Safety Data Sheet

acc. to 29 CFR 1910.1200 App D

Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

SECTION 1: Identification

Product identifier 1.1

Trade name

Adam's Iron Remover

1.2 Relevant identified uses of the substance or mixture and uses advised against **Relevant** identified uses Vehicle cleaner

1.3 Details of the supplier of the safety data sheet

Adam's Polishes Inc. 8225 North Valley Hwy. Thornton CO 80221 720-484-5059

tips@adamspolishes.com www.adamspolishes.com

1.4 **Emergency telephone number**

Emergency information service

USA 1.800.535.5053, INTL 1.352.323.3500 24 hour emergency number

SECTION 2: Hazard(s) identification

Classification of the substance or mixture 2.1

Classification acc. to OSHA "Hazard Communication Standard" (29 CFR 1910.1200)

Section	Hazard class	Category	Hazard class and category	Hazard state- ment
A.4S	skin sensitization	1	Skin Sens. 1	H317

For full text of abbreviations: see SECTION 16.

2.2 Label elements

Labelling acc. to OSHA "Hazard Communication Standard" (29 CFR 1910.1200)

- Signal word warning
- Pictograms

GHS07

- Hazard statements H317

May cause an allergic skin reaction.

- Precautionary statements

i i obaditoritar y ota	
P261	Avoid breathing dust/fume/gas/mist/vapors/spray.
P272	Contaminated work clothing must not be allowed out of the workplace.
P280	Wear protective gloves/protective clothing/eye protection/face protection.
P302+P352	If on skin: Wash with plenty of water.
P321	Specific treatment (see on this label).
P333+P313	If skin irritation or rash occurs: Get medical advice/attention.
P363	Wash contaminated clothing before reuse.
P501	Dispose of contents/container in accordance with local/regional/national/international regulations.

Revision: 2019-12-05







Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

(2-hydroxyethyl)ammonium mercaptoacetate

- Hazardous ingredients for labelling

2.3 Other hazards

Hazards not otherwise classified

May be harmful if swallowed (GHS category 5: acutely toxic - oral). Harmful to aquatic life with long lasting effects (GHS category 3: aquatic toxicity - acute and/or chronic).

Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB.

SECTION 3: Composition/information on ingredients

3.1 Substances

Not relevant (mixture)

3.2 Mixtures

Description of the mixture

Hazardous ingredients acc. to GHS						
Name of substance	Identifier	Wt%	Classification acc. to GHS			
(2-hydroxyethyl)ammonium mer- captoacetate	CAS No 126-97-6	12-<20	Acute Tox. 4 / H302 Skin Sens. 1B / H317			
2-(2-butoxyethoxy)ethanol	CAS No 112-34-5	1-<3	Eye Irrit. 2 / H319			

For full text of abbreviations: see SECTION 16. Exact percentage of ingredients is withheld as a trade secret.

SECTION 4: First-aid measures

4.1 Description of first- aid measures

General notes

Do not leave affected person unattended. Remove victim out of the danger area. Keep affected person warm, still and covered. Take off immediately all contaminated clothing. In all cases of doubt, or when symptoms persist, seek medical advice. In case of unconsciousness place person in the recovery position. Never give anything by mouth.

Following inhalation

If breathing is irregular or stopped, immediately seek medical assistance and start first aid actions. Provide fresh air.

Following skin contact

Wash with plenty of soap and water.

Following eye contact

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

Following ingestion

Rinse mouth with water (only if the person is conscious). Do NOT induce vomiting.





Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

SECTION 5: Fire-fighting measures

5.1 Extinguishing media

Suitable extinguishing media Water spray, Alcohol resistant foam, BC-powder, Carbon dioxide (CO2)

Unsuitable extinguishing media

Water jet

5.2 Special hazards arising from the substance or mixture

Hazardous combustion products

Nitrogen oxides (NOx), Carbon monoxide (CO), Carbon dioxide (CO2)

5.3 Advice for firefighters

In case of fire and/or explosion do not breathe fumes. Coordinate firefighting measures to the fire surroundings. Do not allow firefighting water to enter drains or water courses. Collect contaminated firefighting water separately. Fight fire with normal precautions from a reasonable distance.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

For non-emergency personnel

Remove persons to safety.

For emergency responders

Wear breathing apparatus if exposed to vapors/dust/aerosols/gases.

