THE **LAB**° Chemicals & Coatings

Polyguard

TECHNICAL AND MATERIAL SAFETY DATA SHEET

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SUPPLIER IDENTIFICATION AND INFORMATION

Manufacturer name Address of manufacturing Tel number Email THE LAB Chemicals & Coatings 8 Garvin Circle, Strand, 7140 +27 84 507 1767 sales@thelabcc.co.za

1. Product identification

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Technical data sheet

DESCRIPTION

Polyguard is based on a twin pack polyurethane

resin, has been specially designed as a durable topcoat for Epoxy coatings. Polyguard comes in a clear topcoat and a limited colour range. UV Protection of external structures. It has excellent gloss retention, durability and chemical resistance. Can be applied as a clear varnish on wood.

FEATURES

- · High gloss.
- · Quick drying
- Very good water resistance
- Very good chemical resistance
- Good flexibility
- Excellent UV resistance

MIXING RATIO BASE : HARDENER		: 4:1
	- BASE	: 18°C
FLASH POINT	- HARDENER	: 30°C
SOLIDS BY VOLUME		: 51 + 2%
COVERAGE	- THEORETICAL	: 7-9 M²/Lt
	- TYPICAL	: 8-10 M²/Lt
FILM THICKNESS	- WET	: 60 - 100µ
TEMPERATURE RANGE	- OPERATING	: 10°C TO 35°
	- APPLICATION	: 0°C TO 40°C
OVERCOATING TIME		: 15°C - 8hrs / 30°C - 4hrs
FULL CURE		: 25°C / 5days
POT LIFE (25°C)		: 4 hrs reduced at high temp
CLEANING SOLVENTS		: Thinners
STORAGETEMPERATURE		: +5°C - 25°C
SHELF LIFE		: 24 Months

APPLICATION

The surface must be clean and dry. Surface contamination should be removed with detergents and fresh water cleaning. The product should be applied by airless spray or brush.

Nozzle : 15 -20 Mpa
Tip size : 0.33 - 0.46mm
Spray angle : 40 - 80°
Packaging (2 pack) : 5Lt & 20Lt

TYPICAL PAINT SYSTEM:

1 X 200µ DFT - Epoxycoat - Different Colours 1 x Strip Coat - Epoxycoat - Different Colours 1 x 200µ DFT - Epoxycoat - Different Colours

1 x 50µ DFT - Polyguard

CHEMICAL RESISTANCE CHART

2 hr spillage tests at 23°C

SURFACE CHANGES

Fresh water None petrol None motor oil None diesel None Softening mek xylene None Sea water None Caustic soda (20%) None Bleach None Dish Liquid None Brake Fluid None

SURFACE PREPARATION & PRIMING

Cement Surfaces

New floors should be allowed to dry for 4 to 5 weeks. Smooth floors should be acid etched with a 10% Hydrochloric Acid solution then rinsed well with water. Grease should be remove with a Ecowash Super, and then rinse with water. It is essential that the floor is clean, dry and etched. Prime with one coat Epoxy primer. Apply at approximately 10m²/litre then allow drying for 8 hours minimum and 48 hours maximum (at 23°C) before over coating with Polyguard. (If floor is not smooth apply one coat of epoxy coat or epoxy scraper coat)

Ferrous Metal

Remove rust, millscale, grease and any contaminants. The surface should be clean and dry. For the longest life sandblasting is the best method of preparation. Prime with Epoxy Silver Primer. Apply a thin film at approximately 4-6m²/litre then allow drying for 2 hours minimum and 6 hours maximum (at 23°C) before over coating with Polyguard

Galvanised Iron & Aluminium.

Wash with Greenwash until a water-break-free surface is obtained. Rinse galvanized iron with water and aluminium with Ecosolve. Prime with a Epoxy Primer. Apply a thin film at approximately 10m²/litre then allow to dry for 2 hours minimum and 6 hours maximum (at 23°C) before over coating with Polyguard

Wood

Sand down and fill all imperfections. The surface must be clean and dry. Apply Polyguard direct.

Fibreglass

Abrade surface with approximately 220 grit sandpaper. Wash down with detergent and rinse clean. Prime with one coat Epoxy Primer. Apply a thin film at approximately 12m²/litre then allow drying for 2 hours minimum and 6 hours maximum (at 23°C) before over coating with Polyguard.

Previously Painted

If the previous coating is a good quality Epoxy or Twin Pack Polyurethane paint it can be abraded with 100 to 220 grit sandpaper, then washed and allowed to dry. Other paints should be stripped to a bare surface and treated as new work.

