according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1



## Mabanol Helium Hyd HLP 46 Blue

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

### 1.1. Product identifier

Trade name/designation:

## Mabanol Helium Hyd HLP 46 Blue

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

Hydraulic fluids

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

## Supplier (manufacturer/importer/only representative/downstream user/distributor):

#### Mabanol GmbH & Co. KG

Koreastraße 7 20457 Hamburg

Germany

Telephone: 0049 (0) 40 36809988 E-mail: info@mabanol.com Website: www.mabanol.com

E-mail (competent person): giznord@giz-nord.de

### 1.4. Emergency telephone number

Giftinformationszentrale Göttingen , 24h: 0049 (0) 551 1 92 40

## **SECTION 2: Hazards identification**

#### 2.1. Classification of the substance or mixture

#### Classification according to Regulation (EC) No 1272/2008 [CLP]

The mixture is classified as not hazardous according to regulation (EC) No 1272/2008 [CLP].

### 2.2. Label elements

#### Labelling according to Regulation (EC) No. 1272/2008 [CLP]

#### Hazard components for labelling:

2,6-di-tert-butylphenol

## Supplemental hazard information

EUH210 Safety data sheet available on request.

#### 2.3. Other hazards

No data available

## SECTION 3: Composition/information on ingredients

#### 3.2. Mixtures

#### Additional information:

The classification as a carcinogen need not apply if it can be shown that the substance contains less than 3 % DMSO extract as measured by IP 346 'Determination of polycyclic aromatics in unused lubricating base oils and asphaltene free petroleum fractions — Dimethyl sulphoxide extraction refractive index method', Institute of Petroleum, London. This note applies only to certain complex oil-derived substances in Part 3.

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 2/10



# **Mabanol Helium Hyd HLP 46 Blue**

Hazardous ingredients / Hazardous impurities / Stabilisers:

Product identifiers	Substance name Classification according to Regulation (EC) No 1272/2008 [CLP]	Concentration
CAS No.: 128-39-2 EC No.: 204-884-0 REACH No.: 01-2119490822-33	1 -/ · · · · · · · · · · · · · · · · · ·	0.1 - < 0.25 weight-%

Full text of H- and EUH-phrases: see section 16.

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

## 4.1. Description of first aid measures

#### **General information:**

In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

#### Following inhalation:

Remove casualty to fresh air and keep warm and at rest. When in doubt or if symptoms are observed, get medical advice.

#### In case of skin contact:

After contact with skin, wash immediately with plenty of water and soap. Take off immediately all contaminated clothing. In case of skin irritation, consult a physician.

#### After eve contact:

Rinse immediately carefully and thoroughly with eye-bath or water. In case of eye irritation consult an ophthalmologist.

## Following ingestion:

Do NOT induce vomiting. Rinse mouth thoroughly with water. Let water be drunken in little sips (dilution effect). Never give anything by mouth to an unconscious person or a person with cramps. When in doubt or if symptoms are observed, get medical advice.

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

Observe risk of aspiration if vomiting occurs.

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

Treat symptomatically.

## **SECTION 5: Firefighting measures**

## 5.1. Extinguishing media

#### Suitable extinguishing media:

Foam. Extinguishing powder. Carbon dioxide (CO2). Water spray jet.

### Unsuitable extinguishing media:

Full water jet.

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

Burning produces heavy smoke.

## **Hazardous combustion products:**

In case of fire may be liberated: Nitrogen oxides (NOx). Carbon monoxide. Carbon dioxide (CO2). Hydrocarbons. Hydrogen sulphide (H2S). Phosphorus oxides.

## 5.3. Advice for firefighters

Do not inhale explosion and combustion gases. Wear a self-contained breathing apparatus and chemical protective clothing.

## 5.4. Additional information

Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water. Co-ordinate fire-fighting measures to the fire surroundings.