6.2 Environmental precautions

6.3 Methods and material for containment and cleaning up

Advice on how to contain a spill

Covering of drains

Advice on how to clean up a spill

Wipe up with absorbent material (e.g. cloth, fleece). Collect spillage: sawdust, kieselgur (diatomite), sand, universal binder

Appropriate containment techniques

Use of adsorbent materials.

Other information relating to spills and releases

Place in appropriate containers for disposal. Ventilate affected area.

6.4 Reference to other sections

Hazardous combustion products: see section 5. Personal protective equipment: see section 8. Incompatible materials: see section 10. Disposal considerations: see section 13.



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Recommendations

- Measures to prevent fire as well as aerosol and dust generation

Use local and general ventilation. Use only in well-ventilated areas.

Advice on general occupational hygiene

Wash hands after use. Do not eat, drink and smoke in work areas. Remove contaminated clothing and protective equipment before entering eating areas. Never keep food or drink in the vicinity of chemicals. Never place chemicals in containers that are normally used for food or drink. Keep away from food, drink and animal feedingstuffs.

7.2 Conditions for safe storage, including any incompatibilities

Control of the effects

Protect against external exposure, such as

Frost

7.3 Specific end use(s)

See section 16 for a general overview.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limit values (Workplace Exposure Limits)

	I		`	1	•	,					
Coun try	Name of agent	CAS No	lden- tifier	TWA [ppm]	TWA [mg/ m³]	STEL [ppm]	STEL [mg/ m³]	Ceil- ing-C [ppm]	Ceil- ing-C [mg/ m ³]	Nota tion	Sourc e
US	diethylene glycol monobutyl ether	112-34-5	TLV®	10						iv	AC- GIH® 2019

Notation

Ceiling-C ceiling value is a limit value above which exposure should not occur

iv inhalable fraction and vapor

STEL short-term exposure limit: a limit value above which exposure should not occur and which is related to a 15-minute period (unless otherwise specified)

TWA time-weighted average (long-term exposure limit): measured or calculated in relation to a reference period of 8 hours time-weighted average (unless otherwise specified

Relevant DNELs of components of the mixture							
Name of substance	CAS No	End- point	Threshold level	Protection goal, route of exposure	Used in	Exposure time	
(2-hydroxyethyl)am- monium mercapto- acetate	126-97-6	DNEL	1.41 mg/m ³	human, inhalatory	worker (industry)	chronic - systemic effects	
(2-hydroxyethyl)am- monium mercapto- acetate	126-97-6	DNEL	2.06 mg/kg bw/day	human, dermal	worker (industry)	chronic - systemic effects	
2-(2-butoxyethoxy)eth- anol	112-34-5	DNEL	67.5 mg/m ³	human, inhalatory	worker (industry)	chronic - systemic effects	



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

Revision: 2019-12-05

_

Relevant DNELs of components of the mixture								
Name of substance	CAS No	End- point	Threshold level	Protection goal, route of exposure	Used in	Exposure time		
2-(2-butoxyethoxy)eth- anol	112-34-5	DNEL	67.5 mg/m ³	human, inhalatory	worker (industry)	chronic - local ef- fects		
2-(2-butoxyethoxy)eth- anol	112-34-5	DNEL	101.2 mg/m ³	human, inhalatory	worker (industry)	acute - local ef- fects		
2-(2-butoxyethoxy)eth- anol	112-34-5	DNEL	83 mg/kg bw/day	human, dermal	worker (industry)	chronic - systemic effects		

Relevant PNECs of	Relevant PNECs of components of the mixture								
Name of substance	CAS No	End- point	Threshold level	Organism	Environmental compartment	Exposure time			
(2-hydroxyethyl)am- monium mercapto- acetate	126-97-6	PNEC	38 ^{µg} / _l	aquatic organisms	freshwater	short-term (single instance)			
(2-hydroxyethyl)am- monium mercapto- acetate	126-97-6	PNEC	3.8 ^{µg} / _l	aquatic organisms	marine water	short-term (single instance)			
(2-hydroxyethyl)am- monium mercapto- acetate	126-97-6	PNEC	3.2 ^{mg} / _l	aquatic organisms	sewage treatment plant (STP)	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	200 ^{mg} / _l	microorganisms	sewage treatment plant (STP)	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	4 ^{mg} / _{kg}	benthic organisms	sediment	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	56 ^{mg} / _{kg}	(top) predators	water	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	3.9 ^{mg} / _l	aquatic organisms	water	intermittent re- lease			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	0.4 ^{mg} / _{kg}	pelagic organisms	sediment	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	1.1 ^{mg} / _l	aquatic organisms	freshwater	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	0.11 ^{mg} / _l	aquatic organisms	marine water	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	200 ^{mg} / _l	aquatic organisms	sewage treatment plant (STP)	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	4.4 ^{mg} / _{kg}	aquatic organisms	freshwater sedi- ment	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	0.44 ^{mg} / _{kg}	aquatic organisms	marine sediment	short-term (single instance)			
2-(2-butoxyethoxy)eth- anol	112-34-5	PNEC	0.32 ^{mg} / _{kg}	terrestrial organisms	soil	short-term (single instance)			





Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

Revision: 2019-12-05

8.2 Exposure controls

Appropriate engineering controls

General ventilation.

Individual protection measures (personal protective equipment)

Eye/face protection

Wear eye/face protection.

Skin protection

- Hand protection

Wear suitable gloves. Chemical protection gloves are suitable, which are tested according to EN 374. Check leak-tightness/impermeability prior to use. In the case of wanting to use the gloves again, clean them before taking off and air them well. 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.

- Other protection measures

Take recovery periods for skin regeneration. Preventive skin protection (barrier creams/ointments) is recommended. Wash hands thoroughly after handling.

Environmental exposure controls

Use appropriate container to avoid environmental contamination. Keep away from drains, surface and ground water.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance

Physical state	liquid
Color	orange
Odor	citrus - slightly sulfurous

Other safety parameters

pH (value)	7 – 8 (25 °C)				
Melting point/freezing point	not determined				
Initial boiling point and boiling range	100 °C				
Flash point	114 °C at 101.3 kPa				
Evaporation rate	not determined				
Flammability (solid, gas)	not relevant, (fluid)				
Explosive limits	not determined				
Vapor pressure	31.69 hPa at 25 °C				
Density	1.1 ^g / _{cm³} at 25 °C				
	1				



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

Vapor density	this information is not available
Solubility(ies)	
- Water solubility	miscible in any proportion
Partition coefficient	
- n-octanol/water (log KOW)	this information is not available
Auto-ignition temperature	210 °C (auto-ignition temperature (liquids and gases))
Viscosity	not determined
Explosive properties	none
Oxidizing properties	none
Temperature class (USA, acc. to NEC 500)	T3 (maximum permissible surface temperature on the equipment: 200 °C)

SECTION 10: Stability and reactivity

10.1 Reactivity

Concerning incompatibility: see below "Conditions to avoid" and "Incompatible materials".

10.2 Chemical stability

See below "Conditions to avoid".

10.3 Possibility of hazardous reactions

No known hazardous reactions.

10.4 Conditions to avoid

There are no specific conditions known which have to be avoided.

10.5 Incompatible materials

Oxidizers

10.6 Hazardous decomposition products

Reasonably anticipated hazardous decomposition products produced as a result of use, storage, spill and heating are not known. Hazardous combustion products: see section 5.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Test data are not available for the complete mixture.

Classification procedure

The method for classification of the mixture is based on ingredients of the mixture (additivity formula).

Classification acc. to OSHA "Hazard Communication Standard" (29 CFR 1910.1200)

Acute toxicity

Shall not be classified as acutely toxic.



Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

Revision: 2019-12-05

GHS of the United Nations, annex 4: May be harmful if swallowed.

Acute toxicity estimate (ATE) of components of the mixture					
Name of substance	Exposure route	ATE			
(2-hydroxyethyl)ammonium mercaptoacetate	126-97-6	oral	318 ^{mg} / _{kg}		

Skin corrosion/irritation

Shall not be classified as corrosive/irritant to skin.

Serious eye damage/eye irritation

Shall not be classified as seriously damaging to the eye or eye irritant.

Respiratory or skin sensitization

May cause an allergic skin reaction.

Germ cell mutagenicity

Shall not be classified as germ cell mutagenic.

Carcinogenicity

Shall not be classified as carcinogenic.

Reproductive toxicity

Shall not be classified as a reproductive toxicant.

Specific target organ toxicity - single exposure

Shall not be classified as a specific target organ toxicant (single exposure).

Specific target organ toxicity - repeated exposure

Shall not be classified as a specific target organ toxicant (repeated exposure).

