



PRODUCT: UNICOATINGS SDS PREPARATION DATE: 03 September 2015, updated 09 May 2016

1. <u>IDENTIFICATION OF THE SUBSTANCE OR MIXTURE</u> AND OF THE SUPPLIER

1.1 PRODUCT/TRADE NAME: UNICOATINGS - UC2K HD Hardener

1.2 RECOMMENDED USE OF THE CHEMICAL AND RESTRICTIONS ON USE:

Hardener for two-component lacquer systems

 Relevant identified uses of the substance or mixture and uses advised against: No further relevant information available.

1.3 SUPPLIER DETAILS

UC international Marine bv/ io Beatrixhaven 19 4251 NK, The Netherlands T +31(0) 183 69 10 10 www.ucinternationalmarine.com

1.4 EMERGENCY TELEPHONE NUMBER

+31(0) 183 69 10 10

PRODUCT NUMBER: UC2K HD HARDENER UN 2920 MEETS GHS AND ISO 11014-1

2. HAZARDS IDENTIFICATION

CLASSIFICATION OF THE SUBSTANCE OR MIXTURE:

- Physical hazards: Not classified for physical hazards.
- Health hazards: Acute toxicity, oral, skin corrosion/irritation and may cause sensitization by skin contact
- Environmental hazards: Harmful

GHS HAZARD STATEMENTS:

H302: Harmful if swallowed.

H314: Causes severe skin burns and eye damage.

H317: May cause an allergic skin reaction.

GHS label elements, including precautionary statements: GHS05 GHS07







SAFETY DATA SHEET



P405:

UC2K Coating Hardener

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PRECAUTIONARY STATEMENTS

P280: Wear protective gloves/protective clothing/eye protection/face

protection. Store locked up.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several

minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

P310 Immediately call a POISON CENTER or doctor/physician.
P303+P361+P353 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.

Name of the ingredient given on the warning label:

3-Aminopropyltriethoxysilane, isophorondiamine, trimethylhexane-1,6-diamine.

OTHER HAZARDS:

This product does not contain substances which are classified as persistent, bio-accumulative and/or toxic (PBT) or very persistent and very bio-accumulative (vPvB)

3. COMPOSITION/INFORMATION ON INGREDIENTS AND SUBSTANCE CHEMICAL IDENTITY:

CHEMICAL COMPOSITION:

Mixtures of below listed substances and other unlisted ingredients. Unlisted ingredients are not "hazardous" per the GHS Classification.

3.1 SUBSTANCES

This product is a mixture; Aminish silicon compounds with additives.

3.2 HAZARDOUS INGREDIENTS:

3-Aminopropyltriethoxysilane

EINECS: 213-048-4 - CAS No 919-30-2 Content > 50 %

Benzyl alcohol

EINECS: 202-859-9- CAS No 100-51-6 Content 2.5 - < 5 %

Isophorondiamine

EINECS: 220-666-8 - CAS No 2855-13-2 Content 1 - < 2.5 %

Trimethylhexane-1,6-diamine

EINECS: 247-134-8 - CAS No 25620-58-0 Content 1 < 2,5 %

ADDITIONAL INFORMATION:

For wording of the listed risk phrases please refer to section 16.





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4. FIRST AID MEASURE

4.1 DESCRIPTION OF FIRST AID MEASURES

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance.

If inhaled

In case of inhalation of vapours: remove the person to fresh air, in case of indisposition obtain medical advice.

In case of skin contact

Take off contaminated clothing. Wash off affected skin with plenty of water using soap in case of indisposition obtain medical advice.

In case of eye contact

Spreading the eyelids, rinse thoroughly under running water, see an eye specialist immediately.

If swallowed

Make the person rinse out the mouth and drink plenty of water, call a physician.

4.2 MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED

No data available.

4.3 INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED

No data available.

5. FIREFIGHTING MEASURES

5.1 EXTINGUISHING MEDIA

Suitable extinguishing media

Sprinkling water, solid extinguishing agent, CO2, foam resistant to alcohol. Unsuitable extinguishing media Direct water-jet.

-..... **,**-...

5.2 SPECIAL HAZARDS ARISING FROM THE SUBSTANCE OR MIXTURE

Thermal decomposition to carbon monoxide and nitrogen-organic cracked products.

5.3 ADVICE FOR FIREFIGHTERS

Tightly closing fireproof clothing and oxygen apparatus.

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5.4 FURTHER INFORMATION

No data available.

6. <u>ACCIDENTAL RELEASE MEASURES</u>

PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY PROCEDURES:

Wear protective equipment, like:

- · gloves: rubber gloves
- respiration protection: none
- eyes protection: safety glasses
- shoes: normal
- · clothing: normal
- control mechanic device : none

Keep unprotected persons away.

ENVIRONMENTAL PRECAUTIONS:

Rinse with water, and dispose to sewage according to Federal, National and local regulations.

METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING UP:

Should be absorbed by absorbents for disposal. Must conform to EU and National and Local regulations.

7. HANDLING AND STORAGE

7.1 PRECAUTIONS FOR SAFE HANDLING

Keep container cool and tightly closed, take care of sufficient ventilation.

7.2 CONDITIONS FOR SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES

Keep away container from concentrated mineral acids and strong oxidising agents. Cool endangered containers with sprinkling water.

7.3 SPECIFIC END USES

No data available.



SAFETY DATA SHEET



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8. EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 CONTROL PARAMETERS

Not applicable.

8.2 EXPOSURE CONTROLS

Appropriate engineering controls Avoid contact with the skin and the eyes. When using do not eat, drink or smoke; preventive skin protection.

Personal

Protective equipment

Respiratory protection

In insufficiently ventilated areas use a breathing mask with filter type A or a self-contained breathing apparatus.

Eye protection

Use tightly closing protective goggles with lateral protection.

Skin protection

Use protective gloves according to EN 374-2 consisting of butyl rubber, layer thickness 0.5 mm, breakthrough time > 480 min. or fluorocarbon rubber, layer thickness 0.4 mm, breakthrough time > 480 min.

Body Protection

Use protective clothing consisting of rubber or plastics.





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11 TOXICOLOGICAL INFORMATION

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9. PHYSICAL AND CHEMICAL PROPERTIES

MIXTURES

9.1 INFORMATION ON BASIC PHYSICAL AND **CHEMICAL PROPERTIES**

liquid Colour yellowish Odour amine-like

Irritation: The product is irritating to skin and causes serious eye damage.

Melting point/freezing point Not available. 96°C Initial boiling point/boiling range

Corrosivity: The product causes burns.

Acute toxicity: No data available.

рН $(T = 20 \, ^{\circ}C)$ Not available.

Low flammability.

Sensitization: This product causes sensitization by skin contact.

Flammability Ignition temperature Not available. Auto flammability

Not applicable.

Repeated dose toxicity: No data available.

Oxidising properties **Explosive properties**

Aggregate state

Not applicable.

For vapour/air mixtures. Carcinogenicity: No data available.

Explosion limits Lower Not available.

Mutagenicity: No data available.

Not available. Upper Density

 $(T = 20 \, ^{\circ}C)$ 0.955a/ml

Water solubility $(T = 20 \, ^{\circ}C)$

Practically insoluble. Not available.

Toxicity for reproduction: No data available.

Vapour pressure $(T = 20 \, ^{\circ}C)$ Vapour density (air = 1)

Not available. Not available.

Signs and symptoms of exposure: See section 4.2.

Partition coefficient (n-octanol/water) Viscosity $(T = 20 \, ^{\circ}C)$

Not available.

Additional information

Separation of solvent Content of solvents (VOC EU) Not applicable. 30q/l

No data available.

Evaporation rate

Other information:

Not available. No data available 12. ECOLOGICAL INFORMATION

10 STABILITY AND REACTIVITY

12.1 TOXICITY

10.1 REACTIVITY

No data available.

No data available.

12.2 PERSISTENCE AND DEGRADABILITY

No data available.

10.2 CHEMICAL STABILITY

This product is stable.

12.3 BIOACCUMULATIVE POTENTIAL

No data available.

10.3 POSSIBILITY OF HAZARDOUS REACTIONS

Strong oxidising agents and concentrated mineral acids.

12.4 MOBILITY IN SOIL

No data available.

10.4 CONDITIONS TO AVOID

No data available.

12.5 RESULTS OF PBT AND VPVB ASSESSMENT

According to the available statements the criteria are not fulfilled for the classification as a PBT or vPvB.

10.5 INCOMPATIBLE MATERIALS

No data available.

12.6 OTHER ADVERSE EFFECTS

Spilling product harms waters by high consumption of oxygen and general pollution impact.

10.6 HAZARDOUS DECOMPOSITION PRODUCTS

In case of fire only, see section 5.2.





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13. DISPOSAL CONSIDERATIONS

WASTE TREATMENT METHODS:

Dispose used or expended material to local sewage systems according to Federal, National and Local regulations and instructions. If recycling is not possible, wastes must be eliminated according to the provisions of the EU, National and local authorities.

After rinsing with plenty of water, empty containers may be recycled.

- Waste code according to 2000/532/EC (product):
- Waste code according to 2000/532/EC (package):

14. TRANSPORT INFORMATION

ADR:

•	14.1. UN number 3	066
•	14.2. UN proper shipping name	ADR/RID - Paint related material.
•	14.3. Transport hazard	8 class(es)
•	Subsidiary class(es)	-
•	14.4. Packing group	III
•	14.5. Environmental hazards	No
•	Tunnel restriction code	(E)
•	14.6. Special precautions for	Not available.

