

## Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

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

#### 1.1 Product identifier

### 3-IN-ONE® Anti-Seize Copper Grease

#### 1.2 Relevant identified uses of the substance or mixture and uses advised against

##### Relevant identified uses of the substance or mixture:

Lubricant

##### Uses advised against:

No information available at present.

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

(GB)

WD-40 Company Limited  
PO Box 440  
GB-Kiln Farm, Milton Keynes, MK11 3LF

Tel.: +44 (0) 1908 555400  
Fax: +44 (0) 1908 266900  
E-Mail: [Compliance@wd40.co.uk](mailto:Compliance@wd40.co.uk)  
Homepage: [www.wd40.co.uk](http://www.wd40.co.uk)

WD-40 Company Limited  
Noorderpoort 93E  
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Tel.: +31 85 487 46 91

(IRL)

Euro Car Parts Team P. R. Reilly  
Unit K Furry Park Industrial Est.  
Swords Road  
Turnapin Little  
Dublin 9  
D09 TC1

Email: [custservice.ie@eurocarparts.com](mailto:custservice.ie@eurocarparts.com)  
Phone: 1800 818 440

Qualified person's e-mail address: [info@chemical-check.de](mailto:info@chemical-check.de), [k.schnurbusch@chemical-check.de](mailto:k.schnurbusch@chemical-check.de) Please DO NOT use for requesting Safety Data Sheets.

#### 1.4 Emergency telephone number

##### Emergency information services / official advisory body:

(IRL)

National Poisons Information Centre, Beaumont Hospital, Dublin 9, Ireland, Tel.:  
+353 (0)1 809 2166 (Public Poisons Info Line, 8am-10pm, 7 days a week)  
+353 (0)1 809 2566 (Info for Healthcare Professionals ONLY, 24 h, 7 days a week)

##### Telephone number of the company in case of emergencies:

(GB)

+44 20 3807 3798

(IRL)

+353 1 901 4670

## SECTION 2: Hazards identification

### 2.1 Classification of the substance or mixture

#### Classification according to Regulation (EC) 1272/2008 (CLP)

Hazard class	Hazard category	Hazard statement
Skin Irrit.	2	H315-Causes skin irritation.
Asp. Tox.	1	H304-May be fatal if swallowed and enters airways.
Aquatic Acute	1	H400-Very toxic to aquatic life.
Aerosol	1	H222-Extremely flammable aerosol.
Aquatic Chronic	1	H410-Very toxic to aquatic life with long lasting effects.
Aerosol	1	H229-Pressurised container: May burst if heated.

### 2.2 Label elements

#### Labeling according to Regulation (EC) 1272/2008 (CLP)



Danger

H315-Causes skin irritation. H222-Extremely flammable aerosol. H410-Very toxic to aquatic life with long lasting effects. H229-Pressurised container: May burst if heated.

P101-If medical advice is needed, have product container or label at hand. P102-Keep out of reach of children.  
 P210-Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. P211-Do not spray on an open flame or other ignition source. P251-Do not pierce or burn, even after use. P273-Avoid release to the environment. P280-Wear protective gloves.  
 P332+P313-If skin irritation occurs: Get medical advice / attention.  
 P410+P412-Protect from sunlight. Do not expose to temperatures exceeding 50 °C.  
 P501-Dispose of contents / container to an approved waste disposal facility.

Without adequate ventilation, formation of explosive mixtures may be possible.

Hydrocarbons, C6, isoalkanes, <5% n-hexane  
 Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics

### 2.3 Other hazards

The mixture does not contain any vPvB substance (vPvB = very persistent, very bioaccumulative) or is not included under XIII of the regulation (EC) 1907/2006 (< 0,1 %).

The mixture does not contain any PBT substance (PBT = persistent, bioaccumulative, toxic) or is not included under XIII of the regulation (EC) 1907/2006 (< 0,1 %).

The mixture does not contain any substance with endocrine disrupting properties (< 0,1 %).

## SECTION 3: Composition/information on ingredients

Aerosol

### 3.1 Substances

n.a.

### 3.2 Mixtures

Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane	
Registration number (REACH)	01-2119475514-35-XXXX
Index	---
EINECS, ELINCS, NLP, REACH-IT List-No.	921-024-6

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 Revision date / version: 01.11.2021 / 0009  
 Replacing version dated / version: 20.10.2021 / 0008  
 Valid from: 01.11.2021  
 PDF print date: 01.11.2021  
 3-IN-ONE® Anti-Seize Copper Grease

<b>CAS</b>	---
<b>content %</b>	10-<20
<b>Classification according to Regulation (EC) 1272/2008 (CLP), M-factors</b>	Flam. Liq. 2, H225 Skin Irrit. 2, H315 STOT SE 3, H336 Asp. Tox. 1, H304 Aquatic Chronic 2, H411

<b>Hydrocarbons, C6, isoalkanes, &lt;5% n-hexane</b>	
<b>Registration number (REACH)</b>	01-2119484651-34-XXXX
<b>Index</b>	---
<b>EINECS, ELINCS, NLP, REACH-IT List-No.</b>	931-254-9
<b>CAS</b>	(64742-49-0)
<b>content %</b>	5-10
<b>Classification according to Regulation (EC) 1272/2008 (CLP), M-factors</b>	Flam. Liq. 2, H225 Skin Irrit. 2, H315 STOT SE 3, H336 Asp. Tox. 1, H304 Aquatic Chronic 2, H411

<b>Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics</b>	
<b>Registration number (REACH)</b>	01-2119475515-33-XXXX
<b>Index</b>	---
<b>EINECS, ELINCS, NLP, REACH-IT List-No.</b>	927-510-4
<b>CAS</b>	---
<b>content %</b>	5-10
<b>Classification according to Regulation (EC) 1272/2008 (CLP), M-factors</b>	Flam. Liq. 2, H225 Skin Irrit. 2, H315 STOT SE 3, H336 Asp. Tox. 1, H304 Aquatic Chronic 2, H411

<b>Copper flakes (coated with aliphatic acid)</b>	
<b>Registration number (REACH)</b>	01-2119480154-42-XXXX
<b>Index</b>	029-019-01-X
<b>EINECS, ELINCS, NLP, REACH-IT List-No.</b>	(231-159-6)
<b>CAS</b>	(7440-50-8)
<b>content %</b>	2-<5
<b>Classification according to Regulation (EC) 1272/2008 (CLP), M-factors</b>	Acute Tox. 3, H331 Acute Tox. 4, H302 Eye Irrit. 2, H319 Aquatic Acute 1, H400 (M=10) Aquatic Chronic 1, H410 (M=10)
<b>Specific Concentration Limits and ATE</b>	ATE (oral): 500 mg/kg ATE (as inhalation, Dusts or mist): 0,733 mg/l/4h

For the text of the H-phrases and classification codes (GHS/CLP), see Section 16.

