Lastoflex MS

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier: Lastoflex MS

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

Relevant uses: Coating for concrete

Uses advised against: All uses not specified in this section or in section 7.3

1.3 Details of the supplier of the safety data sheet:

Elastotet
48th KM National Road Athens Lamia
190 11 Avlonas - Attiki - Greece
Phone.: +30 22950 - 29995, +30 22950 - 29997, +30 22950 - 29367 - Fax: +30 22950 - 29366
elastotet2@hol.gr, elastotet@elastotet.gr
www.elastotet.gr

1.4 Emergency telephone number:

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture:

CLP Regulation (EC) No 1272/2008:

Classification of this product has been carried out in accordance with CLP Regulation (EC) No 1272/2008.

Flam. Liq. 3: Flammable liquids, Category 3, H226

2.2 Label elements:

CLP Regulation (EC) No 1272/2008:

Warning

Hazard statements:

Flam. Liq. 3: H226 - Flammable liquid and vapour

Precautionary statements:

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
P233: Keep container tightly closed
P280: Wear protective gloves/protective clothing/eye protection/face protection
P370+P378: In case of fire: Use ABC powder extinguisher to extinguish.
P403+P235: Store in a well-ventilated place. Keep cool
P501: Dispose of contents/container according to the separated collection system used in your municipality

Supplementary information:

EUH066: Repeated exposure may cause skin dryness or cracking

2.3 Other hazards:

Product fails to meet PBT/vPvB criteria

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS **

3.1 Substance:

Non-applicable

3.2 Mixture:

Chemical description: Mixture composed of additives and resins in solvents

Components:

In accordance with Annex II of Regulation (EC) No 1907/2006 (point 3), the product contains:

*** Changes with regards to the previous version*

- CONTINUED ON NEXT PAGE -

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS ** (continued)

Identification	Chemical name/Classification		Concentration
CAS: 64742-48-9 EC: Non-applicable Index: Non-applicable REACH Non-applicable	**Hydrocarbons, C9-C11,n-alkenes, iso-alkenes, cyclics, <2% aromatics**[1]	Self-classified	**10 - <25 %**
	Regulation 1272/2008	Asp. Tox. 1: H304; Flam. Liq. 3: H226; STOT SE 3: H336; EUH066 - Danger	
CAS: 2768-02-7 EC: 220-449-8 Index: Non-applicable REACH 01-2119513215-52-XXXX	**Trimethoxyvinylsilane**[1]	Self-classified	**1 - <2,5 %**
	Regulation 1272/2008	Acute Tox. 4: H332; Flam. Liq. 2: H225; STOT RE 2: H373 - Danger	
CAS: 52829-07-9 EC: 258-207-9 Index: Non-applicable REACH 01-2119537297-32-XXXX	**Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate**[1]	Self-classified	**<1 %**
	Regulation 1272/2008	Aquatic Acute 1: H400; Aquatic Chronic 2: H411; Eye Dam. 1: H318 - Danger	
CAS: 77-58-7 EC: 201-039-8 Index: 050-030-00-3 REACH 01-2119496068-27-XXXX	**Dibutyltin Dilaurate**[2]	Self-classified	**<1 %**
	Regulation 1272/2008	Aquatic Acute 1: H400; Aquatic Chronic 1: H410; Muta. 2: H341; Repr. 1B: H360; Skin Corr. 1C: H314; Skin Sens. 1: H317; STOT RE 1: H372; STOT SE 1: H370 - Danger	

[1] Substances presenting a health or environmental hazard which meet criteria laid down in Regulation (EU) No. 2015/830
[2] Substance with a Union workplace exposure limit

To obtain more information on the hazards of the substances consult sections 8, 11, 12, 15 and 16.

*** Changes with regards to the previous version*

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures:

The symptoms resulting from intoxication can appear after exposure, therefore, in case of doubt, seek medical attention for direct exposure to the chemical product or persistent discomfort, showing the SDS of this product.

By inhalation:

This product is not classified as hazardous through inhalation. However, in case of intoxication symptoms it is recommended to remove the person affected from the area of exposure, provide clean air and keep at rest. Request medical attention if symptoms persist.

