MATERIAL SAFETY DATA SHEET

ZP PRIMER – PART A

SECTION 1: IDENTIFICATION OF THE SUBSTANCE & THE COMPANY

Product Name:	ZP Primer – Part A
Company Name:	Polycote UK, Centre Point, Wolseley Road, Woburn Road Industrial Estate, Kempston, MK42 7EF
Telephone Number:	01234 846400

SECTION 2: HAZARDS IDENTIFICATION

Classification under CLP:	Flam. Liq. 3 - H226, Health hazards Acute Tox. 4 - H312 Acute Tox. 4 - H332 Skin Irrit. 2 - H315 Eye Dam. 1 - H318 Environmental hazards Aquatic Chronic 2 - H411
Most Important adverse effects:	The product contains a small amount of sensitising substance. May cause skin sensitisation or allergic reactions in sensitive individuals.
Hazard Pictograms:	
Signal Word:	Danger
Hazard Statements:	H312+H332 Harmful in contact with skin or if inhaled. H226 Flammable liquid and vapour. H315 Causes skin irritation. H318 Causes serious eye damage. H411 Toxic to aquatic life with long lasting effects.
Precautionary Statements:	P102 Keep out of reach of children. P101 If medical advice is needed, have product container or label at hand. P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. P261 Avoid breathing vapour/ spray. P271 Use only outdoors or in a well-ventilated area. P273 Avoid release to the environment. P280 Wear protective gloves/ protective clothing/ eye protection/ face protection. P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower. P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P501 Dispose of contents/ container in accordance with national regulations. P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing. P370+P378 In case of fire: Use alcohol resistant foam, carbon dioxide or dry powder to extinguish. P403+P235 Store in a well-ventilated place. Keep cool.
PBT:	This product does not contain any substances classified as PBT or vPvB.

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

Chemical Name				
Index No	*EINECS*	*CAS No*	*Classification*	*Percentage %*
XYLENE				
-	215-535-7	1330-20-7	Flam. Liq. 3 - H226, Acute Tox. 4 - H312, Acute Tox. 4 - H332, Skin Irrit. 2 - H315	10-30%
2-METHYLPROPAN-1-OL				
-	201-148-0	78-83-1	Flam. Liq. 3 - H226 Skin Irrit. 2 - H315 Eye Dam. 1 - H318 STOT SE 3 - H335, H336	5-10%
1-METHOXY-2-PROPANOL				
-	203-539-1	107-98-2	Flam. Liq. 3 - H226 STOT SE 3 - H336	5-10%
TRIZINC BIS(ORTHOPHOSPHATE)				
-	231-944-3	7779-90-0	Aquatic Acute 1 - H400 Aquatic Chronic 1 - H410	1-5%

SECTION 4: FIRST AID MEASURES

General Information:	Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Never give anything by mouth to an unconscious person. Get medical attention promptly if symptoms occur after washing.
Skin Contact:	Remove affected person from source of contamination. Rinse immediately with plenty of water. Remove contaminated clothing. Get medical attention if irritation persists after washing.
Eye Contact:	Rinse immediately with plenty of water. Remove any contact lenses and open eyelids wide apart. Continue to rinse for at least 15 minutes. Get medical attention immediately. Continue to rinse.
Ingestion:	Give a few small glasses of water or milk to drink. Never give anything by mouth to an unconscious person. Do not induce vomiting. Get medical attention if any discomfort continues.
Inhalation:	Remove affected person from source of contamination. Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Get medical attention if any discomfort continues. Place an unconscious person on their side in the recovery position and ensure breathing can take place.

SECTION 5: FIRE FIGHTING MEASURES

Extinguishing Media:	Use fire-extinguishing media suitable for the surrounding fire. Extinguish with the following media: Water spray, fog or mist. Foam, carbon dioxide or dry powder. Do not use water jet as an extinguisher, as this will spread the fire.
Exposure Hazards:	Toxic gases or vapours.
Advice for Firefighters:	Avoid breathing fire gases or vapours. Containers close to fire should be removed or cooled with water. Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions:	Avoid inhalation of vapours and contact with skin and eyes. Provide adequate ventilation. Wear protective clothing as described in Section 8 of this safety data sheet.
Environmental Precautions:	Avoid discharge into drains or watercourses or onto the ground. Contain spillage with sand, earth or other suitable non-combustible material. Spillages or uncontrolled discharges into watercourses must be reported immediately to the Environmental Agency or other appropriate regulatory body.
Methods for Cleaning Up:	Avoid the spillage or runoff entering drains, sewers or watercourses. Absorb in vermiculite, dry sand or earth and place into containers. Collect and place in suitable waste disposal containers and seal securely. For waste disposal, see Section 13.

