane)

Germ cell mutagenicity: Based on available data, the classification criteria are not met. Reproductive toxicity: Based on available data, the classification criteria are not met.

## STOT-single exposure

May cause drowsiness or dizziness. (dichloromethane)

## STOT-repeated exposure

Based on available data, the classification criteria are not met.

### **Aspiration hazard**

Based on available data, the classification criteria are not met.



according to Regulation (EC) No 1907/2006

# Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 9 of 12

### Information on likely routes of exposure

No data available

## Specific effects in experiment on an animal

No data available

#### Additional information on tests

No data available

## **Practical experience**

No data available

### 11.2. Information on other hazards

### **Endocrine disrupting properties**

No data available

#### Other information

No data available

#### **Further information**

Irritant, Vapours may cause drowsiness and dizziness.

Dizziness, Inebriation

Gastrointestinal complaints, Vomiting

Unconsciousness, Cough

Respiratory complaints, Dyspnoea

Corneal opacity. Circulatory collapse

Liver and kidney damage

# **SECTION 12: Ecological information**

## 12.1. Toxicity

Based on available data, the classification criteria are not met.

CAS No	Chemical name						
	Aquatic toxicity	Dose		[h]   [d]	Species	Source	Method
75-09-2	dichloromethane						
	Acute fish toxicity	LC50	193 mg/l	96 h	Pimephales promelas	Bull Environ Contam Toxicol 20, 344-352	According to test methods described by t
	Acute crustacea toxicity	EC50	27 mg/l	48 h	Daphnia magna	Study report (1979)	According EPA publication
	Fish toxicity	NOEC	357 mg/l	8 d	Pimephales promelas	Bull Environ ContamToxicol 39, 869-876 (	other: ASTM E729-80

## 12.2. Persistence and degradability

68 %; 28 d; aerob

OECD 301D

Readily biodegradable (according to OECD criteria).

## 12.3. Bioaccumulative potential

No indication of bioaccumulation potential.

### Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
75-09-2	dichloromethane	1,25

### **BCF**

CAS No	Chemical name	BCF	Species	Source
75-09-2	dichloromethane	> 0,91 - < 7,9		Washington, DC, US E



according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 10 of 12

### 12.4. Mobility in soil

log Koc: 1,00

### 12.5. Results of PBT and vPvB assessment

This substance does not meet the PBT/vPvB criteria of REACH, annex XIII.

### 12.6. Endocrine disrupting properties

This substance does not have endocrine disrupting properties with respect to non-target organisms.

### 12.7. Other adverse effects

Discharge into the environment must be avoided.

#### **Further information**

Do not allow to enter into surface water or drains.

### **SECTION 13: Disposal considerations**

## 13.1. Waste treatment methods

#### **Disposal recommendations**

Waste disposal according to directive 2008/98/EC, covering waste and dangerous waste.

Send to a physico-chemical treatment facility under observation of official regulations.

Do not empty into drains.

## Contaminated packaging

Handle contaminated packages in the same way as the substance itself.

The allocation of waste identity numbers/waste descriptions must be carried out according to the EEC, specific to the industry and process.

Dispose of waste according to "Kreislaufwirtschafts- und Abfallgesetz (KrW-/AbfG)".

## **SECTION 14: Transport information**

## Land transport (ADR/RID)

14.1. UN number or ID number: UN 1593
---------------------------------------

14.2. UN proper shipping name: DICHLOROMETHANE

14.3. Transport hazard class(es): 6 1 14.4. Packing group: Ш Hazard label: 6.1 Classification code: T1 Special Provisions: 516 Limited quantity: 5 I Excepted quantity: F1 Transport category: Hazard No: 60 Tunnel restriction code: Ε

### Inland waterways transport (ADN)

14.1. UN number or ID number: UN 1593

14.2. UN proper shipping name: DICHLOROMETHANE

14.3. Transport hazard class(es):6.114.4. Packing group:IIIHazard label:6.1Classification code:T1Special Provisions:516 802Limited quantity:5 LExcepted quantity:E1

Marine transport (IMDG)

14.1. UN number or ID number: UN 1593

14.2. UN proper shipping name: DICHLOROMETHANE



according to Regulation (EC) No 1907/2006

## Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 11 of 12

14.3. Transport hazard class(es):6.114.4. Packing group:IIIHazard label:6.1Special Provisions:-Limited quantity:5 LExcepted quantity:E1EmS:F-A. S-A

Air transport (ICAO-TI/IATA-DGR)

14.1. UN number or ID number: UN 1593

14.2. UN proper shipping name: DICHLOROMETHANE

14.3. Transport hazard class(es):6.114.4. Packing group:IIIHazard label:6.1Limited quantity Passenger:2 LPassenger LQ:Y642Excepted quantity:E1

IATA-packing instructions - Passenger: 655
IATA-max. quantity - Passenger: 60 L
IATA-packing instructions - Cargo: 663
IATA-max. quantity - Cargo: 220 L

### **SECTION 15: Regulatory information**

## 15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

## **EU** regulatory information

Restrictions on use (REACH, annex XVII):

Entry 3, Entry 59, Entry 75

Information according to Directive

Not subject to 2012/18/EU (SEVESO III)

2012/18/EU (SEVESO III):

**National regulatory information** 

Employment restrictions: Observe restrictions to employment for juveniles according to the 'juvenile

work protection guideline' (94/33/EC). Observe employment restrictions under the Maternity Protection Directive (92/85/EEC) for expectant or nursing mothers. Observe employment restrictions for women of

child-bearing age.

Water hazard class (D): 2 - obviously hazardous to water

### **SECTION 16: Other information**

### Abbreviations and acronyms

Skin Irrit: Skin irritation Eye Irrit: Eye irritation Carc: Carcinogenicity

STOT SE: Specific target organ toxicity - single exposure

# Relevant H and EUH statements (number and full text)

H315 Causes skin irritation.

H319 Causes serious eye irritation.
 H336 May cause drowsiness or dizziness.
 H351 Suspected of causing cancer.

#### **Further Information**

Provide appropriate information, instructions and training to users

The above information describes exclusively the safety requirements of the product and is based on our present-day knowledge. The information is intended to give you advice about the safe handling of the product



according to Regulation (EC) No 1907/2006

# Dichloromethane > 99% pure stabilized with about 20 ppm 2-methyl-2-butene

Revision date: 05.03.2025 Product code: 07056 Page 12 of 12

named in this safety data sheet, for storage, processing, transport and disposal. The information cannot be transferred to other products. In the case of mixing the product with other products or in the case of processing, the information on this safety data sheet is not necessarily valid for the new made-up material. The information is based on the present level of our knowledge. It does not, however, give assurance of product properties and establishes no contract legal rights.

The receiver of our product is singularly responsible for adhering to existing laws and regulations.