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 3/10



# **Mabanol Helium Hyd HLP 46 Blue**

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

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

## 6.1.1. For non-emergency personnel

#### Personal precautions:

Use personal protection equipment. Provide adequate ventilation. Special danger of slipping by leaking/spilling product. Avoid breathing dust/fume/gas/mist/vapours/spray. Keep away from sources of ignition - No smoking.

## 6.1.2. For emergency responders

#### **Personal protection equipment:**

Personal protection equipment: see section 8.

## 6.2. Environmental precautions

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil. Prevent spread over a wide area (e.g. by containment or oil barriers).

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

#### For cleaning up:

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal. Clean contaminated articles and floor according to the environmental legislation.

## 6.4. Reference to other sections

Personal protection equipment: see section 8

Disposal: see section 13

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

#### 7.1. Precautions for safe handling

## **Protective measures**

## Advices on safe handling:

Wear personal protection equipment (refer to section 8). Avoid: Generation/formation of mist. Do not breathe gas/fumes/vapour/spray.

#### Fire prevent measures:

Usual measures for fire prevention. Keep away from sources of ignition - No smoking.

## Advices on general occupational hygiene

When using do not eat, drink or smoke. Avoid contact with eyes and skin. Wash hands before breaks and after work. Apply skin care products after work. Do not put any product-impregnated cleaning rags into your trouser pockets. Used working clothes should not be worn outside the work area. Wash contaminated clothing before reuse.

## 7.2. Conditions for safe storage, including any incompatibilities

## Technical measures and storage conditions:

Keep container tightly closed in a cool, well-ventilated place. Only use containers specifically approved for the substance/product.

#### Hints on storage assembly:

Keep away from: Oxidizing agent.

Do not store together with: Food and feedingstuffs.

**Storage class (TRGS 510, Germany):** 10 – Combustible liquids that cannot be assigned to any of the above storage classes

#### Further information on storage conditions:

Temperature control required. Keep container tightly closed.

Protect against: Light. UV-radiation/sunlight. Air. Recommended storage temperature: <50°C.

## 7.3. Specific end use(s)

No data available

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

**Version:** 1 Page 4/10



# **Mabanol Helium Hyd HLP 46 Blue**

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

## 8.1. Control parameters

## 8.1.1. Occupational exposure limit values

No data available

## 8.1.2. Biological limit values

No data available

## 8.1.3. DNEL-/PNEC-values

Substance name	DNEL value	① DNEL type
		② Exposure route
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	70.61 mg/m <sup>3</sup>	① DNEL worker ② Long-term – inhalation, systemic effects
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	20.9 mg/m <sup>3</sup>	① DNEL Consumer ② Long-term – inhalation, systemic effects
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	11.25 mg/kg bw/day	① DNEL worker ② Long-term - dermal, systemic effects
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	6.75 mg/kg bw/day	① DNEL Consumer ② Long-term - dermal, systemic effects
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	6.75 mg/kg bw/day	DNEL Consumer     Long-term - oral, systemic effects

Substance name	PNEC Value	① PNEC type
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	0.001 mg/L	① PNEC aquatic, freshwater
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	0.0001 mg/L	① PNEC aquatic, marine water
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	10 mg/kg	① PNEC sewage treatment plant
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	0.317 mg/kg	① PNEC sediment, freshwater
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	0.0317 mg/kg	① PNEC sediment, marine water
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	0.679 mg/kg	① PNEC soil
<b>2,6-di-tert-butylphenol</b> CAS No.: 128-39-2 EC No.: 204-884-0	60 mg/kg	① PNEC secondary poisoning

## 8.2. Exposure controls

## 8.2.1. Appropriate engineering controls

Provide adequate ventilation.

## 8.2.2. Personal protection equipment



according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 5/10



## Mabanol Helium Hyd HLP 46 Blue

#### Eye/face protection:

Safety goggles with side protection. In case of increased risk add protective face shield. DIN EN 166.

### Skin protection:

Tested protective gloves must be worn (EN ISO 374).