SECTION 7: HANDLING & STORAGE

Usage Precautions:	Avoid inhalation of vapours. Avoid spilling. Avoid contact with skin and eyes. Do not eat, drink or smoke when using the product. Good personal hygiene procedures should be implemented. Wash hands and any other contaminated areas of the body with soap and water before leaving the work site. The Manual Handling Operations Regulations may apply to the handling of containers of this product. For products sold by weight refer to the guide net weight indicated on the container. Allowance will have to be made for the immediate packaging to give an approximate gross weight.
Storage Precautions:	Store in tightly closed original container in a dry, cool and well-ventilated place. Store in closed original container at temperatures between 5°C and 25°C. Protect from freezing and direct sunlight. Keep containers upright.
Specific End Use(s):	The identified uses for this product are detailed in Section 1.2. Usage description Collect and place in suitable waste disposal containers and seal securely. Label the containers containing waste and contaminated materials and remove from the area as soon as possible.

SECTION 8: EXPOSURE CONTROLS & PERSONAL PROTECTION

Hazardous Ingredients:

XYLENE				
	Long-term exposure limit (8-hour TWA)		*Short-term exposure limit (15-minute)*	
	WEL 50 ppm	220 mg/m³	WEL 100 ppm	441 mg/m³
2-METHYLPROPAN-1-OL				
	WEL 50 ppm	154 mg/m³	WEL 75 ppm	231 mg/m³
1-METHOXY-2-PROPANOL				
	WEL 100 ppm	375 mg/m³	WEL 150 ppm	560 mg/m³
TRIZINC BIS(ORTHOPHOSPHATE)				
	-	10 mg/m³	-	-

(WEL = Workplace Exposure Limit)

Exposure Controls:

Provide adequate ventilation. Avoid inhalation of vapours. Observe any occupational exposure limits for the product or ingredients.

Engineering Measures:	Eyewear complying with an approved standard should be worn if a risk assessment indicates eye contact is possible. The following protection should be worn: Chemical splash goggles.
Eye Protection:	Wear appropriate clothing to prevent reasonably probable skin contact. To protect hands from chemicals, gloves should comply with European Standards EN388 and 374. As a general principle, exposure should be managed by means other than the provision of protective gloves.
Skin Protection:	Use engineering controls to reduce air contamination to permissible exposure level. No specific hygiene procedures recommended but good personal hygiene practices should always be observed when working with chemical products.
Hygiene Measures:	Respiratory protection may be required if excessive airborne contamination occurs. In case of inadequate ventilation or risk of inhalation of vapours, use suitable respiratory equipment with combination filter (type A2/P3).
Respiratory Protection:	

SECTION 9: PHYSICAL & CHEMICAL PROPERTIES

Appearance:	Liquid
Colour:	Clear
Odour:	Aromatic. Solvent
Boiling Point:	137°c (Xylene)
Flash Point:	> 23°C < 60°C Closed cup.
Relative Density:	~1.10 - 1.30 depending on colour @ @ 20C°C
Solubility:	Soluble in the following materials: Aromatic solvents.
Viscosity:	1.0 - 4.0 (ICI Cone & Plate) P @ 25°C
Upper/lower flammability or explosive limits:	Lower flammable/explosive limit: 1.1 (xylene) g/100 g Upper flammable/explosive limit: 7.0 (xylene) g/100 g
Vapour Pressure:	1.1 (Xylene) kPa @ °C
Vapour Density:	Heavier than air
Auto ignition temperature:	270 (Xylene)°C
Volatility:	approx. 40% when mixed with activator
Volatile organic compound:	EU: (cat A/j): 500 g/l 2010. This product contains a maximum VOC content of <500 (when mixed) g/litre.