The substances named in this section are given with their actual, appropriate classification!

For substances that are listed in appendix VI, table 3.1 of the regulation (EC) no. 1272/2008 (CLP regulation) this means that all notes that may be given here for the named classification have been taken into account.

## SECTION 4: First aid measures

### 4.1 Description of first aid measures

First-aiders should ensure they are protected!

Never pour anything into the mouth of an unconscious person!

#### Inhalation

Remove person from danger area.

Supply person with fresh air and consult doctor according to symptoms.

If the person is unconscious, place in a stable side position and consult a doctor.

#### Skin contact

Remove polluted, soaked clothing immediately, wash thoroughly with plenty of water and soap, in case of irritation of the skin (flare), consult a doctor.

#### Eye contact

Remove contact lenses.

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3-IN-ONE® Anti-Seize Copper Grease

Wash thoroughly for several minutes using copious water. Seek medical help if necessary.

### **Ingestion**

Typically no exposure pathway.

Rinse the mouth thoroughly with water.

Do not induce vomiting - give copious water to drink. Consult doctor immediately.

Danger of aspiration.

In case of vomiting, keep head low so that the stomach content does not reach the lungs.

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

If applicable delayed symptoms and effects can be found in section 11 and the absorption route in section 4.1.

The following may occur:

Irritation of the eyes

Irritation of the respiratory tract

Coughing

Headaches

Dizziness

Effects/damages the central nervous system

Unconsciousness

With long-term contact:

Drying of the skin.

Dermatitis (skin inflammation)

Ingestion:

Nausea

Vomiting

Danger of aspiration.

Oedema of the lungs

chemical pneumonitis (condition similar to pneumonia)

Other dangerous properties cannot be ruled out.

In certain cases, the symptoms of poisoning may only appear after an extended period / after several hours.

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

Gastric lavage (stomach washing) only under endotracheal intubation.

Subsequent observation for pneumonia and pulmonary oedema.

Pulmonary oedema prophylaxis

## **SECTION 5: Firefighting measures**

### **5.1 Extinguishing media**

#### **Suitable extinguishing media**

CO<sub>2</sub>

Extinction powder

Water jet spray

Alcohol resistant foam

#### **Unsuitable extinguishing media**

High volume water jet

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

In case of fire the following can develop:

Oxides of carbon

Toxic gases

Danger of bursting (explosion) when heated

Explosive vapour/air or gas/air mixtures.

### **5.3 Advice for firefighters**

For personal protective equipment see Section 8.

In case of fire and/or explosion do not breathe fumes.

Protective respirator with independent air supply.

According to size of fire

Full protection, if necessary.

Cool container at risk with water.

Dispose of contaminated extinction water according to official regulations.

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

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

#### **6.1.1 For non-emergency personnel**

In case of spillage or accidental release, wear personal protective equipment as specified in section 8 to prevent contamination.

Ensure sufficient ventilation, remove sources of ignition.

Avoid dust formation with solid or powder products.  
 Leave the danger zone if possible, use existing emergency plans if necessary.  
 Remove possible causes of ignition - do not smoke.  
 Ensure sufficient supply of air.  
 Avoid inhalation, and contact with eyes or skin.  
 If applicable, caution - risk of slipping.

### 6.1.2 For emergency responders

See section 8 for suitable protective equipment and material specifications.

### 6.2 Environmental precautions

Prevent penetration into drains, cellars, working pits or other places in which accumulation could be hazardous.  
 Prevent surface and ground-water infiltration, as well as ground penetration.  
 If accidental entry into drainage system occurs, inform responsible authorities.

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

If spray or gas escapes, ensure ample fresh air is available.  
 Without adequate ventilation, formation of explosive mixtures may be possible.

Active substance:

Soak up with absorbent material (e.g. universal binding agent, sand, diatomaceous earth) and dispose of according to Section 13.

### 6.4 Reference to other sections

For personal protective equipment see Section 8 and for disposal instructions see Section 13.

## SECTION 7: Handling and storage

In addition to information given in this section, relevant information can also be found in section 8 and 6.1.

### 7.1 Precautions for safe handling

#### 7.1.1 General recommendations

Ensure good ventilation.  
 Avoid inhalation of the vapours.  
 Avoid contact with eyes or skin.  
 Keep away from sources of ignition - Do not smoke.  
 Take measures against electrostatic charging, if appropriate.  
 Do not use on hot surfaces.  
 Eating, drinking, smoking, as well as food-storage, is prohibited in work-room.  
 Observe directions on label and instructions for use.  
 Use working methods according to operating instructions.

#### 7.1.2 Notes on general hygiene measures at the workplace

General hygiene measures for the handling of chemicals are applicable.  
 Wash hands before breaks and at end of work.  
 Keep away from food, drink and animal feedingstuffs.  
 Remove contaminated clothing and protective equipment before entering areas in which food is consumed.

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

Keep out of access to unauthorised individuals.  
 Not to be stored in gangways or stair wells.  
 Store product closed and only in original packing.  
 Do not store with flammable or self-igniting materials.  
 Observe special regulations for aerosols!  
 Observe special storage conditions.  
 Observe special storage conditions.  
 Keep protected from direct sunlight and temperatures over 50°C.  
 Store in a well ventilated place.  
 Store cool.