Over coating

Can be over-coated with Polyurethanes within the specified time intervals after which it is necessary to abrade surfaces to a matt finish.

Cleaning

Clean equipment with Ecosolve whilst equipment is still wet.

Safety

Inhalation: Move to fresh air. In case of any discomfort seek medical attention immediately.

Skin : Drench with water. Remove contaminated clothing. Use a skin cleaner.

In severe cases refer to Doctor.

Eyes : Rinse immediately with plenty of water. Seek medical advice if symptoms persist.

Nash mouth with plenty of water. Do NOT induce vomiting, seek medical attention.

POLYGUARD POLYURETHANE TOPCOAT BASE

MATERIAL SAFETY DATA SHEET

Name: Polyguard Polyurethane Top Coat

Base Date Issued: 2017-01-05









SECTION 1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION

Name: Polyguard Polyurethane Top Coat

CAS no.: n/a EC no.: n/a

UN No.: 1263 Hazchem: 3[Y] SAPMA: 1-H-J

In emergency contact 084 507 1767

SECTION 2. COMPOSITION/INFORMATION ON INGREDIENTS

EC Classification: - T R11,20/21,38, S2,36/37,13,43A,45,51,,62

HAZARDOUS AND/OR OTHER RELEVANT COMPONENTS

POLYURETHANE RESIN >20%

[CAS #:] [E.C. #:]

EEC Labels: XN OEL 435mg OEL 100.ppm SUG S

XYLENE >20%

[CAS #: 1330-20-7] [E.C. #: 601-022-00-9]

EEC Labels: XN OEL 435mg OEL 100ppm STOEL 650.mg STOEL 150.ppm RL+ S

2-ETHOXY ETHYL ACETATE >0.5%

[CAS #: 111-15-9] [E.C. #: 607-037-00-7] EEC Labels : T OEL 54mg OEL 10ppm CL S

(CL/RL = Controlled/Recommended level 'S' = Skin annotation)

SECTION 3. HAZARDS IDENTIFICATION

SAPMA Health Rating: 1-MODERATE - Temporary or minor injury likely unless prompt action taken and treatment given

Inhalation: HARMFUL. Excessive exposure to this material must be avoided.

Skin: HARMFUL BY CONTACT.

Eyes: Highly Irritating and risk of irreversible damage. Ingestion: Harmful. May cause lung damage if swallowed.

Medium to long term environmental effects. Contain, collect & remove.

SECTION 4. FIRST AID MEASURES

Inhalation: Move to fresh air. In case of discomfort seek medical attention.

Skin: Use hand cleaner/soap & water. Remove contaminated clothing. If any discomfort get medical attention

Eyes: ACT FAST! Rinse immediately with plenty of water. Refer immediately to Doctor.

Ingestion: DO NOT INDUCE VOMITING. Get immediate medical attention.

SECTION 5. FIRE FIGHTING MEASURES

Flammable with toxic fumes.

Containers can burst in a fire. Can form explosive vapour/air mixture. Static discharge hazard! Foam. CO2. Dry powder. Fog to cool and control. Do NOT use water jets.

Cool containers in case of fire.

SECTION 6. ACCIDENTAL RELEASE MEASURES - SEE ALSO SECTIONS 5, 8, 13

Contain & collect. Use an inert - NOT sawdust. Keep out of drains & sewers.

SECTION 7. HANDLING AND STORAGE

No open flames. No smoking.

Keep containers cool. Avoid free fall of liquid - use earthing.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

SAPMA Rating: 1-H-J PPE: Full cover with hood

Inhalation: In case of insufficient ventilation, use suitable respiratory protection.

Skin: Avoid direct contact. Use barrier cream and impervious gloves.

Eyes: Use goggles. Avoid direct contact.

Ingestion: Observe the rules of hygiene. Wash before eating or drinking.

OEL Type: Mix- Mixture - See Section 2 Skin annotation



SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Chemical class: PAINT Description: Viscous liquid Smell: Pungent

Boil. pt (C): >35 FlashPoint (C): >23

SECTION 10. STABILITY AND REACTIVITY

Stable under normal conditions Could generate static - USE EARTHING Inert - no reaction with fire-fighting water

SECTION 11. TOXICOLOGICAL INFORMATION

No carcinogenic, mutagenic or genetic effects established.

SECTION 12. ECOLOGICAL INFORMATION

Medium to long term environmental effects. Contain, collect & remove.

SECTION 13. DISPOSAL INFORMATION

Hazardous. Use reputable waste disposal contractors. Destroy used containers.