SECTION 10: STABILTY & REACTIVITY

Reactivity:	There are no known reactivity hazards associated with this product.
Chemical Stability:	Stable at normal ambient temperatures and when used as recommended.
Materials to avoid:	Strong acids. Alkalis - inorganic. Amines. Mercaptans (thiols).
Haz. Decomp. Products:	Oxides of carbon. Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapours.

SECTION 11: TOXOLOGICAL INFORMATION

Hazardous Ingredients:

	Xylene	2-METHYLPROPAN-1-OL	1-METHOXY-2-PROPANOL	TRIZINC BIS-(ORTHOPHOSPHATE)
Acute Toxicity Oral (LD50mg/kg)	3,523.0	2,830.0	4,016.0	5,100.0
Acute Toxicity Dermal (LD50mg/kg)	/	2100.0	2,100.0	/
Species/Animal Data	Rat	Rat / Noncorrosive to skin	Rat / Noncorrosive to skin	Rat
Serious Eye Damage/Irritation	Severely irritating to skin. Irritation of eyes is assumed. No testing is needed.	/	/	/
Respiratory Sensitisation	/	/	/	/
Skin Sensitisation	/	/	/	/
Carcinogenicity	/	/	/	/
Reproductive Toxicity/Fertility	/	/	/	/
Aspiration Hazard	Kinematic viscosity <= 20.5 mm2/s.	/	/	/
Inhalation	Harmful by inhalation.	Irritating to respiratory system.	/	/
Ingestion	Pneumonia may be the result if vomited	/	/	/

	material containing solvents reaches the lungs.			
Skin Contact	Harmful in contact with skin.	/	/	/
Eye Contact	May cause severe eye irritation.	May cause severe eye irritation.	/	/
Target Organs	Central nervous system Liver	/	/	/

ATE Dermal:

ATE Inhalation (vapours mg/l): 1,100.0

Aspiration Hazard: 11.0

General Information: Kinematic viscosity <= 20.5 mm2/s.

The product contains small amounts of organic solvents. Extensive use of the product in areas with inadequate ventilation may result in the accumulation of hazardous vapour concentrations. Prolonged and repeated contact with solvents over a long period may lead to permanent health problems.

Inhalation: May cause inhalation hypersensitivity (occupational asthma) in sensitive individuals.

Ingestion: Harmful if swallowed. Ingestion may cause severe irritation of the mouth, the oesophagus and the gastrointestinal tract.

Skin Contact: Irritating to skin. May cause sensitisation by skin contact.

Eye Contact: Causes serious eye damage. Symptoms following overexposure may include the following: Pain. Profuse watering of the eyes. Redness.

Acute and Chronic Health Hazards: May cause sensitisation by skin contact. Delayed appearance of the complaints and development of hypersensitivity (difficulty breathing, coughing, asthma) are possible.

Route of Exposure: Inhalation Skin absorption. Ingestion. Skin and/or eye contact.

Medical Considerations: Skin disorders and allergies.

SECTION 12: ECOLOGICAL INFORMATION

Toxicity: Aquatic Chronic 2 - H411 Toxic to aquatic life with long lasting effects.

PBT Identification:

	XYLENE	2-METHYLPROPAN-1-OL	1-METHOXY-2-PROPANOL	TRIZINC BIS(ORTHOPHOSPHATE)
Acute toxicity - fish	LC_{50}, 96 hours: 1430 mg/l, Fish	LC_{50}, 96 hours: 1430 mg/l, Fish	Based on available data the classification criteria are not met.	LC_{50}, 96 hours: Oncorhynchus mykiss 0.14 - 0.26 Zn2+ mg/l, Fish
Acute toxicity - aquatic invertebrates	EC_{50}, 48 hours: 1100 mg/l, Daphnia magna	EC_{50}, 48 hours: 1100 mg/l, Daphnia magna	EC_{50}, 48 hours: 23300 mg/l, Daphnia magna	EC_{50}, 48 hours: Daphnia magna 0.04 - 0.86 Zn2+ mg/l, Daphnia magna
Acute toxicity - aquatic plants	IC_{50}, 72 hours: 3.2 mg/l, Algae	EC_{50}, 72 hours: 593 mg/l, Pseudokirchneriella subcapitata	EC_{50}, : >1000 mg/l, Algae	EC_{50}, 72 hours: 0.136 - 0.15 Zn2+ mg/l, Selenastrum capricornutum IC_{50}, 72 hours: Desmodesmus subspicatus <0.3 mg/l, Algae
Acute toxicity - microorganisms	/	IC_{50}, 16 hours: >1000 mg/l, Activated sludge	IC_{50}, 3 hours: >1000 mg/l, Activated sludge	
Results of PBT and vPvB assessment	This product does not contain any substances classified as PBT or vPvB.	/	/	This product does not contain any substances classified as PBT or vPvB.
Persistance and Degradability	The product is readily biodegradable.	/	/	/
Bioaccumulative Potential	No data available on bioaccumulation.	/	/	The product is not bioaccumulating.
Partition Coefficient	log Kow: 3.12 - 3.2	/	/	/