By skin contact:

Remove contaminated clothing and footwear, rinse skin or shower the person affected if appropriate with plenty of cold water and neutral soap. In serious cases see a doctor. If the product causes burns or freezing, clothing should not be removed as this could worsen the injury caused if it is stuck to the skin. If blisters form on the skin, these should never be burst as this will increase the risk of infection.

By eye contact:

Rinse eyes thoroughly with lukewarm water for at least 15 minutes. Do not allow the person affected to rub or close their eyes. If the injured person uses contact lenses, these should be removed unless they are stuck to the eyes, in which case this could cause further damage. In all cases, after cleaning, a doctor should be consulted as quickly as possible with the SDS of the product.

By ingestion/aspiration:

Do not induce vomiting, but if it does happen keep the head down to avoid aspiration. Keep the person affected at rest. Rinse out the mouth and throat, as they may have been affected during ingestion.

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

Acute and delayed effects are indicated in sections 2 and 11.

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

Non-applicable

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media:

If possible use polyvalent powder fire extinguishers (ABC powder), alternatively use foam or carbon dioxide extinguishers (CO_2). IT IS RECOMMENDED NOT to use tap water as an extinguishing agent.

5.2 Special hazards arising from the substance or mixture:

As a result of combustion or thermal decomposition reactive sub-products are created that can become highly toxic and, consequently, can present a serious health risk.

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SECTION 5: FIREFIGHTING MEASURES (continued)

5.3 Advice for firefighters:

Depending on the magnitude of the fire it may be necessary to use full protective clothing and self-contained breathing apparatus (SCBA). Minimum emergency facilities and equipment should be available (fire blankets, portable first aid kit,...) in accordance with Directive 89/654/EC.

Additional provisions:

Act in accordance with the Internal Emergency Plan and the Information Sheets on actions to take after an accident or other emergencies. Eliminate all sources of ignition. In case of fire, cool the storage containers and tanks for products susceptible to combustion, explosion or BLEVE as a result of high temperatures. Avoid spillage of the products used to extinguish the fire into an aqueous medium.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures:

Isolate leaks provided that there is no additional risk for the people performing this task. Evacuate the area and keep out those without protection. Personal protection equipment must be used against potential contact with the spilt product (See section 8). Above all prevent the formation of any vapour-air flammable mixtures, through either ventilation or the use of an inert medium. Destroy any source of ignition. Eliminate electrostatic charges by interconnecting all the conductive surfaces on which static electricity could form, and also ensuring that all surfaces are connected to the ground.

6.2 Environmental precautions:

This product is not classified as hazardous to the environment. Keep product away from drains, surface and underground water.

6.3 Methods and material for containment and cleaning up:

It is recommended:

Absorb the spillage using sand or inert absorbent and move it to a safe place. Do not absorb in sawdust or other combustible absorbents. For any concern related to disposal consult section 13.

6.4 Reference to other sections:

See sections 8 and 13.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling:

A.- Precautions for safe manipulation

Comply with the current legislation concerning the prevention of industrial risks. Keep containers hermetically sealed. Control spills and residues, destroying them with safe methods (section 6). Avoid leakages from the container. Maintain order and cleanliness where dangerous products are used.

B.- Technical recommendations for the prevention of fires and explosions

Transfer in well ventilated areas, preferably through localized extraction. Fully control sources of ignition (mobile phones, sparks,…) and ventilate during cleaning operations. Avoid the existence of dangerous atmospheres inside containers, applying inertization systems where possible. Transfer at a slow speed to avoid the creation of electrostatic charges. Against the possibility of electrostatic charges: ensure a perfect equipotential connection, always use groundings, do not wear work clothes made of acrylic fibres, preferably wearing cotton clothing and conductive footwear. Comply with the essential security requirements for equipment and systems defined in Directive 94/9/EC (ATEX 100) and with the minimum requirements for protecting the security and health of workers under the selection criteria of Directive 1999/92/EC (ATEX 137). Consult section 10 for conditions and materials that should be avoided.

C.- Technical recommendations to prevent ergonomic and toxicological risks

Do not eat or drink during the process, washing hands afterwards with suitable cleaning products.