Suitable material: NBR (Nitrile rubber). FKM (fluoro rubber). CR (polychloroprene, chloroprene rubber). Breakthrough times and swelling properties of the material must be taken into consideration. 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.

Suitable protective clothing: flame-resistant.

## **Respiratory protection:**

Usually no personal respirative protection necessary.

Respiratory protection necessary at: exceeding exposure limit values. aerosol or mist formation. Suitable respiratory protection apparatus: aerosol or mist formation: Filtering device (full mask or mouthpiece) with filter: A2, A2/P2, ABEK.

The filter class must be suitable for the maximum contaminant concentration (gas/vapour/aerosol/particulates) that may arise when handling the product. If the concentration is exceeded, self-contained breathing apparatus must be used.

## 8.2.3. Environmental exposure controls

No information available.

#### 8.3. Additional information

air limit values:

Possibility of exposure to Aerosols (Mineral oil)

Limit value (TLV-TWA) =  $5 \text{ mg/m}^3$ 

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

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

**Appearance** 

Physical state: Liquid Colour: light brown

**Odour:** not determined

## Safety relevant basis data

Parameter	Value	at °C	1 Method
			② Remark
рН	not determined		
Melting point	not determined		
Freezing point	not determined		
Initial boiling point and boiling range	> 320 °C		
Decomposition temperature	not determined		
Flash point	240 °C		① EN ISO 2592
Evaporation rate	not determined		
Auto-ignition temperature	not determined		
Upper/lower flammability or explosive limits	0.6 - 6.5 Vol-%		
Vapour pressure	not determined		
Vapour density	not determined		
Density	0.859 - 0.869 g/ cm <sup>3</sup>	15 °C	
Relative density	not determined		
Bulk density	not determined		
Water solubility	practically insoluble		
Partition coefficient: n-octanol/water	not determined		

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 6/10



# Mabanol Helium Hyd HLP 46 Blue

Parameter	Value		① Method ② Remark
Dynamic viscosity	not determined		
Kinematic viscosity	45 mm²/s	40 °C	
Pour point	-30 °C		① DIN ISO 3016

## 9.2. Other information

No data available

## SECTION 10: Stability and reactivity

#### 10.1. Reactivity

No information available.

## 10.2. Chemical stability

The product is chemically stable under recommended conditions of storage, use and temperature.

## 10.3. Possibility of hazardous reactions

No known hazardous reactions.

#### 10.4. Conditions to avoid

No information available.

## 10.5. Incompatible materials

Oxidising agent, strong.

## 10.6. Hazardous decomposition products

No known hazardous decomposition products.

## **SECTION 11: Toxicological information**

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

	2,6-di-tert-butylphenol	CAS No.: 128-39-2	EC No.: 204-	884-0		
	<b>LD<sub>50</sub> oral:</b> >5,000 mg/kg	(Rat) OECD 401				
ı	<b>LD<sub>50</sub> dermal:</b> >2,000 m	g/kg (Rat)				

## Acute oral toxicity:

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

## Acute dermal toxicity:

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

## Acute inhalation toxicity:

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

#### **Skin corrosion/irritation:**

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

#### Serious eye damage/irritation:

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

## Respiratory or skin sensitisation:

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

#### Germ cell mutagenicity:

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

#### Carcinogenicity:

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:**

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

## STOT-repeated exposure:

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

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 7/10



## Mabanol Helium Hyd HLP 46 Blue

#### **Aspiration hazard:**

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

#### Additional information:

Frequently or prolonged contact with skin may cause dermal irritation.

#### 11.2. Information on other hazards

## **Endocrine disrupting properties:**

This product does not contain a substance that has endocrine disrupting properties with respect to humans as no components meets the criteria.