Aspiration hazard

Shall not be classified as presenting an aspiration hazard.

SECTION 12: Ecological information

12.1 Toxicity

Г

Harmful to aquatic life with long lasting effects.

Aquatic toxicity (acute) of components of the mixture							
Name of substance	CAS No	Endpoint	Value	Species	Exposure time		
(2-hydroxyethyl)am- monium mercaptoacet- ate	126-97-6	LC50	>100 ^{mg} / _l	fish	96 h		
(2-hydroxyethyl)am- monium mercaptoacet- ate	126-97-6	EC50	>100 ^{mg} / _l	aquatic invertebrates	48 h		
(2-hydroxyethyl)am- monium mercaptoacet- ate	126-97-6	ErC50	65 ^{mg} / _l	algae	72 h		
2-(2-butoxyethoxy)eth- anol	112-34-5	LC50	1,300 ^{mg} / _l	fish	96 h		



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

Aquatic toxicity (acute) of components of the mixture					
Name of substance	CAS No	Endpoint	Value	Species	Exposure time
2-(2-butoxyethoxy)eth- anol	112-34-5	EC50	>100 ^{mg} / _l	aquatic invertebrates	48 h
2-(2-butoxyethoxy)eth- anol	112-34-5	ErC50	>100 ^{mg} / _l	algae	96 h

Aquatic toxicity (chro	nic) of component	ts of the mixture			
Name of substance	CAS No	Endpoint	Value	Species	Exposure time
(2-hydroxyethyl)am- monium mercaptoacet- ate	126-97-6	EC50	>1,000 ^{mg} / _l	microorganisms	3 h

12.2 Persistence and degradability

Data are not available.

12.3 Bioaccumulative potential

Data are not available.

12.4 Mobility in soil

Data are not available.

12.5 Results of PBT and vPvB assessment Data are not available.

12.6 Other adverse effects

Endocrine disrupting potential

None of the ingredients are listed.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Sewage disposal-relevant information

Do not empty into drains. Avoid release to the environment. Refer to special instructions/safety data sheets.

Waste treatment of containers/packages

Completely emptied packages can be recycled. Handle contaminated packages in the same way as the substance itself.

Remarks

Please consider the relevant national or regional provisions. Waste shall be separated into the categories that can be handled separately by the local or national waste management facilities.



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

14.1 UN number

- 14.2 UN proper shipping name
- 14.3 Transport hazard class(es)
- 14.4 Packing group
- 14.5 Environmental hazards

not subject to transport regulations

- not assigned
- not assigned
- not assigned
- non-environmentally hazardous acc. to the dangerous goods regulations

- **14.6** Special precautions for user There is no additional information.
- **14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code** The cargo is not intended to be carried in bulk.

Information for each of the UN Model Regulations

Transport of dangerous goods by road or rail (49 CFR US DOT)

Not subject to transport regulations.

International Maritime Dangerous Goods Code (IMDG) Not subject to IMDG.

International Civil Aviation Organization (ICAO-IATA/DGR)

Not subject to ICAO-IATA.

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations specific for the product in question National regulations (United States)

Toxic Substance Control Act (TSCA)

all ingredients are listed

Superfund Amendment and Reauthorization Act (SARA TITLE III)

- The List of Extremely Hazardous Substances and Their Threshold Planning Quantities (EPCRA Section 302, 304)

none of the ingredients are listed

- Specific Toxic Chemical Listings (EPCRA Section 313) none of the ingredients are listed

Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA)

- List of Hazardous Substances and Reportable Quantities (CERCLA section 102a) (40 CFR 302.4) none of the ingredients are listed

Clean Air Act

none of the ingredients are listed



Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

Right to Know Hazardous Substance List

- Cleaning Product Right to Know Act Substance List (CA-RTK)

Name of substance	CAS No	Functionality	Authoritative Lists
water	7732-18-5	carrier fluid / dis- solver	
(2-hydroxyethyl)ammonium mercaptoacetate	126-97-6	metal cleaner	
2-(2-butoxyethoxy)ethanol		co-solvent	CA TACs
alcohols, C11-15 secondary, ethoxylated	84133-50-6	surfactant	
sodium gluconate	527-07-1	chelate / se- questrant	
Terpenes & Terpenoids, grapefruit oil	68917-32-8	fragrance	
Grapefruit oil	8016-20-4	fragrance	
propylene glycol	57-55-6	humectant	
Ethyl methylphenylglycidate	77-83-8	fragrance	
beta-lonone	14901-07-6	fragrance	
benzyl benzoate	120-51-4	fragrance	EU Fragrance Allergens
4-(p-Hydroxyphenyl)-2-butanone	5471-51-2	fragrance	
Allyl heptanoate	142-19-8	fragrance	

