according to regulation 1907/2006/EC (REACH)

Trade name: **Metabond H**+

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1. Identification of the mixture and of the company/undertaking

1.1 Product identifier:

Metabond H+

1.2 Relevant identified uses of the mixture and uses advised against

Relevant identified uses: additive for hydraulic system

Uses advised against: no data

1.3 Details of the supplier of the safety data sheet:

METABOND Magyarország Kft.

H-9030 Győr, Csonkaér u. 5., Hungary

Phone / Fax: +36 96 332-738

Responsible for SDS:

METABOND Magyarország Kft.

H-9030 Győr, Csonkaér u. 5., Hungary

Phone / Fax: +36 96 332-738 E-mail: ljanos@metabond.hu

1.4 Emergency telephone number

Emergency telephone (07-15²⁰ h): +36 96 332-738 (CET) on workdays

Health Toxicological Information Service (ETTSZ 1096 Budapest, Nagyvárad tér 2.)

Tel.: +36 1 476 6464, or +36 80 201 199

National Health Toxicological Information Service:

2. Hazards identification

2.1 Classification of the substance according to regulation 1999/45/EC

Human health hazards: Xi (irritant)

R 38 Irritating to skin.

R 41 Risk of serious damage to eyes.

Safety hazards: Danger symbol not required.

Environmental hazards: N (dangerous for the environment)

R 51/53 Toxic to aquatic organisms, may cause long-term

adverse effects in the aquatic environment.

according to regulation 1907/2006/EC (REACH)

Trade name: **Metabond H**+

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2.2 Label elements

Product identification: Trade name: Metabond H+

Danger symbol(s) and indication(s):





Hazardous substance(s):

The packaging must bear the inscription:

Contains 1H-benzotriazole-1- methanamine, N,N-bis(2- ethylhexyl)-4-methyl-; 1H-benzotriazole-1- methanamine, N,N-bis (2-ethylhexyl)-5-methyl-. May produce an allergic reaction.

R-phrases: R 38 Irritating to skin.

R 41 Risk of serious damage to eyes.

R 51/53 Toxic to aquatic organisms, may cause long-term adverse effects

in the aquatic environment.

S-phrases: S 2 Keep out of the reach of children.

S 24/25 Avoid contact with skin and eyes.

S 26 In case of contact with eyes, rinse immediately with plenty of

water and seek medical advice.

S 37/39 Wear suitable gloves and eye/face protection.

S 60 This material and its container must be disposed of as hazardous

waste

S 61 Avoid release to the environment. Refer to special

instructions/Safety data sheets

Other liabilities for labelling:

Tactile warning of danger: Not required. Transport classification: see section 14.

2.3 Other hazards

no data available

according to regulation 1907/2006/EC (REACH)

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3. Composition/information on ingredients

3.1 Mixtures

Chemical description: Mixture of refined mineral oils with additives.

Component(s) / Hazardous component(s):

Name	EINECS number	CAS number	Hazard symbol / Hazard classes and cat.	Risk phrase / Hazard statements	Conc. %(m/m)
4,4'-methylene	233-593-1	10254-57-6	67/548/EEC:		max. 35
bis(dibutyldithiocarbamate)			Xi	R 36/38	
×			1272/2008/EC:	****	
			Eye Irrit. 2	H319	
Distillates (petroleum),	295-301-9	91995-40-3	Skin Irrit. 2 67/548/EEC:	H315	\
dewaxed light	293-301-9	91993-40-3	07/340/EEC.	_	
paraffinic, hydrotreated*			(Note L)		
REACH Registr.Nr.:			1272/2008/EC:		
01-211948851 7-24			Asp.Tox.1	H304	
			(Note L)		25
Lubricating oils (petrole-	305-594-8	94733-15-0	67/548/EEC:		max. 25
um), C_{18-40} , solvent-			-	-	
dewaxed hydrocracked			(Note L)		
distillate-based*			1272/2008/EC:		
REACH Registr.Nr.:			Asp.Tox.1	H304	
01-2119486987-11	500 102 1	60027.01.4	(Note L))
Dec-1-ene, homopolymer,	500-183-1	68037-01-4	67/548/EEC: Xn	D 65	max. 25
hydrogenated			1272/2008/EC:	R 65	
×				H304	
Zinc, bis[O, O-bis(2-	224-235-5		Asp.Tox.1 67/548/EEC:	П304	max. 11.0
ethylhexyl)phosphor-	224-233-3		Xi, N	R 41,	111ax. 11.0
dithyoato- S,S']-,(T-4)-			711, 11	R 51/53	
REACH Registr.Nr.:			1272/2008/EC:		
01-2119493635-27			Aquatic Chronic 2	H411	
×			Eye Dam. 1	H318	
2.6-Di-tertbuthylphenol	204-884-0		67/548/EEC:		max. 2.15
<u>*</u>			N	R 51/53	
			1272/2008/EC:		
			Aquatic Chronic 2	H411	
			Eye Irrit. 2	H319	