D.- Technical recommendations to prevent environmental risks

It is recommended to have absorbent material available at close proximity to the product (See subsection 6.3)

7.2 Conditions for safe storage, including any incompatibilities:

A.- Technical measures for storage

Minimum Temp.:	5 ºC
Maximum Temp.:	30 ºC
Maximum time:	12 Months

B.- General conditions for storage

- CONTINUED ON NEXT PAGE -

SECTION 7: HANDLING AND STORAGE (continued)

Avoid sources of heat, radiation, static electricity and contact with food. For additional information see subsection 10.5

7.3 Specific end use(s):

Except for the instructions already specified it is not necessary to provide any special recommendation regarding the uses of this product.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters:

Substances whose occupational exposure limits have to be monitored in the work environment

Identification	Environmental limits		
Dibutyltin Dilaurate	IOELV (8h)		
CAS: 77-58-7	IOELV (STEL)		
EC: 201-039-8	Year	2018	

DNEL (Workers):

Identification		Short exposure		Long exposure	
		Systemic	Local	Systemic	Local
Hydrocarbons, C9-C11,n-alkenes, iso-alkenes, cyclics, <2% aromatics	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 64742-48-9	Dermal	Non-applicable	Non-applicable	300 mg/kg	Non-applicable
EC: Non-applicable	Inhalation	Non-applicable	Non-applicable	1500 mg/m³	Non-applicable
Trimethoxyvinylsilane	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 2768-02-7	Dermal	Non-applicable	Non-applicable	0,69 mg/kg	Non-applicable
EC: 220-449-8	Inhalation	Non-applicable	Non-applicable	4,9 mg/m³	Non-applicable
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 52829-07-9	Dermal	2 mg/kg	Non-applicable	2 mg/kg	Non-applicable
EC: 258-207-9	Inhalation	5,6 mg/m³	Non-applicable	5,6 mg/m³	Non-applicable
Dibutyltin Dilaurate	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 77-58-7	Dermal	1 mg/kg	Non-applicable	0,2 mg/kg	Non-applicable
EC: 201-039-8	Inhalation	0,07 mg/m³	Non-applicable	0,01 mg/m³	Non-applicable

DNEL (General population):

Identification		Short exposure		Long exposure	
		Systemic	Local	Systemic	Local
Hydrocarbons, C9-C11,n-alkenes, iso-alkenes, cyclics, <2% aromatics	Oral	Non-applicable	Non-applicable	300 mg/kg	Non-applicable
CAS: 64742-48-9	Dermal	Non-applicable	Non-applicable	300 mg/kg	Non-applicable
EC: Non-applicable	Inhalation	Non-applicable	Non-applicable	900 mg/m³	Non-applicable
Trimethoxyvinylsilane	Oral	Non-applicable	Non-applicable	0,3 mg/kg	Non-applicable
CAS: 2768-02-7	Dermal	26,9 mg/kg	Non-applicable	0,3 mg/kg	Non-applicable
EC: 220-449-8	Inhalation	93,4 mg/m³	Non-applicable	1,04 mg/m³	Non-applicable
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	Oral	1 mg/kg	Non-applicable	1 mg/kg	Non-applicable
CAS: 52829-07-9	Dermal	1 mg/kg	Non-applicable	1 mg/kg	Non-applicable
EC: 258-207-9	Inhalation	1,4 mg/m³	Non-applicable	1,4 mg/m³	Non-applicable
Dibutyltin Dilaurate	Oral	0,01 mg/kg	Non-applicable	0,002 mg/kg	Non-applicable
CAS: 77-58-7	Dermal	0,5 mg/kg	Non-applicable	0,08 mg/kg	Non-applicable
EC: 201-039-8	Inhalation	0,02 mg/m³	Non-applicable	0,003 mg/m³	Non-applicable

PNEC:

Identification				
Trimethoxyvinylsilane	STP	110 mg/L	Fresh water	0,34 mg/L
CAS: 2768-02-7	Soil	0,052 mg/kg	Marine water	0,034 mg/L
EC: 220-449-8	Intermittent	3,4 mg/L	Sediment (Fresh water)	1,24 mg/kg
	Oral	Non-applicable	Sediment (Marine water)	0,12 mg/kg

