

SECTION 1: Identification of the substance/mixture and of the company/undertaking**1.1. Product identifier**

Product form : Mixture
Product name : Heliowash Ink Remover
Product code : 1124900
Type of product : Cleaning product
Product group : Alkaline mixture

1.2. Relevant identified uses of the substance or mixture and uses advised against**1.2.1. Relevant identified uses**

Main use category : Professional use

1.2.2. Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

MDC Max Daetwyler GmbH
Raiffeisenstraße 27
DE 64347 Griesheim
Duitsland
T +49615587130, F +49615564210
info@daetwylergmbh.de, www.daetwylergmbh.com

1.4. Emergency telephone number

Country/Area	Organisation	Emergency number
Germany	Giftinformationszentrum der Länder Rheinland-Pfalz und Hessen. Klinische Toxikologie. Universitätsmedizin der Johannes Gutenberg-Universität Mainz. Langenbeckstraße 1. Gebäude 601 55131 Mainz.	+49 (0) 6131 19240

SECTION 2: Hazards identification**2.1. Classification of the substance or mixture****Classification according to Regulation (EC) No. 1272/2008 [CLP]**

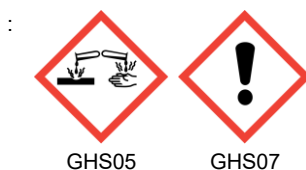
Corrosive to metals, Category 1 H290
Acute toxicity (oral), Category 4 H302
Skin corrosion/irritation, Category 1, Sub-Category 1A H314
Full text of H-statements: see section 16

Adverse physicochemical, human health and environmental effects

No additional information available

2.2. Label elements**Labelling according to Regulation (EC) No. 1272/2008 [CLP]**

Hazard pictograms (CLP)



Signal word (CLP)

: Danger

Contains

: Potassium hydroxide; Tetrasodiummethylenediamine tetraacetate

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

Hazard statements (CLP)	: H290 - May be corrosive to metals. H302 - Harmful if swallowed. H314 - Causes severe skin burns and eye damage.
Precautionary statements (CLP)	: P234 - Keep only in original container. P264 - Wash hands thoroughly after handling. P301+P330+P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting. P303+P361+P353 - IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower. P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.

2.3. Other hazards

Contains no PBT and/or vPvB substances $\geq 0.1\%$ assessed in accordance with REACH Annex XIII

The mixture does not contain substance(s) included in the list established in accordance with Article 59(1) of REACH for having endocrine disrupting properties, or substance(s) are not identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at a concentration equal to or greater than 0,1 %

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
Potassium hydroxide	CAS-No.: 1310-58-3 EC-No.: 215-181-3 REACH-no: 01-2119487136-33	5 – 15	Met. Corr. 1, H290 Acute Tox. 4 (Oral), H302 Skin Corr. 1A, H314 Eye Dam. 1, H318
2-(2-butoxyethoxy)ethanol	CAS-No.: 112-34-5 EC-No.: 203-961-6 EC Index-No.: 603-096-00-8 REACH-no: 01-2119475104-44	5 – 15	Eye Irrit. 2, H319
Tetrasodiummethylenediamine tetraacetate	CAS-No.: 64-02-8 EC-No.: 200-573-9 EC Index-No.: 607-428-00-2 REACH-no: 01-2119486762-27	< 5	Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Inhalation), H332 Eye Dam. 1, H318 STOT RE 2, H373

Specific concentration limits:

Name	Product identifier	Specific concentration limits (%)
Potassium hydroxide	CAS-No.: 1310-58-3 EC-No.: 215-181-3 REACH-no: 01-2119487136-33	($0.5 \leq C < 2$) Eye Irrit. 2; H319 ($0.5 \leq C < 2$) Skin Irrit. 2; H315 ($2 \leq C < 5$) Skin Corr. 1B; H314 ($5 \leq C \leq 100$) Skin Corr. 1A; H314

Full text of H-statements: see section 16

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general : In all cases of doubt, or when symptoms persist, seek medical attention.

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

First-aid measures after inhalation	: Remove person to fresh air and keep comfortable for breathing. Take to hospital.
First-aid measures after skin contact	: Take off contaminated clothing. Rinse skin with water/shower. Transport to hospital immediately.
First-aid measures after eye contact	: Remove contact lenses, if present and easy to do. Continue rinsing. Rinse with plenty of water. Get immediate medical advice and attention.
First-aid measures after ingestion	: Rinse mouth out with water. Do NOT induce vomiting. Transport to hospital immediately.