- Toxic or Hazardous Substance List (MA-TURA)

Name of substance	CAS No	DEP CODE	PBT / HHS / LHS	PBT / HHS Threshol d	De Minimis Con- centration Threshold
2-(2-butoxyethoxy)ethanol		1022			1.0 %

- Hazardous Substance List (NJ-RTK)

Name of substance	CAS No	Remarks	Classifications
2-(2-butoxyethoxy)ethanol			

- Hazardous Substance List (Chapter 323) (PA-RTK)

Name of substance	CAS No	Classification
2-(2-butoxyethoxy)ethanol		E

Legend

E Environmental hazard

California Environmental Protection Agency (Cal/EPA): Proposition 65 - Safe Drinking Water and Toxic Enforcement Act of 1987

none of the ingredients are listed

VOC content

Regulated Volatile Organic Compounds (VOC-EPA): 0.433 % Regulated Volatile Organic Compounds (VOC-Cal ARB): 0.4341 %

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

Industry or sector specific available guidance(s)

NPCA-HMIS® III

Hazardous Materials Identification System. American Coatings Association.

Category	Rating	Description	
Chronic	/	none	
Health	2	temporary or minor injury may occur	
Flammability	1	material that must be preheated before ignition can occur	
Physical hazard	0	material that is normally stable, even under fire conditions, and will not react with water, polymerize, decompose, condense, or self-react. Non-explosive	
Personal protection	-		
Chronic: Flammability: Health: Personal protection: Physical hazard:	chronic hazard flammability haza health hazard personal protecti reactivity	mability hazard th hazard onal protective equipment (PPE) for normal use	

NFPA® 704

National Fire Protection Association: Standard System for the Identification of the Hazards of Materials for Emergency Response (United States).

Category	Degree of hazard	Description
Flammability	1	material that must be preheated before ignition can occur
Health	2	material that, under emergency conditions, can cause temporary incapacitation or residual injury
Instability	0	material that is normally stable, even under fire conditions
Special hazard		

National inventories

Country	Inventory	Status
CA	DSL	all ingredients are listed
EU	REACH Reg.	not all ingredients are listed
US	TSCA	all ingredients are listed

Legend

 DSL
 Domestic Substances List (DSL)

 REACH Reg.
 REACH registered substances

 TSCA
 Toxic Substance Control Act

15.2 Chemical Safety Assessment

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



Adam's Iron Remover

Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

Revision: 2019-12-05

SECTION 16: Other information, including date of preparation or last revision

Indication of changes (revised safety data sheet)

Section	Former entry (text/value)	Actual entry (text/value)	Safety- relevant
2.3		Hazards not otherwise classified: change in the listing (table)	yes
5.2	Hazardous combustion products: Carbon monoxide (CO), Carbon dioxide (CO2)	Hazardous combustion products: Nitrogen oxides (NOx), Carbon monoxide (CO), Carbon dioxide (CO2)	yes
6.2	Environmental precautions: not required	Environmental precautions	yes
9.1	Flash point: not determined	Flash point: 114 °C at 101.3 kPa	yes
9.1	Auto-ignition temperature: 210 °C	Auto-ignition temperature: 210 °C (auto-ignition temperature (liquids and gases))	yes
12.1	Toxicity: Shall not be classified as hazardous to the aquatic environment.	Toxicity: Harmful to aquatic life with long lasting effects.	yes
12.1		Aquatic toxicity (acute) of components of the mix- ture: change in the listing (table)	yes
12.1		Aquatic toxicity (chronic) of components of the mix- ture: change in the listing (table)	yes
15.1		Right to Know Hazardous Substance List	yes
15.1		Cleaning Product Right to Know Act Substance List (CA-RTK)	yes
15.1		Cleaning Product Right to Know Act Substance List (CA-RTK): change in the listing (table)	yes
15.1		Toxic or Hazardous Substance List (MA-TURA)	yes
15.1		Toxic or Hazardous Substance List (MA-TURA): change in the listing (table)	yes
15.1		Hazardous Substance List (NJ-RTK)	yes
15.1		Hazardous Substance List (NJ-RTK): change in the listing (table)	yes
15.1		Hazardous Substance List (Chapter 323) (PA-RTK)	yes
15.1		Hazardous Substance List (Chapter 323) (PA-RTK): change in the listing (table)	yes
15.1	VOC content: Regulated Volatile Organic Compounds (VOC- EPA): 0.6506 % Regulated Volatile Organic Compounds (VOC-Cal ARB): 0.6517 %	VOC content: Regulated Volatile Organic Compounds (VOC- EPA): 0.433 % Regulated Volatile Organic Compounds (VOC-Cal ARB): 0.4341 %	yes
16		Abbreviations and acronyms: change in the listing (table)	yes



