

## Safety Data Sheet

according to Regulation (EC) No 1907/2006 (REACH)  
Classifications according to Regulation (EC) No 1272/2008.  
Printdate 16 Aug 2022

## 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

### 1.1. Product name:

Propylene glycol 1-methyl ether 2-acetate

### 1.1. Catalog No.:

677131

### 1.2. Relevant identified uses of the substance or mixture

Identified: Laboratory chemical  
uses: R&D

### 1.3. Uses advised against:

HPC Standards GmbH  
Am Wieseneck 7

04451 Cunnersdorf  
Deutschland

Tel. +49 34291 3372-36  
Fax. +49 34291 3372-39  
contact@hpc-standards.com

### 1.4. Emergency telephone number

HPC Standards Tel. +49 34291 3372-36  
This number is only available during office hours.

## 2. HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture  
Classification according to Regulation (EC) No 1272/2008  
Flammable liquids (Category 3), H226 Classification according to EU Directives 67/548/EEC or 1999/45/EC  
R10

### 2.2. Label elements

#### 2.2.1. Pictogram



#### 2.2.2.

2.2 Label elements  
Labelling according Regulation (EC) No 1272/2008  
Pictogram Signal word Warning  
Hazard statement(s)  
H226 Flammable liquid and vapour Precautionary statement(s)

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  
P403 + P235 Store in a well-ventilated place. Keep cool.  
Supplemental Hazard Statements  
none  
2.3 Other hazards - none

### 3. COMPOSITION/INFORMATION ON INGREDIENTS

3.1 Substances  
Synonyms : DOWANOL®; PMA  
MPA  
1-Methoxy-2-propyl acetate  
1,2-Propanediol monomethyl ether acetate  
Propylene glycol methyl ether acetate  
PGMEA  
Formula : C<sub>6</sub>H<sub>12</sub>O<sub>3</sub>  
Molecular weight : 132,16 g/mol  
CAS-No. : 108-65-6  
EC-No. : 203-603-9  
Index-No. : 607-195-00-7  
Hazardous ingredients according to Regulation (EC) No 1272/2008  
Component Classification Concentration  
2-Methoxypropanol  
CAS-No.  
EC-No.  
Index-No.  
1589-47-5  
216-455-5  
603-106-00-0  
Flam. Liq. 3; Skin Irrit. 2; Eye  
Dam. 1; Repr. 1B; STOT SE 3;  
H226, H315, H318, H335,  
H360D  
< 0,3 %  
2-Methoxy-1-methylethyl acetate  
CAS-No.  
EC-No.  
Index-No.  
108-65-6  
203-603-9  
607-195-00-7  
Flam. Liq. 3; H226 <= 100 %  
Hazardous ingredients according to Directive 1999/45/EC  
Component Classification Concentration  
2-Methoxypropanol  
CAS-No.  
EC-No.  
Index-No.  
1589-47-5  
216-455-5  
603-106-00-0  
T, Repr.Cat.2, R61 - R10 -  
R37/38 - R41  
< 0,5 %  
2-Methoxy-1-methylethyl acetate  
CAS-No.  
EC-No.  
Index-No.  
108-65-6  
203-603-9  
607-195-00-7  
R10 <= 100 %

### 3.1.1. Formula

C<sub>6</sub>H<sub>12</sub>O<sub>3</sub>

### 3.1.2. Molecular Weight (g/mol)

132.16

### 3.1.3. CAS-No.

108-65-6

## 4. FIRST AID MEASURES

### 4.1 Description of 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

Flush eyes with water as a precaution.

#### If swallowed

Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Rinse mouth with

water. Consult a physician.

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

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

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

No data available

## 5. FIRE-FIGHTING MEASURES

### 5.1 Extinguishing media

Suitable extinguishing media

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

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

Carbon oxides

### 5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

### 5.4 Further information

Use water spray to cool unopened containers

## 6. ACCIDENTAL RELEASE MEASURES

- 6.1 Personal precautions, protective equipment and emergency procedures  
Use personal protective equipment. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapours accumulating to form explosive concentrations. Vapours can accumulate in low areas.  
For personal protection see section 8.
- 6.2 Environmental precautions  
Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
- 6.3 Methods and materials for containment and cleaning up  
Contain spillage, and then collect with an electrically protected vacuum cleaner or by wet-brushing and place in container for disposal according to local regulations (see section 13).
- 6.4 Reference to other sections  
For disposal see section 13.

## 7. HANDLING AND STORAGE

- 7.1 Precautions for safe handling  
Avoid exposure - obtain special instructions before use. Avoid inhalation of vapour or mist.  
Keep away from sources of ignition - No smoking. Take measures to prevent the build up of electrostatic charge.  
For precautions see section 2.2.
- 7.2 Conditions for safe storage, including any incompatibilities  
Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.  
Storage class (TRGS 510): Flammable liquids 7.3 Specific end use(s)  
Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

- 8.1 Control parameters  
Components with workplace control parameters  
Component CAS-No. ValueForm  
of exposure  
Control  
parameters  
Basis  
2-Methoxy-1-methylethyl acetate  
108-65-6 TWA 50 ppm  
275 mg/m<sup>3</sup>  
Europe. Commission Directive  
2000/39/EC establishing a first list of  
indicative occupational exposure  
limit values  
Remarks Identifies the possibility of significant uptake through the skin  
Indicative  
STEL 100 ppm  
550 mg/m<sup>3</sup>  
Europe. Commission Directive  
2000/39/EC establishing a first list of  
indicative occupational exposure  
limit values  
Identifies the possibility of significant uptake through the skin  
Indicative
- 8.2 Exposure controls  
Appropriate engineering controls  
Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.  
Personal protective equipment  
Eye/face protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices.