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Name	EINECS number	CAS number	Hazard symbol / Hazard classes and cat.	Risk phrase / Hazard statements	Conc. %(m/m
Benzenesulfonic acid,	298-637-4		67/548/EEC:	Statements	max. 1.
di-(C10-18) alkyl	270 037 4		Xi	R 38, R 53	max. 1.
derivative calcium salts			1272/2008/EC:	K 30, K 33	
X			Aquatic Chronic 4	H413	
			Eye Irrit. 2	H319	
Triphenyl phosphite	202-908-4	101-02-0	67/548/EEC:	П319	max. 1.
	202-906-4	101-02-0	Xn, N	D 22 D 26/29	max. 1.
×			All, IN	R 22, R 36/38,	
			1272/2009/EC	R 50/53	
			1272/2008/EC:	11202	
			Acute Tox. 4	H302	
			Aquatic Acute 1	H400	
			Aquatic Chronic 1	H410	
			Eye Irrit. 2	H319	
NI11	265 100 5	64740.04.5	Skin Irrit. 2	H315	0.7
Naphtha (petroleum),	265-198-5	64742-94-5	67/548/EEC:	D 26/20	max. 0.2
heavy aromatic			Xn, N	R 36/38,	
× ±				R 51/53, R 65	
			1272/2008/EC:		
			Aquatic Chronic 2	H411	
			Asp. Tox. 1	H304	
			Eye Irrit. 2	H319	
			Flam. Liq. 3	H226	
p-dodecyl phenol (isomer	310-154-3	121158-58-5	67/548/EEC:		max. 0.2
mixture)			Xn, N	R 38, R 62,	
★ 隻				R 50/53	
			1272/2008/EC:		
			Aquatic Acute 1	H400	
			Aquatic Chronic 1	H410	
			Repr. 2	H361	
			Skin Irrit. 2	H315	
1H-benzotriazole-1-	279-503-4	-	67/548/EEC:		max. 0.2
methanamine, N, N-bis (2-			Xi	R 38, R 43,	
ethylhexyl)-4-methyl-			1070 /0000 /7 0	R 52	
×			1272/2008/EC:		
			Aquatic Chronic 2	H411	
			Skin Irrit. 2	H315	
			Skin Sens. 1	H317	
1H-benzotriazole-1-	279-514-4		67/548/EEC:		max. 0.2
methanamine, N, N-bis (2-			Xi	R 38, R 43,	
ethylhexyl)-5-methyl-				R 52	
X			1272/2008/EC:		
			Aquatic Chronic 2	H411	
			Skin Irrit. 2	H315	
			Skin Sens. 1	H317	

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Name	EINECS number	CAS number	Hazard symbol / Hazard classes and cat.	Risk phrase / Hazard statements	Conc. %(m/m)
Diphenylamine	204-539-4	122-39-4	67/548/EEC:		max. 0.2
№ ₹			T, N	R 23/24/25,	
				R 33, R 50/53	
			1272/2008/EC:		
			Acute Tox. 3	H301	
			Acute Tox. 3	H311	
			Acute Tox. 3	H331	
			Aquatic Acute 1	H400	
			Aquatic Chronic 1	H410	
			Eye Irrit. 2	H319	
			STOT RE 1	H372	
			STOT RE 2	H373	
Phenol	203-632-7	108-95-2	67/548/EEC:		max. 0.2
			T	R 23/24/25,	
				R 34,	
				R 48/20/21/22,	
				R 68	
			1272/2008/EC:		
			Acute Tox. 3	H301	
			Acute Tox. 3	H311	
			Acute Tox. 3	H331	
			Eye Dam. 1	H318	
			Muta. 2	H341	
			Skin Corr. 1B	H314	
			STOT RE 2	H373	

^{*:} with exposure limit

The full text of each relevant R-, H- phrase and Hazard classes and cat. see in Section 16.