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SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION (continued)

Identification				
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	STP	1 mg/L	Fresh water	0,005 mg/L
CAS: 52829-07-9	Soil	1,6 mg/kg	Marine water	0,0005 mg/L
EC: 258-207-9	Intermittent	0,011 mg/L	Sediment (Fresh water)	8,02 mg/kg
	Oral	Non-applicable	Sediment (Marine water)	0,802 mg/kg
Dibutyltin Dilaurate	STP	100 mg/L	Fresh water	0,000463 mg/L
CAS: 77-58-7	Soil	Non-applicable	Marine water	0,0000463 mg/L
EC: 201-039-8	Intermittent	0,00463 mg/L	Sediment (Fresh water)	Non-applicable
	Oral	0,2 g/kg	Sediment (Marine water)	Non-applicable

8.2 Exposure controls:

A.- General security and hygiene measures in the work place

As a preventative measure it is recommended to use basic Personal Protective Equipment, with the corresponding <<CE marking>> in accordance with Directive 89/686/EC. For more information on Personal Protective Equipment (storage, use, cleaning, maintenance, class of protection,...) consult the information leaflet provided by the manufacturer. For more information see subsection 7.1.
All information contained herein is a recommendation which needs some specification from the labour risk prevention services as it is not known whether the company has additional measures at its disposal.

B.- Respiratory protection

The use of protection equipment will be necessary if a mist forms or if the occupational exposure limits are exceeded.

C.- Specific protection for the hands

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory hand protection	NON-disposable chemical protective gloves	CE CAT III	EN 374-1:2003 EN 374-3:2003/AC:2006 EN 420:2003+A1:2009	The Breakthrough Time indicated by the manufacturer must exceed the period during which the product is being used. Do not use protective creams after the product has come into contact with skin.

"As the product is a mixture of several substances, the resistance of the glove material can not be predicted in advance with total reliability and has therefore to be checked prior to the application"

D.- Ocular and facial protection

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory face protection	Face mask	CE CAT II	EN 166:2001 EN 167:2001 EN 168:2001 EN ISO 4007:2012	Clean daily and disinfect periodically according to the manufacturer´s instructions. Use if there is a risk of splashing.

E.- Body protection

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory complete body protection	Disposable clothing for protection against chemical risks, with antistatic and fireproof properties	CE CAT III	EN 1149-1,2,3 EN 13034:2005+A1:2009 EN ISO 13982-1:2004/A1:2010 EN ISO 6529:2001 EN ISO 6530:2005 EN ISO 13688:2013 EN 464:1994	For professional use only. Clean periodically according to the manufacturer´s instructions.
 Mandatory foot protection	Safety footwear for protection against chemical risk, with antistatic and heat resistant properties	CE CAT III	EN 13287:2008 EN ISO 20345:2011 EN 13832-1:2006	Replace boots at any sign of deterioration.

F.- Additional emergency measures

Emergency measure	Standards	Emergency measure	Standards
 Emergency shower	ANSI Z358-1 ISO 3864-1:2002	 Eyewash stations	DIN 12 899 ISO 3864-1:2002

Environmental exposure controls:

- CONTINUED ON NEXT PAGE -

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION (continued)

In accordance with the community legislation for the protection of the environment it is recommended to avoid environmental spillage of both the product and its container. For additional information see subsection 7.1.D

Volatile organic compounds:

With regard to Directive 2010/75/EU, this product has the following characteristics:

V.O.C. (Supply):	18,66 % weight
V.O.C. density at 20 ºC:	Non-applicable
Average carbon number:	9,4
Average molecular weight:	147,84 g/mol

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties:

For complete information see the product datasheet.