## **SECTION 12: Ecological information**

## 12.1. Toxicity

**2,6-di-tert-butylphenol** CAS No.: 128-39-2 EC No.: 204-884-0

LC<sub>50</sub>: 1.4 mg/L 4 d (fish, Pimephales promelas (fathead minnow))

EC<sub>50</sub>: 0.45 mg/L 2 d (crustaceans, Daphnia magna (Big water flea))

NOEC: 0.023 mg/L 21 d (crustaceans, Daphnia magna (Big water flea))

**ErC**<sub>50</sub>: 1.4 mg/L 3 d (Algae/water plant, Pseudokirchneriella subcapitata)

#### Additional ecotoxicological information:

There are no data available on the mixture itself. The ecotoxicological properties of this mixture are determined by the ecotoxicological properties of the single components (see section 3).

Do not allow uncontrolled discharge of product into the environment.

## 12.2. Persistence and degradability

**2,6-di-tert-butylphenol** CAS No.: 128-39-2 EC No.: 204-884-0

Biodegradation: —

**Remark:** Not readily biodegradable (according to OECD criteria)

## **Biodegradation:**

Not readily biodegradable (according to OECD criteria).

#### **Additional information:**

The product is slightly soluble in water. It can be largely eliminated from the water by abiotic processes, e.g. mechanical separation.

## 12.3. Bioaccumulative potential

**2,6-di-tert-butylphenol** CAS No.: 128-39-2 EC No.: 204-884-0

Log Kow: 4.5

## **Accumulation / Evaluation:**

No information available.

## 12.4. Mobility in soil

No information available.

## 12.5. Results of PBT and vPvB assessment

**2,6-di-tert-butylphenol** CAS No.: 128-39-2 EC No.: 204-884-0

Results of PBT and vPvB assessment: This substance does not meet the PBT/vPvB criteria of REACH, Annex XIII.

The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII.

#### 12.6. Endocrine disrupting properties

This product does not contain a substance that has endocrine disrupting properties with respect to humans as no components meets the criteria.

## 12.7. Other adverse effects

No information available.

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 8/10



# **Mabanol Helium Hyd HLP 46 Blue**

# **SECTION 13: Disposal considerations**

#### 13.1. Waste treatment methods

Dispose of waste according to applicable legislation. Consult the appropriate local waste disposal expert about waste disposal. The allocation of waste identity numbers/waste descriptions must be carried out according to the EEC, specific to the industry and process.

## 13.1.1. Product/Packaging disposal

# Waste codes/waste designations according to EWC/AVV Waste code product

13 01 10 \* mineral based non-chlorinated hydraulic oils

#### **Waste treatment options**

## **Appropriate disposal / Product:**

Consult the appropriate local waste disposal expert about waste disposal.

## Appropriate disposal / Package:

Non-contaminated packages may be recycled. Handle contaminated packages in the same way as the substance itself.

## **SECTION 14: Transport information**

Land transport (ADR/RID)	Inland waterway craft (ADN)	Sea transport (IMDG)	Air transport (ICAO-TI / IATA-DGR)				
14.1. UN number or	4.1. UN number or ID number						
No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.				
14.2. UN proper ship	ping name		-				
No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.	No dangerous good in sense of these transport regulations.				
14.3. Transport haza	rd class(es)		-				
not relevant	not relevant	not relevant	not relevant				
14.4. Packing group							
not relevant	not relevant	not relevant	not relevant				
14.5. Environmental	hazards						
not relevant	not relevant	not relevant	not relevant				
14.6. Special precau	tions for user						
not relevant	not relevant	not relevant	not relevant				

# **14.7.** Maritime transport in bulk according to IMO instruments not relevant.

## **SECTION 15: Regulatory information**

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

### 15.1.1. EU legislation

## Other regulations (EU):

Directive 2012/18/EU on the control of major-accident hazards involving dangerous substances [Seveso-III-Directive]: This product is not assigned to a hazard category.

Directive 2010/75/EU on industrial emissions [Industrial Emissions Directive]: No information available. Directive 2004/42/EC on the limitation of emissions of volatile organic compounds: No information available.

Observe in addition any national regulations!

<sup>\*:</sup> Evidence for disposal must be provided.