SECTION 13: DISPOSAL CONSIDERATIONS

General Information:	Avoid the spillage or runoff entering drains, sewers or watercourses. Waste should be treated as controlled waste. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority. When handling waste, the safety precautions applying to handling of the product should be considered. DO NOT reuse containers containing residual product without commercial cleaning.
Waste Class:	When this material, in its liquid state, as supplied, becomes a waste, it is categorised as a hazardous waste, with code 08 01 11* (EPOXY BASED LIQUID WASTE). Part-used containers, not drained and/or rigorously scraped out and containing residues of the supplied material, are categorised as hazardous waste, with code 08 01 11* (EPOXY BASED LIQUID WASTE). Ideally this component should be mixed with the appropriate hardener and allowed to react fully to produce a solid waste. Neutralised empty packages are categorised as non-hazardous waste, with code 15 01 02(plastic packaging) or 15 01 04 (metal packaging).

SECTION 14: TRANSPORT INFORMATION

General:	This product is packed in accordance with the Limited Quantity Provisions of CDGCPL2, ADR and IMDG.
UN Number:	1263
UN Proper Shipping Name:	PAINT OR PAINT RELATED MATERIAL
Transport Hazard Class:	3
Transport Labels:	
Packing Group:	III
Environmental Hazard/ Marine Pollutant:	Environmentally hazardous substance/marine pollutant
EmS:	F-E, S-E
Tunnel Restriction Code:	(D/E)

SECTION 15: REGULATORY INFORMATION

EU Legislation:	December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) (as amended). Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures (as amended). Commission Regulation (EU) No 2015/830 of 28 May 2015.

SECTION 16: OTHER INFORMATION

Abbreviations and acronyms used in safety data sheet:	ATE: Acute Toxicity Estimate. ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road. CAS: Chemical Abstracts Service. DNEL: Derived No Effect Level. GHS: Globally Harmonized System. IATA: International Air Transport Association. ICAO: Technical Instructions for the Safe Transport of Dangerous Goods by Air. IMDG: International Maritime Dangerous Goods. LD_{50}: Lethal Dose to 50% of a test population (Median Lethal Dose). PBT: Persistent, Bioaccumulative and Toxic substance. PNEC: Predicted No Effect Concentration. REACH: Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006. vPvB: Very Persistent and Very Bioaccumulative.
Classification abbreviations and acronyms:	EC_{50}: 50% of maximal Effective Concentration. Aquatic Acute = Hazardous to the aquatic environment (acute) Aquatic Chronic = Hazardous to the aquatic environment (chronic) Asp. Tox. = Aspiration hazard Eye Dam. = Serious eye damage Eye Irrit. = Eye irritation Resp. Sens. = Respiratory sensitisation Skin Corr. = Skin corrosion Skin Irrit. = Skin irritation Skin Sens. = Skin sensitisation STOT RE = Specific target organ toxicity-repeated exposure STOT SE = Specific target organ toxicity-single exposure
Training Advice:	Read and follow manufacturer's recommendations. Only trained personnel should use this material.
Revision Comments:	Issued in new format for Reach compliance in accordance with EC 1272/2008 Issued in

	accordance with Annex II to REACH, as amended by Commission Regulation (EU) No. 2015/830 Revisions to Sections (2),(3),(8),(15), and (16) - re-classification of resin components. Revision to sections 2, 8, 11 & 12 for reclassification of solvents.
Full Hazard Statements:	H226 Flammable liquid and vapour. H312 Harmful in contact with skin. H315 Causes skin irritation. H318 Causes serious eye damage. H332 Harmful if inhaled. H335 May cause respiratory irritation. 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.
Revision Date:	28/11/18

This information is correct to the best of our knowledge and belief at the date of publication however no guarantee is made to its accuracy. The information supplied in this Safety Data Sheet is designed only as guidance for the safe use, storage and handling of the product. This information is correct to the best of our knowledge and belief at the date of publication however no guarantee is made to its accuracy. This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any other process.