Appearance:

Physical state at 20 ºC:	Liquid
Appearance:	Fluid
Colour:	☐ White
Odour:	Solvent
Odour threshold:	Non-applicable *

Volatility:

Boiling point at atmospheric pressure:	189 ºC
Vapour pressure at 20 ºC:	163 Pa
Vapour pressure at 50 ºC:	1475 Pa (1 kPa)
Evaporation rate at 20 ºC:	Non-applicable *

Product description:

Density at 20 ºC:	Non-applicable *
Relative density at 20 ºC:	1,4
Dynamic viscosity at 20 ºC:	2000 cP
Kinematic viscosity at 20 ºC:	2000 cSt
Kinematic viscosity at 40 ºC:	Non-applicable *
Concentration:	Non-applicable *
pH:	Non-applicable *
Vapour density at 20 ºC:	Non-applicable *
Partition coefficient n-octanol/water 20 ºC:	Non-applicable *
Solubility in water at 20 ºC:	Non-applicable *
Solubility properties:	Non-applicable *
Decomposition temperature:	Non-applicable *
Melting point/freezing point:	Non-applicable *
Explosive properties:	Non-applicable *
Oxidising properties:	Non-applicable *

Flammability:

Flash Point:	38 ºC
Flammability (solid, gas):	Non-applicable *
Autoignition temperature:	270 ºC
Lower flammability limit:	Not available
Upper flammability limit:	Not available

*Not relevant due to the nature of the product, not providing information property of its hazards.

- CONTINUED ON NEXT PAGE -

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES (continued)

Explosive:

Lower explosive limit:	Non-applicable *
Upper explosive limit:	Non-applicable *

9.2 Other information:

Surface tension at 20 ºC:	Non-applicable *
Refraction index:	Non-applicable *

*Not relevant due to the nature of the product, not providing information property of its hazards.

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity:

No hazardous reactions are expected because the product is stable under recommended storage conditions. See section 7.

10.2 Chemical stability:

Chemically stable under the conditions of storage, handling and use.

10.3 Possibility of hazardous reactions:

Under the specified conditions, hazardous reactions that lead to excessive temperatures or pressure are not expected.

10.4 Conditions to avoid:

Applicable for handling and storage at room temperature:

Shock and friction	Contact with air	Increase in temperature	Sunlight	Humidity
Not applicable	Not applicable	Risk of combustion	Avoid direct impact	Not applicable

10.5 Incompatible materials:

Acids	Water	Combustive materials	Combustible materials	Others
Avoid strong acids	Not applicable	Avoid direct impact	Not applicable	Avoid alkalis or strong bases

10.6 Hazardous decomposition products:

See subsection 10.3, 10.4 and 10.5 to find out the specific decomposition products. Depending on the decomposition conditions, complex mixtures of chemical substances can be released: carbon dioxide (CO2), carbon monoxide and other organic compounds.

SECTION 11: TOXICOLOGICAL INFORMATION **

11.1 Information on toxicological effects:

The experimental information related to the toxicological properties of the product itself is not available

Dangerous health implications:

In case of exposure that is repetitive, prolonged or at concentrations higher than the recommended occupational exposure limits, adverse effects on health may result, depending on the means of exposure:

A- Ingestion (acute effect):

- Acute toxicity : Based on available data, the classification criteria are not met, as it does not contain substances classified as dangerous for consumption. For more information see section 3.
- Corrosivity/Irritability: Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.

B- Inhalation (acute effect):

- Acute toxicity : Based on available data, the classification criteria are not met. However, it contains substances classified as dangerous for inhalation. For more information see section 3.
- Corrosivity/Irritability: Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.

C- Contact with the skin and the eyes (acute effect):

*** Changes with regards to the previous version*

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SECTION 11: TOXICOLOGICAL INFORMATION ** (continued)

- Contact with the skin: Based on available data, the classification criteria are not met. However, it contains substances classified as dangerous for skin contact. For more information see section 3.
- Contact with the eyes: Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.

D- CMR effects (carcinogenicity, mutagenicity and toxicity to reproduction):

- Carcinogenicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as dangerous for the effects mentioned. For more information see section 3.
- Mutagenicity: Based on available data, the classification criteria are not met. However, it contains substances classified as dangerous with mutagenic effects. For more information see section 3.
- Reproductive toxicity: Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.

E- Sensitizing effects:

- Respiratory: Based on available data, the classification criteria are not met, as it does not contain substances classified as dangerous with sensitising effects. For more information see section 3.
- Cutaneous: Based on available data, the classification criteria are not met. However, it contains substances classified as dangerous with sensitising effects. For more information see section 3.