4. First aid measures

4.1 Description of first aid measures

General information: Never give anything by mouth to an unconscious person, or never

induce vomiting.

Inhalation: Remove the affected person to fresh air. If rapid recovery does not occur,

obtain medical attention.

Skin Wash skin with large amounts of water, use soap. Remove contaminated

contact: clothing. In case of persistent irritation, get medical attention.

according to regulation 1907/2006/EC (REACH)

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Eye contact: Flush eyes with plenty of water for 10-15 minutes. In case of persistent

irritation, get medical attention.

Ingestion: If swallowed, give water. Do not induce vomiting. Get medical attention.

4.2 Most important symptoms and effects, both acute and delayed

May produce an allergic reaction.

4.3 Indication of any immediate medical attention and special treatment need Not required.

5. Fire-fighting measures

Fire hazards:

Moderately hazardous (see also Section 9 - flash point).

5.1 Extinguishing media

Suitable extinguishing media:

Foam, carbon dioxide, dry chemical powder.

Unsuitable extinguishing media:

Water jet.

5.2 Special hazards arising from the mixture

Hazardous combustion products:

On burning, carbon dioxide, carbon monoxide, sulphur oxide, phosphor oxides, zinc oxide, various hydrocarbons and soot can be formed.

5.3 Advice for fire-fighters

Special protective equipment:

According to the existing fire-fighting regulations. Respiratory protection.

Further information:

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6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures Personal precautions: see Section 8.

6.2 Environmental precautions:

Confine spills to prevent material from entering sewers, watercourses, drains and into soil Notify relevant authority.

according to regulation 1907/2006/EC (REACH)

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6.3 Methods and material for containment and cleaning up

On soil: Contain spilled liquid with sand, earth or other suitable absorbents.

Dispose of according to local regulations.

On water: Confine the spillage. Remove from surface by skimming or suitable

absorbents. Notify local authorities according to regulations.

6.4 Reference to other sections

Personal precautions: see section 8. Waste treatment methods: see section 13.

7. Handling and storage

7.1 Precautions for safe handling

Keep general measures applied for normal operations with lubricants.

Keep away from radiant heat and open flame.

Avoid contact with skin and eyes. Avoid prolonged breathing of oil vapours or mists.

Avoid splashing the product.

Ensure washing facilities after working hours and before breaks. Take off contaminated or oil-soaked clothing, wash with warm water and soap.

When using do not eat, drink or smoke.

Handling temperature: not known

7.2 Conditions for safe storage, including any incompatibilities

Storage facilities must comply with regulations for storing of flammable liquids.

Store in dry, well ventilated place in original, closed containers.

Keep away from radiant heat, open flame and strong oxidizing agents.

Storage temperature: max. 40°C

7.3 Specific end use(s)

Additive for hydraulic system.

8. Exposure controls / personal protection

Engineering control measures:

Not required.

8.1 Control parameters:

Mineral oil mist: TWA: 5 mg/m³; STEL: 10 mg/m³, for oil mist, vapour

excluded (ACGIH).

Method of testing, recommended: NIOSH 5026

according to regulation 1907/2006/EC (REACH)

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8.2 Exposure controls

Personal protection:

Respiratory protection: Breathing apparatus not required.

Hand protection: Oil resistant gloves (EN 374, Breakthrough time 480 min)

(e.g. nitrile rubber – minimal thickness 0.33 mm).

Note: Manufacturer's directions for use and the conditions of

application should be observed.

Eye protection: Protective goggles not required. Skin protection: Protective clothing (oil resistant).

Other special: no data

Environmental exposure controls:

Do not discharge into drains/surface waters/groundwater.

9. Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance:

Physical state: liquid

Colour: brown, clear

Odour: characteristic, not unpleasant petroleum

odour

Change in physical state:

Pour point (ISO 3016): not available Boiling point: not available

Others:

Flash point (COC) (EN ISO 2592): not available Ignition point (EN ISO 2592): not available Autoignition temperature: not available Explosive properties: not explosive Oxidizing properties: not available Vapour pressure at 20°C: negligible Density at 15°C (EN ISO 12185): not available

Solubility in water: practically insoluble in water Solubility in other solvents: gasoline, kerosene, toluene, etc.

n-Octanol/water partition coefficient:

Vapour density:

Evaporation Rate:

not available
not available

according to regulation 1907/2006/EC (REACH)

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Kinematic viscosity at 40°C (EN ISO 3104): typ. 45,89 mm²/s Kinematic viscosity at 100°C (EN ISO 3104): typ. 6,27 mm²/s pH: typ. 6,27 mm²/s not applicable

9.2 Other information

no data available

10. Stability and reactivity

10.1 Reactivity: Dangerous reactivity not known.

10.2 Chemical stability: No decomposition if stored and handled properly.

10.3 Possibility of hazardous

reactions: Not known.

10.4 Conditions to avoid: Direct heat or ignition sources.10.5 Incompatible materials: Strong oxidizing agents.

10.6 Hazardous decomposition No dangerous decomposition products are formed under normal

products: conditions. Hazardous combustion products: See Section 5.

11. Toxicological information

11.1 Information on toxicological effects

Acute toxicity:

 $\begin{array}{lll} \text{Oral:} & LD_{50} \left(\text{rat} \right) & > 2000 & \text{mg/kg} & \left(\text{based on components} \right) \\ \text{Dermal:} & LD_{50} \left(\text{rabbit} \right) & > 2000 & \text{mg/kg} & \left(\text{based on components} \right) \\ \end{array}$

Acute toxicity: irritation

Skin: irritant (based on components)

Eye: irritant (based on components), risk of serious damage to eyes

Respiratory or skin sensitisation: not sensitising (based on components), but may

produce an allergic reaction

Chronic toxicity: not known

Repeated dose toxicity: not known

according to regulation 1907/2006/EC (REACH)

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Other information, specific effects:

Note L: The classification as a carcinogen need not apply according to 1272/2008/EC, because it can be shown that the substance contains less than 3 % DMSO extract as measured by IP 346.

Carcinogen effect: not known, resp. not carcinogen (based on

components)

Mutagen effect: not known, resp. not mutagen (based on components)
Reproduction-damaging not known, resp. no reproduction-damaging effect

effect: (based on components)

12. Ecological information

12.1 Toxicity No data for the product.

Aquatic organisms: Soil organisms:

Plants:

12.2 Persistence and degradability No data available.

Biodegradability: No data available.

12.3 Bioaccumulative potential No data available.

12.4 Mobility

Mobility in soil Absorbs in soil. Mobility in water: Floats on water.

12.5 Results of PBT and vPvB Not required.

assessment

12.6 Other adverse effects

Heavy metal content: None. PCT, PCB and other chlorinated None.

hydrocarbons:

Environmental effects: Toxic to aquatic organisms, may cause long-term

adverse effects in the aquatic environment.

Water hazard class (German): -

according to regulation 1907/2006/EC (REACH)

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13. Disposal considerations

13.1 Waste treatment methods

Product disposal:

Wastes of the product or used oil should be treated as hazardous waste.

EWC cod: 13 02 05*

Mineral-based non-chlorinated engine, gear and lubricating oils.

Disposal must be in compliance with national and local regulations.

Recommended waste treatment method: incineration

Packaging disposal:

Containers with product residue should also be treated as hazardous waste according to national and local disposal regulations.

EWC cod: 15 01 10*

Packaging containing residues of or contaminated by dangerous substances.

Disposal must be in compliance with national and local regulations.

Wastewater:

Quality of wastewater emitted to natural water must comply with national and local regulations.

Care should be taken in any case to ensure compliance with EC, national and local regulations. It is the responsibility of the user to know all relevant national and local regulations.

14. Transport information

Land transport:

Road/ Railway ADR/RID:

9 Class: Classification code: M6 Packaging group: Ш Labels: 9 Limited quantity: 5 L Shipping category: 3 Tunnel restriction code: E Hazard identification Number: 30 UN number:

Correct technical name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE,

LIQUID, N.O.S.

according to regulation 1907/2006/EC (REACH)

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Waterways:

Inland waterways/ Sea transport ADN/IMDG:

Class: 9
Packaging group: III
Labels: 9
EmS number: Marine pollutant: yes
Tunnel restriction code: E
UN number: 3082

Correct technical name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE,

LIQUID, N.O.S.