MATERIAL SAFETY DATA SHEET

ZP PRIMER – PART B

SECTION 1: IDENTIFICATION OF THE SUBSTANCE & THE COMPANY

Product Name:	ZP Primer – Part B
Company Name:	Polycote UK, Centre Point, Wolseley Road, Woburn Road Industrial Estate, Kempston, MK42 7EF
Telephone Number:	01234 846400

SECTION 2: HAZARDS IDENTIFICATION

Classification under CLP:	Flam. Liq. 3 - H226 Acute Tox. 4 - H312 Acute Tox. 4 - H332 Skin Irrit. 2 - H315 Eye Dam. 1 - H318
Most Important adverse effects:	The product contains a small amount of sensitising substance. May cause skin sensitisation or allergic reactions in sensitive individuals. Physicochemical When handled correctly, undamaged units represent no danger.
Hazard Pictograms:	
Signal Word:	Danger
Hazard Statements:	H312+H332 Harmful in contact with skin or if inhaled. H226 Flammable liquid and vapour. H315 Causes skin irritation. H318 Causes serious eye damage.
Precautionary Statements:	P102 Keep out of reach of children. P101 If medical advice is needed, have product container or label at hand. P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. P261 Avoid breathing vapour/ spray. P271 Use only outdoors or in a well-ventilated area. P273 Avoid release to the environment. P280 Wear protective gloves/ protective clothing/ eye protection/ face protection. P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower. P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P332+P313 If skin irritation occurs: Get medical advice/ attention. P337+P313 If eye irritation persists: Get medical advice/ attention. P501 Dispose of contents/ container in accordance with national regulations.
Contains:	XYLENE, 2-METHYLPROPAN-1-OL
Supplementary Precautionary Statements:	P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing. P370+P378 In case of fire: Use alcohol resistant foam, carbon dioxide or dry powder to extinguish. P403+P235 Store in a well-ventilated place. Keep cool.
PBT:	This product does not contain any substances classified as PBT or vPvB.

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

Chemical Name				
Index No	*EINECS*	*CAS No*	*Classification*	*Percentage %*
XYLENE				
-	215-535-7	1330-20-7	Flam. Liq. 3 - H226, Acute Tox. 4 - H312, Acute Tox. 4 - H332, Skin Irrit. 2 - H315	30-40%
2-METHYLPROPAN-1-OL				
-	201-148-0	78-83-1	Flam. Liq. 3 - H226 Skin Irrit. 2 - H315 Eye Dam. 1 - H318 STOT SE 3 - H335, H336	5-10%

SECTION 4: FIRST AID MEASURES

General Information:	Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Never give anything by mouth to an unconscious person.

Skin Contact:	Remove affected person from source of contamination. Rinse immediately with plenty of water. Remove contaminated clothing. Get medical attention if irritation persists after washing.
Eye Contact:	Rinse immediately with plenty of water. Remove any contact lenses and open eyelids wide apart. Continue to rinse for at least 15 minutes. Get medical attention immediately. Continue to rinse.
Ingestion:	Give a few small glasses of water or milk to drink. Never give anything by mouth to an unconscious person. Do not induce vomiting. Get medical attention if any discomfort continues.
Inhalation:	Remove affected person from source of contamination. Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Get medical attention if any discomfort continues. Place an unconscious person on their side in the recovery position and ensure breathing can take place.
Most important symptoms and effects:	Get medical attention promptly if symptoms occur after washing.
Notes for the Doctor:	No specific recommendations. If in doubt, get medical attention promptly.