F- Specific target organ toxicity (STOT) - single exposure:

Based on available data, the classification criteria are not met. However, it does contain substances which are classified as dangerous as a result of a single exposure. For more information see section 3.

G- Specific target organ toxicity (STOT)-repeated exposure:

- Specific target organ toxicity (STOT)-repeated exposure: Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.
- Skin: Repeated exposure may cause skin dryness or cracking

H- Aspiration hazard:

Based on available data, the classification criteria are not met. However, it does contain substances classified as dangerous for this effect. For more information see section 3.

Other information:

Non-applicable

Specific toxicology information on the substances:

Identification	Acute toxicity		Genus
Trimethoxyvinylsilane	LD50 oral	7236 mg/kg	Rat
CAS: 2768-02-7	LD50 dermal	3880 mg/kg (ATEi)	Rabbit
EC: 220-449-8	LC50 inhalation	11 mg/L (4 h) (ATEi)	
Hydrocarbons, C9-C11,n-alkenes, iso-alkenes, cyclics, <2% aromatics	LD50 oral	5100 mg/kg	Rat
CAS: 64742-48-9	LD50 dermal	Non-applicable	
EC: Non-applicable	LC50 inhalation	Non-applicable	
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	LD50 oral	3700 mg/kg	Rat
CAS: 52829-07-9	LD50 dermal	Non-applicable	
EC: 258-207-9	LC50 inhalation	Non-applicable	
Dibutyltin Dilaurate	LD50 oral	175 mg/kg	Rat
CAS: 77-58-7	LD50 dermal	Non-applicable	
EC: 201-039-8	LC50 inhalation	Non-applicable	

*** Changes with regards to the previous version*

SECTION 12: ECOLOGICAL INFORMATION **

The experimental information related to the eco-toxicological properties of the product itself is not available

12.1 Toxicity:

Identification	Acute toxicity		Species	Genus
Trimethoxyvinylsilane	LC50	191 mg/L (96 h)	Oncorhynchus mykiss	Fish
CAS: 2768-02-7	EC50	167 mg/L (48 h)	Daphnia magna	Crustacean
EC: 220-449-8	EC50	957 mg/L (72 h)	N/A	Algae

*** Changes with regards to the previous version*

- CONTINUED ON NEXT PAGE -

SECTION 12: ECOLOGICAL INFORMATION ** (continued)

Identification	Acute toxicity		Species	Genus
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	LC50	5.3 mg/L (96 h)	Oryzias latipes	Fish
CAS: 52829-07-9	EC50	8.6 mg/L (48 h)	Daphnia magna	Crustacean
EC: 258-207-9	EC50	0.7 mg/L (72 h)	Pseudokirchneriella subcapitata	Algae
Dibutyltin Dilaurate	LC50	0.1 - 1 mg/L (96 h)		Fish
CAS: 77-58-7	EC50	0.1 - 1 mg/L		Crustacean
EC: 201-039-8	EC50	0.1 - 1 mg/L		Algae

12.2 Persistence and degradability:

Identification	Degradability		Biodegradability	
Hydrocarbons, C9-C11,n-alkenes, iso-alkenes, cyclics, <2% aromatics	BOD5	Non-applicable	Concentration	Non-applicable
CAS: 64742-48-9	COD	Non-applicable	Period	28 days
EC: Non-applicable	BOD5/COD	Non-applicable	% Biodegradable	80 %
Trimethoxyvinylsilane	BOD5	Non-applicable	Concentration	104 mg/L
CAS: 2768-02-7	COD	Non-applicable	Period	28 days
EC: 220-449-8	BOD5/COD	Non-applicable	% Biodegradable	51 %
Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate	BOD5	Non-applicable	Concentration	20 mg/L
CAS: 52829-07-9	COD	Non-applicable	Period	28 days
EC: 258-207-9	BOD5/COD	Non-applicable	% Biodegradable	29 %
Dibutyltin Dilaurate	BOD5	0.00054 g O2/g	Concentration	100 mg/L
CAS: 77-58-7	COD	Non-applicable	Period	28 days
EC: 201-039-8	BOD5/COD	Non-applicable	% Biodegradable	50 %