Air transport: ICAO / IATA:

Class: 9
Packaging group: III
Labels: 9
UN number: 3082

Correct technical name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE.

LIQUID, N.O.S.

15. Regulatory information

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

This safety data sheet has been prepared according to Regulation 1907/2006/EC (mod.: 453/2010/EC).

15.2 Chemical safety assessment.

not available

16. Other information

The information given in this data sheet is based on our best knowledge at the time of publication. The information is related only to this product and is intended to assist its safe transport, handling and use. The given physical and chemical parameters describe the product only for the purpose of safety requirements and therefore should not be construed as guaranteeing any specific property of the product or as being part of a product specification or any contract.

The manufacturer or supplier shall not take responsibility for any damages from the use other than recommended or other misuse of the product. It is the responsibility of the user to keep regulatory precautions and observe recommendations for safe use of the product.

according to regulation 1907/2006/EC (REACH)

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Source of data presented in this material safety data sheet:

Test results of this product

Material safety data sheets of product's components

Hungarian and EU lists of dangerous substances

Relevant Hungarian regulation and EU directives

Classification of the mixture according to regulation 1272/2008/EC

Hazard Class and Category: Hazard statement:

not available

The full text of each relevant R-, H- phrase and Hazard classes and cat. in Section 3.:

R 22	Harmful if swallowed.
R 23/24/25	Toxic by inhalation, in contact with skin and if swallowed.
R 33	Danger of cumulative effects.
R 34	Causes burns.
R 36/38	Irritating to eyes and skin.
R 38	Irritating to skin.
R 41	Risk of serious damage to eyes.
R 43	May cause sensitisation by skin contact.
R 48/20/21/22	Harmful: danger of serious damage to health by prolonged exposure
	through inhalation, in contact with skin and if swallowed.
R 50/53	Very toxic to aquatic organisms, may cause long-term adverse effects
	in the aquatic environment.
R 51/53	Toxic to aquatic organisms, may cause long-term adverse effects in
	the aquatic environment.
R 52	Harmful to aquatic organisms.
R 53	May cause long-term adverse effects in the aquatic environment.
R 62	Possible risk of impaired fertility.
R 65	Harmful: may cause lung damage if swallowed.
R 68	Possible risk of irreversible effects.

according to regulation 1907/2006/EC (REACH)

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H226	Flammable liquid and vapour.
H301	Toxic if swallowed.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H311	Toxic in contact with skin.
H314	Causes severe skin burns and eye damage.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H341	Suspected of causing genetic defects
H361	Suspected of damaging fertility or the unborn child.
H372	Causes damage to organs through prolonged or repeated exposure
	through prolonged or repeated exposure.
H373	May cause damage to organs through prolonged or repeated exposure
	through prolonged or repeated exposure.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.
H413	May cause long lasting harmful effects to aquatic life.
Flam. Liq. 3	Flammable liquid Category 3
Acute Tox. 3	Acute toxicity Category 3
Acute Tox. 4 Acute toxicity Category 4	
Asp.Tox. 1 Aspiration hazard Category 1	
Skin Irrit. 2	Skin corrosion/irritation Category 2
Skin Corr. 1B	Skin corrosion/irritation Category 1B
Skin Sens. 1	Respiratory/skin sensitization Category 1
Eye Dam. 1 Serious eye damage/eye irritation Category 1	
Eye Irrit. 2	Serious eye damage/eye irritation Category 2
Muta. 2	Germ cell mutagenicity Category 2
Repr. 2	Reproductive toxicity Category 2
STOT RE 1	Specific target organ toxicity — repeated exposure Category 1
STOT RE 2	Specific target organ toxicity – repeated exposure Category 2
Aquatic Acute 1	Hazardous to the aquatic environment, Acute Category 1
Aquatic Chronic 1	Hazardous to the aquatic environment, Chronic Category 1
Aquatic Chronic 2	Hazardous to the aquatic environment, Chronic Category 2
Aquatic Chronic 4	Hazardous to the aquatic environment, Chronic Category 4

according to regulation 1907/2006/EC (REACH)

Trade name: Metabond H+

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Revision Indicators:				
Section	Subject of change	Date	Version	