SECTION 5: FIRE FIGHTING MEASURES

Extinguishing Media:	Use fire-extinguishing media suitable for the surrounding fire. Extinguish with the following media: Water spray, fog or mist. Foam, carbon dioxide or dry powder. Do not use water jet as an extinguisher, as this will spread the fire.
Exposure Hazards:	Toxic gases or vapours.
Advice for Firefighters:	Avoid breathing fire gases or vapours. Containers close to fire should be removed or cooled with water. Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions:	Avoid inhalation of vapours and contact with skin and eyes. Provide adequate ventilation. Wear protective clothing as described in Section 8 of this safety data sheet.
Environmental Precautions:	Avoid discharge into drains or watercourses or onto the ground. Contain spillage with sand, earth or other suitable non-combustible material. Spillages or uncontrolled discharges into watercourses must be reported immediately to the Environmental Agency or other appropriate regulatory body.
Methods for Cleaning Up:	Avoid the spillage or runoff entering drains, sewers or watercourses. Absorb in vermiculite, dry sand or earth and place into containers. Collect and place in suitable waste disposal containers and seal securely. For waste disposal, see Section 13.

SECTION 7: HANDLING & STORAGE

Usage Precautions:	Avoid inhalation of vapours. Avoid spilling. Avoid contact with skin and eyes. Do not eat, drink or smoke when using the product. Good personal hygiene procedures should be implemented. Wash hands and any other contaminated areas of the body with soap and water before leaving the work site. The Manual Handling Operations Regulations may apply to the handling of containers of this product. For products sold by weight refer to the guide net weight indicated on the container. Allowance will have to be made for the immediate packaging to give an approximate gross weight.
Storage Precautions:	Store in tightly closed original container in a dry, cool and well-ventilated place. Store in closed original container at temperatures between 5°C and 25°C. Protect from freezing and direct sunlight. Keep containers upright.
Specific End Use(s):	The identified uses for this product are detailed in Section 1.2. Usage description Collect and place in suitable waste disposal containers and seal securely. Label the containers containing waste and contaminated materials and remove from the area as soon as possible.

SECTION 8: EXPOSURE CONTROLS & PERSONAL PROTECTION

Occupational Exposure Limits:

XYLENE				
	Long-term exposure limit (8-hour TWA)		*Short-term exposure limit (15-minute)*	
	WEL 50 ppm	220 mg/m³	WEL 100 ppm	441 mg/m³
2-METHYLPROPAN-1-OL				
	WEL 50 ppm	154 mg/m³	WEL 75 ppm	231 mg/m³
1-METHOXY-2-PROPANOL				
	WEL 100 ppm	375 mg/m³	WEL 150 ppm	560 mg/m³
TRIZINC BIS(ORTHOPHOSPHATE)				
	-	10 mg/m³	-	-

XYLENE (CAS: 1330-20-7)		
DNEL	Consumer – Oral;	Long term systemic effects: 1.6 mg/kg/day
	Consumer - Dermal;	Long term systemic effects: 108 mg/kg/day
	Consumer - Inhalation;	Long term systemic effects: 14.8 mg/m³
	Industry - Dermal;	Long term systemic effects: 180 mg/kg/day

	Industry - Inhalation; Industry - Inhalation;	Long term systemic effects: 77 mg/m³ Short term local effects: 289 mg/m³
PNEC	Fresh water; Marine water; Intermittent release; Sediment (Freshwater); Sediment (Marinewater); Soil; STP;	0.327 mg/l 0.327 mg/l 0.327 mg/l 12.46 mg/kg 12.46 mg/kg 2.31 mg/kg 6.58 mg/kg
2-METHYLPROPAN-1-OL (CAS: 78-83-1)		
DNEL	Workers - Inhalation; Consumer - Inhalation;	Long term local effects: 310 mg/m³ Short term local effects: 55 mg/m³

(WEL = Workplace Exposure Limit)

Protective Equipment:

Appropriate Engineering Controls: Provide adequate ventilation. Avoid inhalation of vapours. Observe any occupational exposure limits for the product or ingredients.

Eye Protection: Eyewear complying with an approved standard should be worn if a risk assessment indicates eye contact is possible. The following protection should be worn: Chemical splash goggles.

Skin Protection: Wear appropriate clothing to prevent reasonably probable skin contact. To protect hands from chemicals, gloves should comply with European Standards EN388 and 374. As a general principle, exposure should be managed by means other than the provision of protective gloves.

Hygiene Measures: Use engineering controls to reduce air contamination to permissible exposure level. No specific hygiene procedures recommended but good personal hygiene practices should always be observed when working with chemical products.