### 7.3 Specific end use(s)

No information available at present.

## SECTION 8: Exposure controls/personal protection

### 8.1 Control parameters

Workplace exposure limit (WEL) of the total hydrocarbon solvent content of the mixture (RCP method according to EH40):  
 1000 mg/m<sup>3</sup>

Chemical Name	Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane	Content %:10- <20
WEL-TWA: 1400 mg/m <sup>3</sup>	WEL-STEL: ---	---

Monitoring procedures:	- Compur - KITA-187 S (551 174)	Other information: (OEL acc. to RCP-method, paragraphs 84-87, EH40)
BMGV: ---		

Chemical Name	Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane	Content %:10- <20
OELV-8h: 100 ppm (573 mg/m3) ("Stoddard solvent", [White spirit])	OELV-15min: ---	---
Monitoring procedures:	- Compur - KITA-187 S (551 174)	
BLV: ---		Other information: ---

Chemical Name	Hydrocarbons, C6, isoalkanes, <5% n-hexane	Content %:5-10
WEL-TWA: 800 mg/m3	WEL-STEL: ---	---
Monitoring procedures:	- Draeger - Hydrocarbons 0,1%/c (81 03 571) - Draeger - Hydrocarbons 2/a (81 03 581) - Compur - KITA-187 S (551 174)	
BMGV: ---		Other information: (OEL acc. to RCP-method, paragraphs 84-87, EH40)

Chemical Name	Hydrocarbons, C6, isoalkanes, <5% n-hexane	Content %:5-10
OELV-8h: 100 ppm (573 mg/m3) ("Stoddard solvent", [White spirit])	OELV-15min: ---	---
Monitoring procedures:	- Draeger - Hydrocarbons 0,1%/c (81 03 571) - Draeger - Hydrocarbons 2/a (81 03 581) - Compur - KITA-187 S (551 174)	
BLV: ---		Other information: ---

Chemical Name	Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics	Content %:5-10
WEL-TWA: 800 mg/m3	WEL-STEL: ---	---
Monitoring procedures:	- Draeger - Hydrocarbons 0,1%/c (81 03 571) - Draeger - Hydrocarbons 2/a (81 03 581) - Compur - KITA-187 S (551 174)	
BMGV: ---		Other information: (OEL acc. to RCP-method, paragraphs 84-87, EH40)

Chemical Name	Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics	Content %:5-10
OELV-8h: 100 ppm (573 mg/m3) ("Stoddard solvent", [White spirit])	OELV-15min: ---	---
Monitoring procedures:	- Draeger - Hydrocarbons 0,1%/c (81 03 571) - Draeger - Hydrocarbons 2/a (81 03 581) - Compur - KITA-187 S (551 174)	
BLV: ---		Other information: ---

Chemical Name	Copper flakes (coated with aliphatic acid)	Content %:2- <5
WEL-TWA: 1 mg/m3 (dusts and mists, as Cu)	WEL-STEL: 2 mg/m3 (dusts and mists, as Cu)	---
Monitoring procedures:	ISO 15202 (Workplace air - Determination of metals and metalloids in airborne particulate matter by Inductively Coupled Plasma Atomic Emission Spectrometry), Part 1-3 - 2012(Part 1), 2012(Part 2), 2004 (Part 3) - EU project BC/CEN/ENTR/000/2002-16 card 84-1 (2004) - MDHS 91/2 (Metals and metalloids in workplace air by X-ray fluorescence spectrometry) - 2015 - EU project BC/CEN/ENTR/000/2002-16 card 84-2 (2004) - NIOSH 7029 (Copper (dust and fume)) - 1994 - NIOSH 7300 (ELEMENTS by ICP (Nitric/Perchloric Acid Ashing)) - 2003 - NIOSH 7301 (Elements by ICP (aqua regia ashing)) - 2003 - NIOSH 7303 (Elements by ICP (Hot block HCl/HNO3 digestion)) - 2003 - OSHA ID-121 (Metal and metalloid particulates in workplace atmospheres (Atomic absorption)) - 2002 - EU project BC/CEN/ENTR/000/2002-16 card 84-10 (2004) - OSHA ID-125G (Metal and metalloid particulates in workplace atmospheres (ICP)) - 2002 - OSHA ID-206 (ICP analysis of metal/metalloid particulates from solder operations) - 1991	
BMGV: ---		Other information: ---

Chemical Name	Copper flakes (coated with aliphatic acid)	Content %:2- <5
OELV-8h: 1 mg/m3 (dust + mists)	OELV-15min: 2 mg/m3 (dust + mists)	---
Monitoring procedures:	ISO 15202 (Workplace air - Determination of metals and metalloids in airborne particulate matter by Inductively Coupled Plasma Atomic Emission Spectrometry), Part 1-3 - 2012(Part 1), 2012(Part 2), 2004 (Part 3) - EU project BC/CEN/ENTR/000/2002-16 card 84-1 (2004)	

- MDHS 91/2 (Metals and metalloids in workplace air by X-ray fluorescence spectrometry) - 2015 - EU project BC/CEN/ENTR/000/2002-16 card 84-2 (2004)
- NIOSH 7029 (Copper (dust and fume)) - 1994
- NIOSH 7300 (ELEMENTS by ICP (Nitric/Perchloric Acid Ashing)) - 2003
- NIOSH 7301 (Elements by ICP (aqua regia ashing)) - 2003
- NIOSH 7303 (Elements by ICP (Hot block HCl/HNO3 digestion)) - 2003
- OSHA ID-121 (Metal and metalloid particulates in workplace atmospheres (Atomic absorption)) - 2002 - EU project BC/CEN/ENTR/000/2002-16 card 84-10 (2004)
- OSHA ID-125G (Metal and metalloid particulates in workplace atmospheres (ICP)) - 2002
- OSHA ID-206 (ICP analysis of metal/metalloid particulates from solder operations) - 1991