12.3 Bioaccumulative potential:

Identification	Bioaccumulation potential	
Dibutyltin Dilaurate	BCF	31
CAS: 77-58-7	Pow Log	3.12
EC: 201-039-8	Potential	Moderate

12.4 Mobility in soil:

Not available

12.5 Results of PBT and vPvB assessment:

Product fails to meet PBT/vPvB criteria

12.6 Other adverse effects:

Not described

*** Changes with regards to the previous version*

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods:

Code	Description	Waste class (Regulation (EU) No 1357/2014)
08 01 11*	waste paint and varnish containing organic solvents or other hazardous substances	Dangerous

Type of waste (Regulation (EU) No 1357/2014):

HP3 Flammable

Waste management (disposal and evaluation):

Consult the authorized waste service manager on the assessment and disposal operations in accordance with Annex 1 and Annex 2 (Directive 2008/98/EC). As under 15 01 (2014/955/EC) of the code and in case the container has been in direct contact with the product, it will be processed the same way as the actual product. Otherwise, it will be processed as non-dangerous residue. We do not recommended disposal down the drain. See paragraph 6.2.

Regulations related to waste management:

In accordance with Annex II of Regulation (EC) No 1907/2006 (REACH) the community or state provisions related to waste management are stated

Community legislation: Directive 2008/98/EC, 2014/955/EU, Regulation (EU) No 1357/2014

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SECTION 14: TRANSPORT INFORMATION

Transport of dangerous goods by land:

With regard to ADR 2017 and RID 2017:

14.1	**UN number:**	UN1263
14.2	**UN proper shipping name:**	PAINT
14.3	**Transport hazard class(es):**	3
	Labels:	3
14.4	**Packing group:**	III
14.5	**Environmental hazards:**	No
14.6	**Special precautions for user**	
	Special regulations:	163, 367, 640E, 650
	Tunnel restriction code:	D/E
	Physico-Chemical properties:	see section 9
	Limited quantities:	5 L
14.7	**Transport in bulk according to Annex II of Marpol and the IBC Code:**	Non-applicable

Transport of dangerous goods by sea:

With regard to IMDG 38-16:

14.1	**UN number:**	UN1263
14.2	**UN proper shipping name:**	PAINT
14.3	**Transport hazard class(es):**	3
	Labels:	3
14.4	**Packing group:**	III
14.5	**Environmental hazards:**	No
14.6	**Special precautions for user**	
	Special regulations:	223, 955, 163, 367
	EmS Codes:	F-E, S-E
	Physico-Chemical properties:	see section 9
	Limited quantities:	5 L
14.7	**Transport in bulk according to Annex II of Marpol and the IBC Code:**	Non-applicable

Transport of dangerous goods by air:

With regard to IATA/ICAO 2017:

14.1	**UN number:**	UN1263
14.2	**UN proper shipping name:**	PAINT
14.3	**Transport hazard class(es):**	3
	Labels:	3
14.4	**Packing group:**	III
14.5	**Environmental hazards:**	No
14.6	**Special precautions for user**	
	Physico-Chemical properties:	see section 9
14.7	**Transport in bulk according to Annex II of Marpol and the IBC Code:**	Non-applicable

SECTION 15: REGULATORY INFORMATION

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

Candidate substances for authorisation under the Regulation (EC) No 1907/2006 (REACH): Non-applicable

Substances included in Annex XIV of REACH ("Authorisation List") and sunset date: Non-applicable

Regulation (EC) No 1005/2009, about substances that deplete the ozone layer: Non-applicable

Article 95, REGULATION (EU) No 528/2012: Non-applicable

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SECTION 15: REGULATORY INFORMATION (continued)

REGULATION (EU) No 649/2012, in relation to the import and export of hazardous chemical products: Contains Dibutyltin Dilaurate

Limitations to commercialisation and the use of certain dangerous substances and mixtures (Annex XVII REACH, etc ....):