Respiratory Protection: Respiratory protection may be required if excessive airborne contamination occurs. In case of inadequate ventilation or risk of inhalation of vapours, use suitable respiratory equipment with combination filter (type A2/P3).

SECTION 9: PHYSICAL & CHEMICAL PROPERTIES

Appearance:	Liquid
Colour:	Amber
Odour:	Amine
pH:	Technically not feasible.
Flash Point:	25°C Closed cup
Upper/lower flammability or explosive limits:	Lower flammable/explosive limit: 1.1 (xylene) g/100 g Upper flammable/explosive limit: 7.0 (xylene) g/100 g
Relative Density:	1.0 - 1.4 @ 20°C
Vapour Density:	Heavier than air
Solubility(ies):	Insoluble in water
Auto ignition temperature:	270 (Xylene)°C approx. 40% when mixed with activator
Viscosity:	1.0 - 3.0 (cone and Plate) P @ 25°C
Volatile organic compound:	EU: (cat A/j): 500 g/l 2010. This product contains a maximum VOC content of <500 (when mixed) g/litre.

SECTION 10: STABILTY & REACTIVITY

Reactivity:	There are no known reactivity hazards associated with this product.
Chemical Stability:	Stable at normal ambient temperatures and when used as recommended.
Materials to avoid:	Strong acids. Alkalis - inorganic. Amines. Mercaptans (thiols).
Haz. Decomp. Products:	Oxides of carbon. Thermal decomposition or combustion may liberate carbon oxides and other toxic gases or vapours.

SECTION 11: TOXOLOGICAL INFORMATION

Hazardous Ingredients:

	Xylene	**2-METHYLPROPAN-1-OL**
Acute Toxicity Oral (LD50mg/kg)	3,523.0	2,830.0
Acute Toxicity Dermal (LD50mg/kg)	1,100.0	2100.0
Species/Animal Data	Rat	Rat / Noncorrosive to skin

Serious Eye Damage/Irritation	Severely irritating to skin. Irritation of eyes is assumed. No testing is needed.	/
Respiratory Sensitisation	/	/
Skin Sensitisation	/	/
Carcinogenicity	/	/
Reproductive Toxicity/Fertility	/	/
Aspiration Hazard	Kinematic viscosity <= 20.5 mm2/s.	/
Inhalation	Harmful by inhalation	Irritating to respiratory system.
Ingestion	Pneumonia may be the result if vomited material containing solvents reaches the lungs.	/
Skin Contact	Harmful in contact with skin.	/
Eye Contact	May cause severe eye irritation.	May cause severe eye irritation.
Target Organs	Central nervous system Liver	/

ATE Dermal: 1,100.0

ATE Inhalation (vapours mg/l): 11.0

Aspiration Hazard: Kinematic viscosity <= 20.5 mm2/s.

General Information: The product contains small amounts of organic solvents. Extensive use of the product in areas with inadequate ventilation may result in the accumulation of hazardous vapour concentrations. Prolonged and repeated contact with solvents over a long period may lead to permanent health problems.

Inhalation: May cause inhalation hypersensitivity (occupational asthma) in sensitive individuals.

Ingestion: Harmful if swallowed. Ingestion may cause severe irritation of the mouth, the oesophagus and the gastrointestinal tract.

Skin Contact: Irritating to skin. May cause sensitisation by skin contact.

Eye Contact: Causes serious eye damage. Symptoms following overexposure may include the following: Pain. Profuse watering of the eyes. Redness.

Acute and Chronic Health Hazards: May cause sensitisation by skin contact. Delayed appearance of the complaints and development of hypersensitivity (difficulty breathing, coughing, asthma) are possible.

Route of Exposure: Inhalation Skin absorption. Ingestion. Skin and/or eye contact.

Medical Considerations: Skin disorders and allergies.