BLV: --- Other information: ---

Chemical Name	Talc	Content %:
WEL-TWA: 1 mg/m3 (res. dust)	WEL-STEL: ---	---
Monitoring procedures: ---		
BMGV: ---	Other information: ---	

Chemical Name	Talc	Content %:
OELV-8h: 0,8 mg/m3 (respirable dust), 10 mg/m3 (total inhalable dust)	OELV-15min: ---	---
Monitoring procedures: ---		
BLV: ---	Other information: ---	

Chemical Name	Petroleum gases, liquefied	Content %:
WEL-TWA: 1000 ppm (1750 mg/m3) (Liquefied petroleum gas (LPG))	WEL-STEL: 1250 ppm (2180 mg/m3) (Liquefied petroleum gas (LPG))	---
Monitoring procedures: ---		
BMGV: ---	Other information: ---	

Chemical Name	Petroleum gases, liquefied	Content %:
OELV-8h: ---	OELV-15min: 1000 ppm (Butane)	---
Monitoring procedures: ---		
BLV: ---	Other information: ---	

Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane						
Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Consumer	Human - oral	Long term, systemic effects	DNEL	699	mg/kg bw/day	
Consumer	Human - dermal	Long term, systemic effects	DNEL	699	mg/kg bw/day	
Consumer	Human - inhalation	Long term, systemic effects	DNEL	608	mg/m3	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	773	mg/kg bw/day	
Workers / employees	Human - inhalation	Short term, systemic effects	DNEL	2035	mg/m3	

Hydrocarbons, C6, isoalkanes, <5% n-hexane						
Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Consumer	Human - oral	Long term, systemic effects	DNEL	1301	mg/kg bw/day	
Consumer	Human - dermal	Long term, systemic effects	DNEL	1377	mg/kg bw/day	
Consumer	Human - inhalation	Long term, systemic effects	DNEL	1131	mg/m3	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	13964	mg/kg bw/day	
Workers / employees	Human - inhalation	Long term, systemic effects	DNEL	5306	mg/m3	

Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics						
Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Consumer	Human - oral	Long term, systemic effects	DNEL	149	mg/kg bw/day	
Consumer	Human - dermal	Long term, systemic effects	DNEL	149	mg/kg bw/day	
Consumer	Human - inhalation	Long term, systemic effects	DNEL	447	mg/m3	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	300	mg/kg bw/day	
Workers / employees	Human - inhalation	Long term, systemic effects	DNEL	2085	mg/m3	

Copper flakes (coated with aliphatic acid)						
Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
	Environment - freshwater		PNEC	7,8	µg/l	
	Environment - marine		PNEC	5,2	µg/l	
	Environment - sewage treatment plant		PNEC	230	µg/l	
	Environment - sediment, freshwater		PNEC	87	mg/kg dw	
	Environment - sediment, marine		PNEC	676	mg/kg dw	
	Environment - soil		PNEC	65	mg/kg dw	
Workers / employees	Human - inhalation	Short term, systemic effects	DNEL	18,2	mg/m3	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	137	mg/kg bw/day	
Workers / employees	Human - dermal	Short term, systemic effects	DNEL	273	mg/kg bw/day	

Distillates (petroleum), hydrotreated heavy paraffinic						
Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
	Environment - oral (animal feed)		PNEC	9,33	mg/kg feed	

Ⓒ WEL-TWA = Workplace Exposure Limit - Long-term exposure limit (8-hour TWA (= time weighted average) reference period) EH40. AGW = "Arbeitsplatzgrenzwert" (workplace limit value, Germany).  
 (8) = Inhalable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (9) = Respirable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (11) = Inhalable fraction (Directive 2004/37/CE). (12) = Inhalable fraction. Respirable fraction in those Member States that implement, on the date of the entry into force of this Directive, a biomonitoring system with a biological limit value not exceeding 0,002 mg Cd/g creatinine in urine (Directive 2004/37/CE). | WEL-STEL = Workplace Exposure Limit - Short-term exposure limit (15-minute reference period).  
 (8) = Inhalable fraction (2017/164/EU, 2017/2398/EU). (9) = Respirable fraction (2017/164/EU, 2017/2398/EU). (10) = Short-term exposure limit value in relation to a reference period of 1 minute (2017/164/EU). | BMGV = Biological monitoring guidance value EH40. BGW = "Biologischer Grenzwert" (biological limit value, Germany) | Other information: Sen = Capable of causing occupational asthma. Sk = Can be absorbed through skin. Carc = Capable of causing cancer and/or heritable genetic damage.  
 \*\* = The exposure limit for this substance is repealed through the TRGS 900 (Germany) of January 2006 with the goal of revision.  
 (13) = The substance can cause sensitisation of the skin and of the respiratory tract (Directive 2004/37/CE), (14) = The substance can cause sensitisation of the skin (Directive 2004/37/CE).

Ⓓ OELV-8h = Occupational Exposure Limit Value (8-hour reference period). (IFV) = Inhalable Fraction and Vapour. (I) = Inhalable Fraction. (R) = Respirable Fraction.  
 (8) = Inhalable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (9) = Respirable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (11) = Inhalable fraction (Directive 2004/37/CE). (12) = Inhalable fraction. Respirable fraction in those Member States that implement, on the date of the entry into force of this Directive, a biomonitoring system with a biological limit value not exceeding 0,002 mg Cd/g creatinine in urine (Directive 2004/37/CE). | OELV-15min = Occupational Exposure Limit Value (15-minute reference period). (IFV) = Inhalable Fraction and Vapour. (I) =



Inhalable Fraction. (R) = Respirable Fraction.

(8) = Inhalable fraction (2017/164/EU, 2017/2398/EU). (9) = Respirable fraction (2017/164/EU, 2017/2398/EU). (10) = Short-term exposure limit value in relation to a reference period of 1 minute (2017/164/EU). |

BLV = Biological limit value |

Other information: Carc1A, Carc1B = carcinogenic substance, Cat. 1A or 1B. Muta1A, Muta1B = mutagenic substance, Cat. 1A or 1B. Repr1A, Repr1B = Substances known to be toxic for reproduction, Cat. 1A or 1B. Sk = can be absorbed through skin. Asphx = asphyxiant. Sen = Respiratory sensitizer. BOELV = Binding Occupational Exposure Limit Values. IOELV = Indicative Occupational Exposure Limit Values.