Wash and dry hands. Body Protection

impervious clothing, Flame retardant antistatic protective clothing., The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Control of environmental exposure

Prevent further leakage or spillage if safe to do so. Do not let product enter drains

## 9. PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

a) Appearance Form: clear, liquid

Colour: colourless

b) Odour No data available

c) Odour Threshold No data available

d) pH No data available

e) Melting point/freezing point

Melting point/range: < -65,99 °C at 1.013 hPa

f) Initial boiling point and boiling range

145 - 146 °C - lit.

g) Flash point 45,5 °C - closed cup

h) Evaporation rate No data available

i) Flammability (solid, gas) No data available

j) Upper/lower flammability or explosive limits

Upper explosion limit: 13,1 %(V)

Lower explosion limit: 1,3 %(V)

k) Vapour pressure 3,59 hPa at 20 °C - OECD Test Guideline 104

l) Vapour density No data available

m) Relative density 0,97 g/cm<sup>3</sup> at 25 °C - lit.

n) Water solubility 198 g/l at 20 °C

o) Partition coefficient: octanol/water

log Pow: 1,2 at 20 °C - OECD Test Guideline 117

p) Auto-ignition temperature

333 °C at 1.013 hPa

q) Decomposition temperature

No data available

r) Viscosity 1,13 mm<sup>2</sup>/s at 25 °C -

s) Explosive properties No data available

t) Oxidizing properties No data available

9.2 Other safety information

No data available

## 10. STABILITY AND REACTIVITY

- 10.1 Reactivity  
No data available
- 10.2 Chemical stability  
Stable under recommended storage conditions.
- 10.3 Possibility of hazardous reactions  
No data available
- 10.4 Conditions to avoid  
Heat, flames and sparks.
- 10.5 Incompatible materials  
Strong oxidizing agents
- 10.6 Hazardous decomposition products  
Other decomposition products - No data available  
In the event of fire: see section 5

## 11. TOXICOLOGICAL INFORMATION

- 11.1 Information on toxicological effects
  - Acute toxicity
  - LD50 Oral - Rat - female - 8.532 mg/kg
  - LD50 Dermal - Rat - male and female - > 2.000 mg/kg (OECD Test Guideline 402)
  - Skin corrosion/irritation
  - Skin - Rabbit
  - Result: No skin irritation (OECD Test Guideline 404)
  - Serious eye damage/eye irritation
  - Eyes - Rabbit
  - Result: No eye irritation
  - Respiratory or skin sensitisation
  - Maximisation Test (GPMT) - Guinea pig
  - Did not cause sensitisation on laboratory animals. (OECD Test Guideline 406)
  - Germ cell mutagenicity
  - reverse mutation assay
  - S. typhimurium
  - Result: negative
  - Carcinogenicity
  - 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.
  - Reproductive toxicity
  - No data available
  - Specific target organ toxicity - single exposure
  - No data available
  - Specific target organ toxicity - repeated exposure
  - No data available
  - Aspiration hazard
  - No data available
  - Additional Information
  - Repeated dose toxicity - Rat - male and female - Oral
  - RTECS: AI8925000
  - To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

## 12. ECOLOGICAL INFORMATION

- 12.1 Toxicity
  - Toxicity to fish mortality LC50 - Salmo gairdneri - 100 - 180 mg/l - 96 h (OECD Test Guideline 203)
  - Toxicity to daphnia and other aquatic

invertebrates  
static test EC50 - Daphnia magna (Water flea) - > 500 mg/l - 48 h  
12.2 Persistence and degradability  
Biodegradability Biotic/Aerobic - Exposure time 28 d  
Result: 83 % - Readily biodegradable  
(OECD Test Guideline 301F)  
Biochemical Oxygen  
Demand (BOD)  
0,36 mg/l  
Chemical Oxygen  
Demand (COD)  
1,74 mg/g  
12.3 Bioaccumulative potential  
No data available  
12.4 Mobility in soil  
No data available  
12.5 Results of PBT and vPvB assessment  
PBT/vPvB assessment not available as chemical safety assessment not required/not conducted  
12.6 Other adverse effects

### 13. DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods  
Product  
Burn in a chemical incinerator equipped with an afterburner and scrubber but exert extra care in igniting as this material is highly flammable. Offer surplus and non-recyclable solutions to a licensed disposal company.  
Contaminated packaging  
Dispose of as unused product

### 14. TRANSPORT INFORMATION

14.1 UN number  
ADR/RID: 3271 IMDG: 3271 IATA: 3271  
14.2 UN proper shipping name  
ADR/RID: ETHERS, N.O.S. (2-Methoxy-1-methylethyl acetate)  
IMDG: ETHERS, N.O.S. (2-Methoxy-1-methylethyl acetate)  
IATA: Ethers, n.o.s. (2-Methoxy-1-methylethyl acetate)  
14.3 Transport hazard class(es)  
ADR/RID: 3 IMDG: 3 IATA: 3 14.4 Packaging group  
ADR/RID: III IMDG: III IATA: III  
14.5 Environmental hazards  
ADR/RID: no IMDG Marine pollutant: no IATA: no  
14.6 Special precautions for user  
No data available

### 15. REGULATORY INFORMATION

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.  
15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

2-Methoxypropanol CAS-No.: 1589-47-5

REACH - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, preparations and articles (Annex XVII)

Toxic to reproduction: category 1B

Restricted to professional users.

See Annex XVII to Regulation (EC) no 1907/2006 for Conditions of restriction

15.2 Chemical Safety Assessment

For this product a chemical safety assessment was not carried out

## **16. OTHER INFORMATION**

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. For lab use only!