RID	:	
•	14.1. UN number	3066
•	14.2. UN proper shipping name	ADR/RID - Paint related material.
•	14.3. Transport hazard	8 class(es)
•	Subsidiary class(es)	-
•	14.4. Packing group	II (substances presenting medium danger)
•	14.5. Environmental hazards	No
•	14.6. Special precautions for	Not available.

•	14.1. UN number	3066
•	14.2. UN proper shipping name	ADR/RID - Paint related
		material.
•	14.3. Transport hazard	8 class(es)
•	Subsidiary class(es)	-
•	14.4. Packing group	II (substances presenting medium danger)
•	14.5. Environmental hazards	No
•	14.6. Special precautions for	Not available.

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IATA:

	14.1. UN number	3066
•	14.2. UN proper shipping name	ADR/RID - Paint related material.
•	14.3. Transport hazard	8 class(es)
•	Subsidiary class(es)	-
•	14.4. Packing group	II (substances presenting medium danger)
•	14.5. Environmental hazards	No
	ERG Code	Not available.
	14.6. Special precautions for	Not available.

•	14.0. Special precautions for	Not available.
IMD	ā:	
•	14.1. UN number	3066
•	14.2. UN proper shipping name	ADR/RID - Paint related
mate	erial.	
•	14.3. Transport hazard	8 class(es)
•	Subsidiary class(es)	-
•	14.4. Packing group	II (substances presenting medium danger)
•	Environmental hazards	
•	Marine pollutant	No
•	EmS No.	F-A, S-B
•	14.6. Special precautions for	Not available.
•	14.7. Transport in bulk	Not intended to be transported in bulk according to Annex II MARPOL 73/78 and the IBC Code

ADN; ADR; IATA; IMDG; RID





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15. REGULATORY INFORMATION

SAFETY, HEALTH AND ENVIRONMENTAL REGULATIONS SPECIFIC FOR THE PRODUCT IN OUESTION:

- GHS system for labelling and SDS
- Current regulation in US and Canada:
 - » In USA: OSHA (29 CFR 1910.1200
 - » Canada: WHMIS
- EU regulations
 - » Directive 96/82/EC (Seveso II) on the control of major-accident hazards involving dangerous substances; Not regulated.
 - » Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work; Phosphoric acid mixture (CAS 7664-38-2)
 - » Directive 94/33/EC on the protection of young people at work; Phosphoric acid mixture (CAS 7664-38-2)

CHEMICAL SAFETY ASSESSMENT:

Not available

16. OTHER INFORMATION

LIST OF ABBREVIATIONS:

LIS	LIST OF ABBREVIATIONS:		
•	CAS:	Chemical Abstract Service Registration Number	
•	TWA:	Time Weighted Average	
•	STEL:	Short Term Exposure Limit	
•	LD50:	Lethal Dose, 50%	
•	LC50:	Lethal Concentration, 50%	
•	EC50:	Effect Concentration, 50%	
•	NOEL:	No Observed Effect Level	
•	COD:	Chemical Oxygen Demand	
•	BOD:	Biochemical Oxygen Demand	
•	TOC:	Total Organic Carbon	
•	CEN:	European Committee for Standardisation	
•	EC-No:	European Commission Number	
•	CLP:	Regulation on classification, labelling and	
		packaging of substances and mixtures	
•	DSD:	Dangerous Substances Directive	
•	ADR: E	uropean Agreement concerning the	
		International Carriage of Dangerous Goods by	
		Road	

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ADN:	European Agreement concerning th	ie

International Carriage of Dangerous Goods by

Inland

LGK: Storage class

H302:

BG Chemie: Employer's liability insurance association of the

German chemical industry

IATA: International Air Transport Association

IMDG: International Maritime Dangerous Goods Code
RID: International Rule for Transport of Dangerous

Substances by Railway

GHS: Global Harmonised System

HCS: harmonized classification scheme

THE TEXT OF THE HAZARD STATEMENT CODES OF SECTION 3

Harmful if swallowed.

H314:	Causes severe skin burns and eye damage.
H317:	May cause an allergic skin reaction.
H319:	Serious eye damage/eye irritation; Causes
	serious eye irritation.
H332:	Acute toxicity, inhalation; Harmful if inhaled.
H412:	Hazardous to the aquatic environment –
	Chronic Hazard; Harmful to aquatic life with
	long lasting effects.
R20/22:	Harmful by inhalation and if swallowed.
R21/22:	Harmful in contact with skin and if swallowed.
R22:	Harmful if swallowed.
R34:	Causes burns.
R43:	May cause sensitisation by skin contact. R52
	Harmful to aquatic organisms.
R53:	May cause long-term adverse effects in the
	aquatic environment.

This safety data sheet is developed on basis of the valid EU regulations and German regulations. It shows the present state of the knowledge and is no contractual warranty of quality properties of the product. These statements may not be changed or transferred to other products. Duplication in unchanged state is permitted.