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 9/10



# Mabanol Helium Hyd HLP 46 Blue

## 15.1.2. National regulations

# [DE] National regulations

# Störfallverordnung (12. BlmschV) for substances contained in the product:

This product is not assigned to a hazard category.

#### Water hazard class

WGK:

1 - slightly hazardous to water

#### Remark:

Self-classification (mixture; calculation rule).

## 15.2. Chemical Safety Assessment

Chemical safety assessments for substances in this mixture were not carried out.

## 15.3. Additional information

Water hazard class (WGK): 1 (slightly hazardous to water).

## **SECTION 16: Other information**

## 16.1. Indication of changes

No data available

## 16.2. Abbreviations and acronyms

ACGIH: American Conference of Governmental Industrial Hygienists

ADR: Accord européen sur le transport des marchandises dangereuses par Route (International Carriage of Dangerous Goods by Road)

AwSV: Verordnung über Anlagen zum Umgang mit wassergefährdenden Stoffen

CAS Chemical Abstracts Service DNEL: Derived No Effect Level

IARC: INTERNATIONAL AGENCY FOR RESEARCH ON CANCER IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

IATA-DGR: Dangerous Goods Regulations by the "International Air Transport Association" (IATA)

ICAO: International Civil Aviation Organization

ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO)

GHS: Globally Harmonized System of Classification and Labelling of Chemicals GefStoffV: Gefahrstoffverordnung (Ordinance on Hazardous Substances, Germany)

LOAEL: Lowest observed adverse effect level

LOAEC: Lowest observed adverse effect concentration

LC<sub>50</sub>: Lethal concentration, 50 percent

LD<sub>50</sub>: Lethal dose, 50 percent

NIOSH: National Institute of Occupational Safety and Health

NOAEL: No observed adverse effect level NOAEC: No observed adverse effect level

NTP: National Toxicology Program

N/A: not applicable

OEL: Occupational Exposure imit (Arbeitsplatzgrenzwert) OSHA: Occupational Safety and Health Administration

PEL: permissible exposure limit (Zulässiger Expositionsgrenzwert)

PBT: persistent bioaccumulative toxic PNEC: predicted no effect concentration

REL: Recommended exposure limit (Empfohlene Expositionsgrenze)

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer

(Regulations Concerning the International Transport of Dangerous Goods by Rail)

SARA: Superfund Amendments and Reauthorization Act

STEL: Short Term Exposure Limit (Kurzzeitgrenzwert) (15 min)

SVHC: substance of very high concern

TLV: Threshold Limit Values (Schwellwert Grenzwerte)

TRGS Technische Regeln für Gefahrstoffe TSCA: Toxic Substances Control Act

according to Regulation (EC) No. 1907/2006 (REACH)

Revision date: 13 Jun 2023 Print date: 13 Jun 2023

Version: 1 Page 10/10



## Mabanol Helium Hyd HLP 46 Blue

TWA: Time Weighted Average (Zeitlich gewichteter Mittelwert) (8 h)

VOC: Volatile Organic Compounds

vPvB: very persistent and very bioaccumulative

VwVwS: Verwaltungsvorschrift wassergefährdender Stoffe

WGK: Wassergefährdungsklasse

## 16.3. Key literature references and sources for data

No data available

# 16.4. Classification for mixtures and used evaluation method according to regulation (EC) No 1272/2008 [CLP]

The mixture is classified as not hazardous according to regulation (EC) No 1272/2008 [CLP].

## 16.5. Relevant R-, H- and EUH-phrases (Number and full text)

Hazard statements	Hazard statements		
H315	Causes skin irritation.		
H400 Very toxic to aquatic life.			
H410	Very toxic to aquatic life with long lasting effects.		

## 16.6. Training advice

No data available

#### 16.7. Additional information

Classification according to Regulation (EC) No 1272/2008 [CLP] - Classification procedure:

health hazards: Calculation method.

Environmental hazards: Calculation method. Physical hazards: On basis of test data.

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 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.