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5)

Revision: 2019-12-05

Abbreviations and acronyms

Abbr.	Descriptions of used abbreviations	
49 CFR US DOT	49 CFR U.S. Department of Transportation	
ACGIH® 2019	From ACGIH®, 2019 TLVs® and BEIs® Book. Copyright 2019. Reprinted with permission. Information on the proper use of the TLVs® and BEIs®: http://www.acgih.org/tlv-bei-guidelines/policies-procedures-presentations/tlv-bei-position-statement	
Acute Tox.	Acute toxicity	
ATE	Acute Toxicity Estimate	
Cal ARB	California Air Resources Board	
CAS	Chemical Abstracts Service (service that maintains the most comprehensive list of chemical substances)	
Ceiling-C	Ceiling value	
DEP CODE	Department of Environmental Protection Code	
DGR	Dangerous Goods Regulations (see IATA/DGR)	
DNEL	Derived No-Effect Level	
EC50	Effective Concentration 50 %. The EC50 corresponds to the concentration of a tested substance causing 50 % changes in response (e.g. on growth) during a specified time interval	
EPA	Environmental Protection Agency. An agency of the federal government of the United States charged with protect- ing human health and the environment	
ErC50	= EC50: in this method, that concentration of test substance which results in a 50 % reduction in either growth (EbC50) or growth rate (ErC50) relative to the control	
Eye Dam.	Seriously damaging to the eye	
Eye Irrit.	Irritant to the eye	
GHS	"Globally Harmonized System of Classification and Labelling of Chemicals" developed by the United Nations	
HHS	Higher hazard substance	
IATA	International Air Transport Association	
IATA/DGR	Dangerous Goods Regulations (DGR) for the air transport (IATA)	
ICAO	International Civil Aviation Organization	
IMDG	International Maritime Dangerous Goods Code	
LC50	Lethal Concentration 50%: the LC50 corresponds to the concentration of a tested substance causing 50 % lethal- ity during a specified time interval	
LHS	Lower hazard substance	
MARPOL	International Convention for the Prevention of Pollution from Ships (abbr. of "Marine Pollutant")	
NPCA-HMIS® III	National Paint and Coatings Association: Hazardous Materials Identification System - HMIS® III, Third Edition	
OSHA	Occupational Safety and Health Administration (United States)	
PBT	Persistent, Bioaccumulative and Toxic	
PNEC	Predicted No-Effect Concentration	
ppm	Parts per million	
RTECS	Registry of Toxic Effects of Chemical Substances (database of NIOSH with toxicological information)	
Skin Sens.	Skin sensitization	



Version number: GHS 6.0 Replaces version of: 2019-09-16 (GHS 5) Revision: 2019-12-05

Abbr.	Descriptions of used abbreviations
STEL	Short-term exposure limit
TLV®	Threshold Limit Values
TWA	Time-weighted average
VOC	Volatile Organic Compounds
vPvB	Very Persistent and very Bioaccumulative

Key literature references and sources for data

OSHA Hazard Communication Standard (HCS), 29 CFR 1910.1200.

Transport of dangerous goods by road or rail (49 CFR US DOT). International Maritime Dangerous Goods Code (IMDG). Dangerous Goods Regulations (DGR) for the air transport (IATA).

Classification procedure

Physical and chemical properties: The classification is based on tested mixture. Health hazards, Environmental hazards: The method for classification of the mixture is based on ingredients of the mixture (additivity formula).

List of relevant phrases (code and full text as stated in chapter 2 and 3)

Code	Text
H302	Harmful if swallowed.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.

Disclaimer

This information is based upon the present state of our knowledge. This SDS has been compiled and is solely intended for this product.