(13) = The substance can cause sensitisation of the skin and of the respiratory tract (Directive 2004/37/CE), (14) = The substance can cause sensitisation of the skin (Directive 2004/37/CE).

## 8.2 Exposure controls

### 8.2.1 Appropriate engineering controls

Ensure good ventilation. This can be achieved by local suction or general air extraction.

If this is insufficient to maintain the concentration under the WEL or AGW values, suitable breathing protection should be worn.

Applies only if maximum permissible exposure values are listed here.

Suitable assessment methods for reviewing the effectiveness of protection measures adopted include metrological and non-metrological investigative techniques.

These are specified by e.g. EN 14042.

EN 14042 "Workplace atmospheres. Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents".

### 8.2.2 Individual protection measures, such as personal protective equipment

General hygiene measures for the handling of chemicals are applicable.

Wash hands before breaks and at end of work.

Keep away from food, drink and animal feedingstuffs.

Remove contaminated clothing and protective equipment before entering areas in which food is consumed.

Eye/face protection:

With danger of contact with eyes.

Tight fitting protective goggles with side protection (EN 166).

Skin protection - Hand protection:

Normally not necessary.

with long-term contact:

If applicable

Protective nitrile gloves (EN ISO 374).

Protective gloves made of polyvinyl alcohol (EN ISO 374).

Protective Viton® / fluoroelastomer gloves (EN ISO 374).

Minimum layer thickness in mm:

>= 0,4

Permeation time (penetration time) in minutes:

>= 480

The breakthrough times determined in accordance with EN 16523-1 were not obtained under practical conditions.

The recommended maximum wearing time is 50% of breakthrough time.

Protective hand cream recommended.

Skin protection - Other:

Protective working garments (e.g. safety shoes EN ISO 20345, long-sleeved protective working garments).

Respiratory protection:

Normally not necessary.

If OES or MEL is exceeded.

Filter A2 P2 (EN 14387), code colour brown, white

At high concentrations:

Respiratory protection appliance (insulation device) (e.g. EN 137 or EN 138)

Observe wearing time limitations for respiratory protection equipment.

Thermal hazards:

Not applicable

Additional information on hand protection - No tests have been performed.

In the case of mixtures, the selection has been made according to the knowledge available and the information about the contents.

Selection of materials derived from glove manufacturer's indications.

Final selection of glove material must be made taking the breakthrough times, permeation rates and degradation into account.

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Selection of a suitable glove depends not only on the material but also on other quality characteristics and varies from manufacturer to manufacturer.

In the case of mixtures, the resistance of glove materials cannot be predicted and must therefore be tested before use.

The exact breakthrough time of the glove material can be requested from the protective glove manufacturer and must be observed.

### 8.2.3 Environmental exposure controls

No information available at present.

## SECTION 9: Physical and chemical properties

### 9.1 Information on basic physical and chemical properties

Physical state:	Aerosol. Active substance: liquid.
Colour:	Copper
Odour:	Characteristic
Melting point/freezing point:	There is no information available on this parameter.
Boiling point or initial boiling point and boiling range:	n.a.
Flammability:	Does not apply to aerosols.
Lower explosion limit:	0,8 Vol-%
Upper explosion limit:	9,0 Vol-%
Flash point:	Does not apply to aerosols.
Auto-ignition temperature:	Does not apply to aerosols.
Decomposition temperature:	There is no information available on this parameter.
pH:	Mixture is non-soluble (in water).
Kinematic viscosity:	Does not apply to aerosols.
Solubility:	Insoluble
Partition coefficient n-octanol/water (log value):	Does not apply to mixtures.
Vapour pressure:	There is no information available on this parameter.
Density and/or relative density:	Does not apply to aerosols.
Relative vapour density:	Does not apply to aerosols.
Particle characteristics:	Does not apply to aerosols.

### 9.2 Other information

Explosives:	There is no information available on this parameter.
Oxidising liquids:	No

## SECTION 10: Stability and reactivity

### 10.1 Reactivity

The product has not been tested.

### 10.2 Chemical stability

Stable with proper storage and handling.

### 10.3 Possibility of hazardous reactions

No dangerous reactions are known.

### 10.4 Conditions to avoid

Heating, open flame, ignition sources

Pressure increase will result in danger of bursting.

### 10.5 Incompatible materials

Avoid contact with strong oxidizing agents.

### 10.6 Hazardous decomposition products

No decomposition when used as directed.

## SECTION 11: Toxicological information

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

Possibly more information on health effects, see Section 2.1 (classification).

3-IN-ONE® Anti-Seize Copper Grease						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	ATE	>2000	mg/kg			calculated value
Acute toxicity, by dermal route:						n.d.a.
Acute toxicity, by inhalation:						n.d.a.
Skin corrosion/irritation:						n.d.a.
Serious eye damage/irritation:						n.d.a.

Respiratory or skin sensitisation:						n.d.a.
Germ cell mutagenicity:						n.d.a.
Carcinogenicity:						n.d.a.
Reproductive toxicity:						n.d.a.
Specific target organ toxicity - single exposure (STOT-SE):						n.d.a.
Specific target organ toxicity - repeated exposure (STOT-RE):						n.d.a.
Aspiration hazard:						n.d.a.
Symptoms:						n.d.a.

**Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane**

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>5840	mg/kg	Rat	OECD 401 (Acute Oral Toxicity)	Analogous conclusion
Acute toxicity, by dermal route:	LD50	>2920	mg/kg	Rabbit	OECD 402 (Acute Dermal Toxicity)	Analogous conclusion
Acute toxicity, by inhalation:	LC50	>25,2	mg/l/4h	Rat	OECD 403 (Acute Inhalation Toxicity)	Vapours
Skin corrosion/irritation:						Irritant
Serious eye damage/irritation:						Not irritant
Respiratory or skin sensitisation:				Guinea pig	OECD 406 (Skin Sensitisation)	No (skin contact)
Respiratory or skin sensitisation:						No (inhalation and skin contact)
Germ cell mutagenicity:						Negative
Aspiration hazard:						Asp. Tox. 1
Symptoms:						drowsiness, unconsciousness, heart/circulatory disorders, headaches, cramps, drowsiness, mucous membrane irritation, dizziness, nausea and vomiting.