Contains Di-´´isononyl´´ phthalate. This product may not be used in childrens' games or items if the final Di-´´isononyl´´ phthalate concentration is greater than 0.1 in the weight of plasitcised material.
Shall not be used, as substance or as mixtures in aerosol dispensers where these aerosol dispensers are intended for supply to the general public for entertainment and decorative purposes such as the following:
— metallic glitter intended mainly for decoration,
— artificial snow and frost,
— "whoopee" cushions,
— silly string aerosols,
— imitation excrement,
— horns for parties,
— decorative flakes and foams,
— artificial cobwebs,
— stink bombs.
Without prejudice to the application of other Community provisions on the classification, packaging and labelling of substances, suppliers shall ensure before the placing on the market that the packaging of aerosol dispensers referred to above is marked visibly, legibly and indelibly with:
'For professional users only'.
Shall not be used in:
—ornamental articles intended to produce light or colour effects by means of different phases, for example in ornamental lamps and ashtrays,
—tricks and jokes,
—games for one or more participants, or any article intended to be used as such, even with ornamental aspects.

Specific provisions in terms of protecting people or the environment:

It is recommended to use the information included in this safety data sheet as a basis for conducting workplace-specific risk assessments in order to establish the necessary risk prevention measures for the handling, use, storage and disposal of this product.

Other legislation:

The product could be affected by sectorial legislation

15.2 Chemical safety assessment:

The supplier has not carried out evaluation of chemical safety.

SECTION 16: OTHER INFORMATION

Legislation related to safety data sheets:

This safety data sheet has been designed in accordance with ANNEX II-Guide to the compilation of safety data sheets of Regulation (EC) No 1907/2006 (Regulation (EC) No 2015/830)

Modifications related to the previous Safety Data Sheet which concerns the ways of managing risks.:

COMPOSITION/INFORMATION ON INGREDIENTS (SECTION 3, SECTION 11, SECTION 12):
· New declared substances
Trimethoxyvinylsilane (2768-02-7)

Texts of the legislative phrases mentioned in section 2:

H226: Flammable liquid and vapour

Texts of the legislative phrases mentioned in section 3:

The phrases indicated do not refer to the product itself; they are present merely for informative purposes and refer to the individual components which appear in section 3

CLP Regulation (EC) No 1272/2008:

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SECTION 16: OTHER INFORMATION (continued)

Acute Tox. 4: H332 - Harmful if inhaled
Aquatic Acute 1: H400 - Very toxic to aquatic life
Aquatic Chronic 1: H410 - Very toxic to aquatic life with long lasting effects
Aquatic Chronic 2: H411 - Toxic to aquatic life with long lasting effects
Asp. Tox. 1: H304 - May be fatal if swallowed and enters airways
Eye Dam. 1: H318 - Causes serious eye damage
Flam. Liq. 2: H225 - Highly flammable liquid and vapour
Flam. Liq. 3: H226 - Flammable liquid and vapour
Muta. 2: H341 - Suspected of causing genetic defects
Repr. 1B: H360 - May damage fertility or the unborn child
Skin Corr. 1C: H314 - Causes severe skin burns and eye damage
Skin Sens. 1: H317 - May cause an allergic skin reaction
STOT RE 1: H372 - Causes damage to organs through prolonged or repeated exposure. (Oral)
STOT RE 2: H373 - May cause damage to organs through prolonged or repeated exposure (Oral)
STOT SE 1: H370 - Causes damage to organs
STOT SE 3: H336 - May cause drowsiness or dizziness

Classification procedure:

Flam. Liq. 3: Calculation method (2.6.4.3)

Advice related to training:

Minimal training is recommended in order to prevent industrial risks for staff using this product and to facilitate their comprehension and interpretation of this safety data sheet, as well as the label on the product.

Principal bibliographical sources:

http://echa.europa.eu
http://eur-lex.europa.eu

Abbreviations and acronyms:

ADR: European agreement concerning the international carriage of dangerous goods by road
IMDG: International maritime dangerous goods code
IATA: International Air Transport Association
ICAO: International Civil Aviation Organisation
COD: Chemical Oxygen Demand
BOD5: 5-day biochemical oxygen demand
BCF: Bioconcentration factor
LD50: Lethal Dose 50
LC50: Lethal Concentration 50
EC50: Effective concentration 50
Log-POW: Octanol–water partition coefficient
Koc: Partition coefficient of organic carbon

- END OF SAFETY DATA SHEET -