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

Symptoms/effects after inhalation	: Unconsciousness. Dizziness. Headache. Nausea. Drowsiness.
Symptoms/effects after skin contact	: Pungent. Severe burns. Redness. Pain.
Symptoms/effects after eye contact	: Pungent. Pain. Redness. Blurred vision.
Symptoms/effects after ingestion	: Caustic, lack of breath, vomiting, blisters on lips and tongue, burning pain in mouth and throat, gullet and stomach.

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

None.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media	: Water spray, powder, foam, CO2.
------------------------------	-----------------------------------

5.2. Special hazards arising from the substance or mixture

Fire hazard	: None known.
Explosion hazard	: None known.

5.3. Advice for firefighters

Precautionary measures fire	: No special precautions required.
Firefighting instructions	: No specific firefighting instructions required.
Protection during firefighting	: No specific measures are necessary.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures	: Do not touch spilled material. Do not breathe vapour. Do not breathe spray. Remove contaminated clothing and shoes.
------------------	---

6.1.1. For non-emergency personnel

No additional information available

6.1.2. For emergency responders

No additional information available

6.2. Environmental precautions

Prevent entry to sewers and public waters.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up	: Absorb the product onto porous material.
-------------------------	--

6.4. Reference to other sections

See Headings 8 and 13.

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Handle carefully. Avoid spillage.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Keep container tightly closed and in well ventilated place. Keep out of frost.
Storage area : Keep container tightly closed and in well ventilated place. Keep out of frost.
Packaging materials : Suitable packing materials: Plastic. Packing material to avoid: Metal.

7.3. Specific end use(s)

Cleaning product.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

8.1.1 National occupational exposure and biological limit values

No additional information available

8.1.2. Recommended monitoring procedures

No additional information available

8.1.3. Air contaminants formed

No additional information available

8.1.4. DNEL and PNEC

No additional information available

8.1.5. Control banding

No additional information available

8.2. Exposure controls

8.2.1. Appropriate engineering controls

Appropriate engineering controls:

The level of protection and types of measures depend on workplace conditions. Adequate ventilation must be provided so that exposure limits are not exceeded. For more information, see section 7.

8.2.2. Personal protection equipment

Personal protective equipment:

Gloves. Safety glasses. Protective clothing.

Personal protective equipment symbol(s):



8.2.2.1. Eye and face protection

Eye protection:

Safety glasses. Face-shield

8.2.2.2. Skin protection

Skin and body protection:

Impermeable clothing

Hand protection:

Nitrile rubber gloves (EN374). Breakthrough time: > 480 Min. Layer thickness : 0,35 mm. Always wash hands after handling the product

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

8.2.2.3. Respiratory protection

Respiratory protection:

Ensure adequate air ventilation. In case of insufficient ventilation, wear suitable respiratory equipment

Respiratory protection			
Device	Filter type	Condition	Standard
Mask	ABEK		

8.2.2.4. Thermal hazards

No additional information available

8.2.3. Environmental exposure controls

Environmental exposure controls:

Comply with relevant environmental regulations limiting discharges to air, water and soil. Protect the environment by applying proper control measures to prevent or reduce releases. For more information, see sections 6 and 13.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	: Liquid
Colour	: Colourless.
Appearance	: Clear.
Odour	: Characteristic.
Odour threshold	: Not available
Melting point	: 0 °C
Freezing point	: Not available
Boiling point	: 100 – 173 °C
Flammability	: Not applicable.
Explosive properties	: Not applicable.
Oxidising properties	: Not applicable.
Lower explosive limit (LEL)	: 0.85 Vol-%
Upper explosive limit (UEL)	: 24.6 Vol-%
Flash point	: /.
Auto-ignition temperature	: /.
Decomposition temperature	: No data available.
pH	: 14 @ 20 °C
pH solution	: /.
Viscosity, kinematic	: 1 mm²/s @ 20 °C
Viscosity, dynamic	: 1 mPa·s @ 20 °C
Solubility	: completely soluble.
Partition coefficient n-octanol/water (Log Kow)	: Not available
Vapour pressure	: 2332 Pa @ 20 °C
Vapour pressure at 50°C	: Not available
Density	: 1.151 kg/l @ 20 °C
Relative density	: Not available
Relative vapour density at 20°C	: Not applicable.
Relative gas density	: Not applicable.
Particle characteristics	: Not applicable

9.2. Other information

9.2.1. Information with regard to physical hazard classes

Explosion limits	: 1.13 – 10.6
------------------	---------------

9.2.2. Other safety characteristics

Relative evaporation rate (butylacetate=1)	: 0.3
VOC content	: 0 %

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable at ambient temperature and under normal conditions of use.

10.2. Chemical stability

Extremely high or low temperatures.

10.3. Possibility of hazardous reactions

None.