**Hydrocarbons, C6, isoalkanes, <5% n-hexane**

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>16750	mg/kg	Rat	OECD 401 (Acute Oral Toxicity)	
Acute toxicity, by dermal route:	LD50	>3350	mg/kg	Rabbit	OECD 402 (Acute Dermal Toxicity)	
Acute toxicity, by inhalation:	LC50	259354	mg/m3	Rat	OECD 403 (Acute Inhalation Toxicity)	Vapours
Skin corrosion/irritation:						Skin Irrit. 2
Respiratory or skin sensitisation:				Mouse	OECD 429 (Skin Sensitisation - Local Lymph Node Assay)	No (skin contact)
Aspiration hazard:						Asp. Tox. 1

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Symptoms:						drowsiness, unconsciousness, heart/circulatory disorders, headaches, cramps, drowsiness, mucous membrane irritation, dizziness, nausea and vomiting.
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Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>2000	mg/kg	Rat		
Acute toxicity, by oral route:	LD50	>8	ml/kg	Rat	OECD 401 (Acute Oral Toxicity)	
Acute toxicity, by dermal route:	LD50	>2000	mg/kg	Rat		
Acute toxicity, by dermal route:	LD50	> 2920	mg/kg	Rabbit	OECD 402 (Acute Dermal Toxicity)	
Acute toxicity, by inhalation:	LC50	>23,3	mg/l/4h	Rat	OECD 403 (Acute Inhalation Toxicity)	
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute Dermal Irritation/Corrosion)	Irritant
Aspiration hazard:						Yes
Symptoms:						diarrhoea, headaches, dizziness, nausea and vomiting.

Copper flakes (coated with aliphatic acid)						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	ATE	500	mg/kg			
Acute toxicity, by inhalation:	ATE	0,733	mg/l/4h			Dusts or mist

Talc						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>5000	mg/kg	Rat		
Acute toxicity, by dermal route:	LD50	>2000	mg/kg	Rat		
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute Dermal Irritation/Corrosion)	Not irritant
Skin corrosion/irritation:						Not irritant
Respiratory or skin sensitisation:						Not sensitizing
Germ cell mutagenicity:					OECD 471 (Bacterial Reverse Mutation Test)	Negative
Carcinogenicity:						Negative
Reproductive toxicity:				Rat		Negative
Symptoms:						mucous membrane irritation

Petroleum gases, liquefied						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by inhalation:	LC50	>5	mg/l			
Skin corrosion/irritation:						Not irritant
Serious eye damage/irritation:						Not irritant

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Respiratory or skin sensitisation:						No (skin contact)
Aspiration hazard:						No

**11.2. Information on other hazards**

3-IN-ONE® Anti-Seize Copper Grease						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Endocrine disrupting properties:						Does not apply to mixtures.
Other information:						No other relevant information available on adverse effects on health.

**SECTION 12: Ecological information**

Possibly more information on environmental effects, see Section 2.1 (classification).

3-IN-ONE® Anti-Seize Copper Grease							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:							n.d.a.
12.1. Toxicity to daphnia:							n.d.a.
12.1. Toxicity to algae:							n.d.a.
12.2. Persistence and degradability:							Isolate as much as possible with an oil separator. n.d.a.
12.3. Bioaccumulative potential:							n.d.a.
12.4. Mobility in soil:							n.d.a.
12.5. Results of PBT and vPvB assessment							n.d.a.
12.6. Endocrine disrupting properties:							Does not apply to mixtures.
12.7. Other adverse effects:							No information available on other adverse effects on the environment.
Other information:							According to the recipe, contains no AOX.

Hydrocarbons, C6-C7, n-alkanes, isoalkanes, cyclics, <5% n-hexane							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	LL50	96h	11,4	mg/l	Oncorhynchus mykiss	OECD 203 (Fish, Acute Toxicity Test)	Analogous conclusion
12.1. Toxicity to daphnia:	EL50	48h	3	mg/l	Daphnia magna	OECD 202 (Daphnia sp. Acute Immobilisation Test)	Analogous conclusion
12.1. Toxicity to algae:	EL50	72h	30-100	mg/l	Pseudokirchnerie lla subcapitata	OECD 201 (Alga, Growth Inhibition Test)	Analogous conclusion
12.2. Persistence and degradability:		28d	98	%		OECD 301 F (Ready Biodegradability - Manometric Respirometry Test)	Analogous conclusion

12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance
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<b>Hydrocarbons, C6, isoalkanes, &lt;5% n-hexane</b>							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	NOEC/NOEL	28d	4,09	mg/l	Oncorhynchus mykiss	QSAR	
12.1. Toxicity to fish:	EC50	96h	18,27	mg/l	Oncorhynchus mykiss		
12.1. Toxicity to daphnia:	NOEC/NOEL	21d	7,14	mg/l	Daphnia magna	QSAR	
12.1. Toxicity to daphnia:	LC50	48h	3,87	mg/l	Daphnia magna		Analogous conclusion
12.1. Toxicity to algae:	EC50	72h	13,56	mg/l	Pseudokirchnerie lla subcapitata	QSAR	
12.1. Toxicity to algae:	ErL50	72h	55	mg/l	Pseudokirchnerie lla subcapitata	OECD 201 (Alga, Growth Inhibition Test)	Analogous conclusion
12.2. Persistence and degradability:		28d	98	%		OECD 301 F (Ready Biodegradability - Manometric Respirometry Test)	Readily biodegradable (Analogous conclusion), Analogous conclusion
12.3. Bioaccumulative potential:	Log Kow		4				
12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance

<b>Hydrocarbons, C7, n-alkanes, isoalkanes, cyclics</b>							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance
12.1. Toxicity to fish:	LC50	96h	>13,4	mg/l	Oncorhynchus mykiss	OECD 203 (Fish, Acute Toxicity Test)	
12.1. Toxicity to daphnia:	EL50	24h	12	mg/l	Daphnia magna	OECD 202 (Daphnia sp. Acute Immobilisation Test)	
12.1. Toxicity to daphnia:	LC50	48h	3	mg/l	Daphnia magna	OECD 202 (Daphnia sp. Acute Immobilisation Test)	
12.1. Toxicity to algae:	EL50	72h	12	mg/l	Pseudokirchnerie lla subcapitata	OECD 201 (Alga, Growth Inhibition Test)	Analogous conclusion

<b>Copper flakes (coated with aliphatic acid)</b>							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	LC50		0,0068-0,0156	mg/l	Pimephales promelas		
12.1. Toxicity to daphnia:	NOEC/NOEL	24h	0,004	mg/l	Daphnia magna		
12.1. Toxicity to daphnia:	EC50	48h	0,03	mg/l	Daphnia magna		
12.1. Toxicity to algae:	EC50	72h	0,0426-0,0535	mg/l	Pseudokirchnerie lla subcapitata		

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Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
Water solubility:			<0,1	%			
12.2. Persistence and degradability:							Not relevant for inorganic substances.
12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance

Petroleum gases, liquefied							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	LC50	96h	147,54	mg/l		QSAR	
12.3. Bioaccumulative potential:							Not to be expected
12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance

## SECTION 13: Disposal considerations

### 13.1 Waste treatment methods

#### For the substance / mixture / residual amounts

EC disposal code no.:

The waste codes are recommendations based on the scheduled use of this product.

Owing to the user's specific conditions for use and disposal, other waste codes may be allocated under certain circumstances. (2014/955/EU)

07 06 04 other organic solvents, washing liquids and mother liquors

Recommendation:

Sewage disposal shall be discouraged.

Pay attention to local and national official regulations.

Take full aerosol cans to problem waste collection.

Take emptied aerosol cans to valuable material collection.

#### For contaminated packing material

Pay attention to local and national official regulations.

Recommendation:

Do not perforate, cut up or weld uncleaned container.

Recycling

15 01 04 metallic packaging

## SECTION 14: Transport information

### General statements

14.1. UN number or ID number: 1950

#### Transport by road/by rail (ADR/RID)

14.2. UN proper shipping name:

UN 1950 AEROSOLS

14.3. Transport hazard class(es): 2.1

14.4. Packing group: -

Classification code: 5F

LQ: 1 L

14.5. Environmental hazards: environmentally hazardous

Tunnel restriction code: D

#### Transport by sea (IMDG-code)

14.2. UN proper shipping name:

AEROSOLS

14.3. Transport hazard class(es): 2.1

14.4. Packing group: -

EmS: F-D, S-U

Marine Pollutant: Yes

14.5. Environmental hazards: environmentally hazardous

#### Transport by air (IATA)

14.2. UN proper shipping name:

Aerosols, flammable



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14.3. Transport hazard class(es): 2.1  
 14.4. Packing group: -  
 14.5. Environmental hazards: Not applicable

#### 14.6. Special precautions for user

Persons employed in transporting dangerous goods must be trained.  
 All persons involved in transporting must observe safety regulations.  
 Precautions must be taken to prevent damage.

#### 14.7. Maritime transport in bulk according to IMO instruments

Freighted as packaged goods rather than in bulk, therefore not applicable.  
 Minimum amount regulations have not been taken into account.  
 Danger code and packing code on request.  
 Comply with special provisions.

### SECTION 15: Regulatory information

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

Observe restrictions:

Comply with national regulations/laws governing the protection of young people at work (national implementation of the Directive 94/33/EC)!

Comply with trade association/occupational health regulations.

Regulation (EU) No 649/2012 'concerning the export and import of hazardous chemicals' must be adhered to, as the product contains a substance that falls within the scope of this Regulation.

Directive 2012/18/EU ("Seveso III"), Annex I, Part 1 - The following categories apply to this product (others may also need to be considered according to storage, handling etc.):

Hazard categories	Notes to Annex I	Qualifying quantity (tonnes) of dangerous substances as referred to in Article 3(10) for the application of - Lower-tier requirements	Qualifying quantity (tonnes) of dangerous substances as referred to in Article 3(10) for the application of - Upper-tier requirements
E1		100	200
P3a	11.1	150 (netto)	500 (netto)

The Notes to Annex 1 of Directive 2012/18/EU, in particular those named in the tables here and notes 1-6, must be taken into account when assigning categories and qualifying quantities.

Directive 2010/75/EU (VOC): 65 %

Observe incident regulations.

#### 15.2 Chemical safety assessment

A chemical safety assessment is not provided for mixtures.

### SECTION 16: Other information

EU F0008

Revised sections: 1-16

Employee training in handling dangerous goods is required.

These details refer to the product as it is delivered.

Employee instruction/training in handling hazardous materials is required.

#### Classification and processes used to derive the classification of the mixture in accordance with the ordinance (EG) 1272/2008 (CLP):

Classification in accordance with regulation (EC) No. 1272/2008 (CLP)	Evaluation method used
Skin Irrit. 2, H315	Classification according to calculation procedure.
Asp. Tox. 1, H304	Classification according to calculation procedure.
Aquatic Acute 1, H400	Classification according to calculation procedure.
Aerosol 1, H222	Classification according to calculation procedure.
Aquatic Chronic 1, H410	Classification according to calculation procedure.
Aerosol 1, H229	Classification based on the form or physical state.



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The following phrases represent the posted Hazard Class and Risk Category Code (GHS/CLP) of the product and the constituents (specified in Section 2 and 3).

H225 Highly flammable liquid and vapour.

H302 Harmful if swallowed.

H304 May be fatal if swallowed and enters airways.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H331 Toxic if inhaled.

H336 May cause drowsiness or dizziness.