SECTION 12: ECOLOGICAL INFORMATION

Ecological Information on Ingredients:

	XYLENE	2-METHYLPROPAN-1-OL
Acute toxicity - fish	LC_{50}, 96 hours: 1430 mg/l, Fish	LC_{50}, 96 hours: 1430 mg/l, Fish
Acute toxicity - aquatic invertebrates	EC_{50}, 48 hours: 1100 mg/l, Daphnia magna	EC_{50}, 48 hours: 1100 mg/l, Daphnia magna
Acute toxicity - aquatic plants	IC_{50}, 72 hours: 3.2 mg/l, Algae	EC_{50}, 72 hours: 593 mg/l, Pseudokirchneriella subcapitata
Acute toxicity - microorganisms	/	IC_{50}, 16 hours: >1000 mg/l, Activated sludge
Results of PBT and vPvB assessment	This product does not contain any substances classified as PBT or vPvB.	/
Persistance and Degradability	The product is readily biodegradable.	/
Bioaccumulative Potential	No data available on bioaccumulation.	/
Partition Coefficient	log Kow: 3.12 - 3.2	/

SECTION 13: DISPOSAL CONSIDERATIONS

General Information: Avoid the spillage or runoff entering drains, sewers or watercourses. Waste should be treated as controlled waste. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority. When handling waste, the safety precautions applying to handling of the product should be considered. DO NOT reuse containers containing residual product without commercial cleaning.

Waste Class: When this material, in its liquid state, as supplied, becomes a waste, it is categorised as a hazardous waste, with code 08 01 11* (EPOXY BASED LIQUID WASTE). Part-used containers, not drained and/or rigorously scraped out and containing residues of the supplied material, are categorised as hazardous waste, with code 08 01 11* (EPOXY BASED LIQUID WASTE). Ideally this component should be mixed with the appropriate hardener and allowed to react fully to produce a solid waste. Neutralised empty packages, are categorised as non-hazardous waste, with code 15 01 02(plastic packaging) or 15 01 04 (metal packaging).

SECTION 14: TRANSPORT INFORMATION

General:	This product is packed in accordance with the Limited Quantity Provisions of CDGCPL2, ADR and IMDG.
UN Number:	1263
UN Proper Shipping Name:	PAINT OR PAINT RELATED MATERIAL
Transport Hazard Class:	3
Packing Group:	III
Environmental Hazard/ Marine Pollutant:	No
EmS:	F-E, S-E
Tunnel Restriction Code:	(D/E)

SECTION 15: REGULATORY INFORMATION

EU Legislation:	Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) (as amended). Regulation (EC) No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures (as amended). Commission Regulation (EU) No 2015/830 of 28 May 2015.

SECTION 16: OTHER INFORMATION

Abbreviations and acronyms used in the safety data sheet:	ATE: Acute Toxicity Estimate. ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road. CAS: Chemical Abstracts Service. DNEL: Derived No Effect Level. GHS: Globally Harmonized System. IATA: International Air Transport Association. ICAO: Technical Instructions for the Safe Transport of Dangerous Goods by Air. IMDG: International Maritime Dangerous Goods. LD_{50}: Lethal Dose to 50% of a test population (Median Lethal Dose). PBT: Persistent, Bioaccumulative and Toxic substance. PNEC: Predicted No Effect Concentration. REACH: Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006. vPvB: Very Persistent and Very Bioaccumulative.
Classification abbreviations and acronyms:	EC_{50}: 50% of maximal Effective Concentration. Aquatic Acute = Hazardous to the aquatic environment (acute) Aquatic Chronic = Hazardous to the aquatic environment (chronic) Asp. Tox. = Aspiration hazard Eye Dam. = Serious eye damage Eye Irrit. = Eye irritation Resp. Sens. = Respiratory sensitisation Skin Corr. = Skin corrosion Skin Irrit. = Skin irritation Skin Sens. = Skin sensitisation STOT RE = Specific target organ toxicity-repeated exposure STOT SE = Specific target organ toxicity-single exposure
Revision Comments:	Issued in new format for Reach compliance in accordance with EC 1272/2008 Issued in accordance with Annex II to REACH, as amended by Commission Regulation (EU) No. 2015/830 Revisions to Sections (2),(3),(8),(15), and (16) - re-classification of resin components. Revision to sections 2, 8, 11 & 12 for reclassification of solvents.
Hazard Statements in Full:	H226 Flammable liquid and vapour. H312 Harmful in contact with skin. H315 Causes skin irritation. H318 Causes serious eye damage. H332 Harmful if inhaled. H335 May cause respiratory irritation. H336 May cause drowsiness or dizziness.
Revision Date:	18/12/2018

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.