10.4. Conditions to avoid

Protect from sunlight. Do not expose to temperatures exceeding 50 °C.

10.5. Incompatible materials

Keep away from (strong) acids.

10.6. Hazardous decomposition products

No hazardous decomposition products known.

SECTION 11: Toxicological information

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

Acute toxicity (oral) : Harmful if swallowed.
Acute toxicity (dermal) : Not classified
Acute toxicity (inhalation) : Not classified

Heliowash Ink Remover	
ATE CLP (dermal)	> 2000 mg/kg
Potassium hydroxide (1310-58-3)	
LD50 oral rat	356 mg/kg
LD50 dermal rabbit	≥ 5000 mg/kg
LC50 Inhalation - Rat	≥ 50 mg/l/4h
2-(2-butoxyethoxy)ethanol (112-34-5)	
LD50 oral rat	3305 mg/kg
LD50 dermal rabbit	≥ 2764 mg/kg
LC50 Inhalation - Rat	≥ 50 mg/l/4h
Tetrasodiummethylenediamine tetraacetate (64-02-8)	
LD50 oral rat	1780 mg/kg
LD50 dermal rabbit	≥ 5000 mg/kg
LC50 Inhalation - Rat	10 mg/l/4h
Skin corrosion/irritation	: Causes severe skin burns. pH: 14 @ 20 °C

Potassium hydroxide (1310-58-3)	
pH	> 14 @ 20 °C.
Serious eye damage/irritation	: Assumed to cause serious eye damage pH: 14 @ 20 °C

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

Potassium hydroxide (1310-58-3)

pH > 14 @ 20 °C.

Respiratory or skin sensitisation : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified
Reproductive toxicity : Not classified
STOT-single exposure : Not classified
STOT-repeated exposure : Not classified

Tetrasodiummethylenediamine tetraacetate (64-02-8)

STOT-repeated exposure May cause damage to organs through prolonged or repeated exposure.

Aspiration hazard : Not classified

Heliowash Ink Remover

Viscosity, kinematic 1 mm²/s @ 20 °C

Potassium hydroxide (1310-58-3)

Viscosity, kinematic 1 mm²/s @ 20 °C.

11.2. Information on other hazards

11.2.1. Endocrine disrupting properties

No additional information available

11.2.2. Other information

No additional information available

SECTION 12: Ecological information

12.1. Toxicity

Ecology - general : No data available.
Hazardous to the aquatic environment, short-term (acute) : Not classified
Hazardous to the aquatic environment, long-term (chronic) : Not classified

2-(2-butoxyethoxy)ethanol (112-34-5)

LC50 - Fish [1] 1300 mg/l (96 hr, (Lepomis microlophus)

EC50 - Crustacea [1] > 100 mg/l (Daphnia)

ErC50 algae > 100 mg/l

Tetrasodiummethylenediamine tetraacetate (64-02-8)

LC50 - Fish [1] 121 mg/l

EC50 - Crustacea [1] 625 mg/l (24h)

EC50 96h - Algae [1] > 100 mg/l

12.2. Persistence and degradability

Heliowash Ink Remover

Persistence and degradability This surfactant complies with the biodegradability criteria as laid down in Regulation (EC) No.648/2004 on detergents. Data to support this assertion are held at the disposal of the competent authorities of the Member States and will be made available to them, at their direct request or at the request of a detergent manufacturer.

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

Potassium hydroxide (1310-58-3)

Persistence and degradability	Not rapidly degradable
-------------------------------	------------------------

2-(2-butoxyethoxy)ethanol (112-34-5)

Persistence and degradability	Rapidly degradable
Biodegradation	100 % 28 days (OECD 302 B)

Tetrasodiummethylenediamine tetraacetate (64-02-8)

Persistence and degradability	Not rapidly degradable
-------------------------------	------------------------

12.3. Bioaccumulative potential

Heliowash Ink Remover

Bioaccumulative potential	No data available.
---------------------------	--------------------

Potassium hydroxide (1310-58-3)

Bioaccumulative potential	No data available.
---------------------------	--------------------

12.4. Mobility in soil

Heliowash Ink Remover

Ecology - soil	WGK 3. Completely soluble in water.
----------------	-------------------------------------

Potassium hydroxide (1310-58-3)

Ecology - soil	WGK 2. Completely soluble in water.
----------------	-------------------------------------

12.5. Results of PBT and vPvB assessment

No additional information available

12.6. Endocrine disrupting properties

No additional information available

12.7. Other adverse effects

Heliowash Ink Remover

Other information	No data available
-------------------	-------------------

Potassium hydroxide (1310-58-3)

Other information	No data available
-------------------	-------------------

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional waste regulation	: Comply with local regulations for disposal.
Waste treatment methods	: Do not discharge into drains.
Product/Packaging disposal recommendations	: Disposal must be done according to official regulations.