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.

Skin Irrit. — Skin irritation

Asp. Tox. — Aspiration hazard

Aquatic Acute — Hazardous to the aquatic environment - acute

Aerosol — Aerosols

Aquatic Chronic — Hazardous to the aquatic environment - chronic

Flam. Liq. — Flammable liquid

STOT SE — Specific target organ toxicity - single exposure - narcotic effects

Acute Tox. — Acute toxicity - inhalation

Acute Tox. — Acute toxicity - oral

Eye Irrit. — Eye irritation

### Key literature references and sources for data:

Regulation (EC) No 1907/2006 (REACH) and Regulation (EC) No 1272/2008 (CLP) as amended.

Guidelines for the preparation of safety data sheets as amended (ECHA).

Guidelines on labelling and packaging according to the Regulation (EG) Nr. 1272/2008 (CLP) as amended (ECHA).

Safety data sheets for the constituent substances.

ECHA Homepage - Information about chemicals.

GESTIS Substance Database (Germany).

German Environment Agency "Rigoletto" information site on substances that are hazardous to water (Germany).

EU Occupation Exposure Limits Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, (EU) 2017/164, (EU) 2019/1831, each as amended.

National Lists of Occupational Exposure Limits for each country as amended.

Regulations on the transport of hazardous goods by road, rail, sea and air (ADR, RID, IMDG, IATA) as amended.

### Any abbreviations and acronyms used in this document:

acc., acc. to according, according to

ADR Accord européen relatif au transport international des marchandises Dangereuses par Route (= European Agreement concerning the International Carriage of Dangerous Goods by Road)

AOX Adsorbable organic halogen compounds

approx. approximately

Art., Art. no. Article number

ASTM ASTM International (American Society for Testing and Materials)

ATE Acute Toxicity Estimate

BAM Bundesanstalt für Materialforschung und -prüfung (Federal Institute for Materials Research and Testing, Germany)

BAuA Bundesanstalt für Arbeitsschutz und Arbeitsmedizin (= Federal Institute for Occupational Health and Safety, Germany)

BCF Bioconcentration factor

BSEF The International Bromine Council

bw body weight

CAS Chemical Abstracts Service

CLP Classification, Labelling and Packaging (REGULATION (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures)

CMR carcinogenic, mutagenic, reproductive toxic

DMEL Derived Minimum Effect Level

DNEL Derived No Effect Level

DOC Dissolved organic carbon

dw dry weight

e.g. for example (abbreviation of Latin 'exempli gratia'), for instance

EbCx, EyCx, EbLx (x = 10, 50) Effect Concentration/Level of x % on reduction of the biomass (algae, plants)

EC European Community

ECHA European Chemicals Agency

EC<sub>x</sub>, EL<sub>x</sub> (x = 0, 3, 5, 10, 20, 50, 80, 100) Effect Concentration/Level for x % effect

EEC European Economic Community

EINECS European Inventory of Existing Commercial Chemical Substances

ELINCS European List of Notified Chemical Substances

EN European Norms

EPA United States Environmental Protection Agency (United States of America)

ErC<sub>x</sub>, EμC<sub>x</sub>, ErL<sub>x</sub> (x = 10, 50) Effect Concentration/Level of x % on inhibition of the growth rate (algae, plants)

etc. et cetera

EU European Union

EVAl Ethylene-vinyl alcohol copolymer

Fax. Fax number

gen. general

GHS Globally Harmonized System of Classification and Labelling of Chemicals

GWP Global warming potential

K<sub>oc</sub> Adsorption coefficient of organic carbon in the soil

K<sub>ow</sub> octanol-water partition coefficient

IARC International Agency for Research on Cancer

IATA International Air Transport Association

IBC (Code) International Bulk Chemical (Code)

IMDG-code International Maritime Code for Dangerous Goods

incl. including, inclusive

IUCLID International Uniform Chemical Information Database

IUPAC International Union for Pure Applied Chemistry

LC<sub>50</sub> Lethal Concentration to 50 % of a test population

LD<sub>50</sub> Lethal Dose to 50% of a test population (Median Lethal Dose)

Log K<sub>oc</sub> Logarithm of adsorption coefficient of organic carbon in the soil

Log K<sub>ow</sub>, Log P<sub>ow</sub> Logarithm of octanol-water partition coefficient

LQ Limited Quantities

MARPOL International Convention for the Prevention of Marine Pollution from Ships

n.a. not applicable

n.av. not available

n.c. not checked

n.d.a. no data available

NIOSH National Institute for Occupational Safety and Health (USA)

NLP No-longer-Polymer

NOEC, NOEL No Observed Effect Concentration/Level

OECD Organisation for Economic Co-operation and Development

org. organic

OSHA Occupational Safety and Health Administration (USA)

PBT persistent, bioaccumulative and toxic

PE Polyethylene

PNEC Predicted No Effect Concentration

ppm parts per million

PVC Polyvinylchloride

REACH Registration, Evaluation, Authorisation and Restriction of Chemicals (REGULATION (EC) No 1907/2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals)

REACH-IT List-No. 9xx-xxx-x No. is automatically assigned, e.g. to pre-registrations without a CAS No. or other numerical identifier. List Numbers do not have any legal significance, rather they are purely technical identifiers for processing a submission via REACH-IT.

RID Règlement concernant le transport International ferroviaire de marchandises Dangereuses (= Regulation concerning the International Carriage of Dangerous Goods by Rail)

SVHC Substances of Very High Concern

Tel. Telephone

TOC Total organic carbon

UN RTDG United Nations Recommendations on the Transport of Dangerous Goods

VOC Volatile organic compounds

vPvB very persistent and very bioaccumulative

wwt wet weight

The statements made here should describe the product with regard to the necessary safety precautions - they are not meant to guarantee definite characteristics - but they are based on our present up-to-date knowledge. No responsibility.

These statements were made by:

**Chemical Check GmbH, Chemical Check Platz 1-7, D-32839 Steinheim, Tel.: +49 5233 94 17 0, Fax: +49 5233 94 17 90**

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