SECTION 14: Transport information

In accordance with ADR

14.1. UN number or ID number

UN-No. (ADR)	: UN 1719
--------------	-----------

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

14.2. UN proper shipping name

Proper Shipping Name (ADR) : Caustic alkali liquid, n.o.s.
Transport document description (ADR) (ADR) : UN 1719 Caustic alkali liquid, n.o.s. (mixture with potassium hydroxide), 8, II, (E)

14.3. Transport hazard class(es)

ADR

Transport hazard class(es) (ADR) : 8
Danger labels (ADR) : 8
:



14.4. Packing group

Packing group (ADR) : II

14.5. Environmental hazards

Dangerous for the environment : No
Other information : No supplementary information available

14.6. Special precautions for user

Special transport precautions : Risk of burns, Do not allow to enter drains or water courses, Prevent flow to low areas

Overland transport

Special provisions (ADR) : 274
Limited quantities (ADR) : 1I
Excepted quantities (ADR) : E2
Packing instructions (ADR) : P001, IBC02
Mixed packing provisions (ADR) : MP15
Portable tank and bulk container instructions (ADR) : T11
Portable tank and bulk container special provisions (ADR) : TP2, TP27
Tank code (ADR) : L4BN
Vehicle for tank carriage : AT
Transport category (ADR) : 2
Hazard identification number (Kemler No.) : 80
Orange plates :

Tunnel restriction code (ADR) : E

14.7. Maritime transport in bulk according to IMO instruments

Not applicable

SECTION 15: Regulatory information

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

15.1.1. EU-Regulations

REACH Annex XVII (Restriction List)

Contains no substance(s) listed on REACH Annex XVII (Restriction Conditions)

REACH Annex XIV (Authorisation List)

Contains no substance(s) listed on REACH Annex XIV (Authorisation List)

REACH Candidate List (SVHC)

Contains no substance(s) listed on the REACH Candidate List

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

PIC Regulation (Prior Informed Consent)

Contains no substance(s) listed on the PIC list (Regulation EU 649/2012 concerning the export and import of hazardous chemicals)

POP Regulation (Persistent Organic Pollutants)

Contains no substance(s) listed on the POP list (Regulation EU 2019/1021 on persistent organic pollutants)

Ozone Regulation (2024/590)

Not listed on the Ozone Depletion list (Regulation EU 2024/590)

Contains no substance(s) listed on the Ozone Depletion list (Regulation EU 2024/590 on substances that deplete the ozone layer)

Council Regulation (EC) for the control of dual-use items

Contains no substance subject to the COUNCIL REGULATION (EC) for the control of dual-use items

VOC Directive (2004/42)

VOC content : 0 %

Explosives Precursors Regulation (EU 2019/1148)

Contains no substance(s) listed on the Explosives Precursors list (Regulation EU 2019/1148 on the marketing and use of explosives precursors)

Drug Precursors Regulation (EC 273/2004)

Contains no substance(s) listed on the Drug Precursors list (Regulation EC 273/2004 on the manufacture and the placing on market of certain substances used in the illicit manufacture of narcotic drugs and psychotropic substances)

15.1.2. National regulations

Germany

Water hazard class (WGK) : WGK 3, Highly hazardous to water (Classification according to AwSV, Annex 1).

VOC content : 0 %

15.2. Chemical safety assessment

No data available

SECTION 16: Other information

Indication of changes

Section	Changed item	Comments
1		
16		

Full text of H- and EUH-statements:

Acute Tox. 4 (Inhalation)	Acute toxicity (inhal.), Category 4
Acute Tox. 4 (Oral)	Acute toxicity (oral), Category 4
Eye Dam. 1	Serious eye damage/eye irritation, Category 1
Eye Irrit. 2	Serious eye damage/eye irritation, Category 2
Met. Corr. 1	Corrosive to metals, Category 1
Skin Corr. 1A	Skin corrosion/irritation, Category 1, Sub-Category 1A
Skin Corr. 1B	Skin corrosion/irritation, Category 1, Sub-Category 1B
Skin Irrit. 2	Skin corrosion/irritation, Category 2
STOT RE 2	Specific target organ toxicity – Repeated exposure, Category 2
H290	May be corrosive to metals.
H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.

Heliowash Ink Remover

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878

Full text of H- and EUH-statements:

H315	Causes skin irritation.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H373	May cause damage to organs through prolonged or repeated exposure.

Safety Data Sheet (SDS), EU

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.