SECTION 14. TRANSPORT INFORMATION

UN no: 1263 Packing group: III IMO Class: 3.3 Marine Pollutant Class: 1 Hazchem: 3[Y]







SECTION 15. REGULATORY INFORMATION

Classification: Flammable, F, Harmful, Xn.

R11- Highly Flammable

R20/21 - Harmful by inhalation and contact with the skin R65 - Harmful: May cause lung damage if swallowed.

R37 - Irritating to the respiratory system

S1/2 - Keep locked up and out of the reach of children. (Retail sales items)

S36/37 - Wear suitable protective clothing and gloves

S13 - Keep away from food, drink and animal feeding stuffs

S43A - In case of fire, use water fog, foam or powder - Do not use water jets!

S45 - In case of accident or if you feel unwell, seek medical advice immediately (show label where possible)

S51 - Use only in well ventilated areas

S62 - If swallowed, do not induce vomiting: seek medical advice immediately and show this container or label.



SECTION 16. OTHER INFORMATION

IN CASE OF ANY DISCOMFORT ALWAYS SEEK MEDICAL ADVICE. ALERT WORKERS TO THIS HAZARD POTENTIAL AND ENSURE PRECAUTIONS ARE TAKEN.

This MSDS conforms with General Administrative Regulations of 6 Sept.1996 (ISO-11014/ANSIZ400.1.1996) OELs derived from OHS Act Regulations for Dangerous Chemical Substances of 25 Aug.1995 (EH-42) SAPMA Rating - South African Paint Manufacturers Association Guide to Health Hazards (SABS ARP 006:1991) All information is given in good faith but without guarantee in respect of accuracy. No responsibility is accepted for errors or omissions or the consequences thereof.

POLYGUARD POLYURETHANE TOPCOAT **ACTIVATOR**

Name: Polyguard Polyurethane Topcoat Activator

Date Issued: 05/01/2017









SECTION 1. IDENTIFICATION OF THE SUBSTANCE/

PREPARATION Name : Polyguard Polyurethane TopCoat Activator

In emergency contact 084 507 1767

SECTION 2. COMPOSITION/INFORMATION ON INGREDIENTS

[- R10][Xn R20/21][Xn R42][,N R52/53]

EC Classification : - Xn N R10,20/21,42,52/53 S36/37,02,13,23,43A,46,51,56,59

HAZARDOUS AND/OR OTHER RELEVANT COMPONENTS

Toluene Disocyanate Prepolymer [CAS #: 26471-62-5] [E.C. #: 615-006-00-4] EEC Labels: T+ N STOEL 0.070mg CL S

XYLENE <12.5%

[CAS #: 1330-20-7] [E.C. #: 601-022-00-9]

EEC Labels: XN OEL 435mg OEL 100ppm STOEL 650.mg STOEL 150.ppm RL+ S

(CL/RL = Controlled/Recommended level 'S' = Skin annotation)

SECTION 3. HAZARDS IDENTIFICATION

SAPMA Health Rating: 2-MODERATE - Temporary or minor injury possible even if treatment given

Inhalation: Irritating and narcotic. Can affect CNS. Possible Sensitiser.

Skin: HARMFUL BY CONTACT.

Eyes: Highly Irritating and risk of irreversible damage.

Ingestion: Harmful if swallowed. Can affect CNS. Systemic poison.

No carcinogenic, mutagenic or genetic effects established May cause undesirable effects to aquatic organisms.

Inhalation Sensitiser

SECTION 4. FIRST AID MEASURES

Inhalation: Move to fresh air. In case of discomfort seek medical attention.

Skin: Use hand cleaner/soap & water, Remove contaminated clothing. If any discomfort get medical attention

Eyes: ACT FAST! Rinse immediately with plenty of water. Refer immediately to Doctor. Ingestion: Wash mouth with plenty of water. Do NOT induce vomiting. Seek medical advice.

SECTION 5. FIRE FIGHTING MEASURES

Flammable with toxic fumes.

Containers can burst in a fire. Can form explosive vapour/air mixture. Static discharge hazard!

Foam. CO2. Dry powder. Fog to cool and control. Do NOT use water jets.

Cool containers in case of fire.

SECTION 6. ACCIDENTAL RELEASE MEASURES - SEE ALSO SECTIONS 5, 8, 13

Contain & collect. Use an Inert NOT sawdust. Keep waste separate for disposal.

SECTION 7. HANDLING AND STORAGE

No open flames. No smoking.

Keep containers cool. Avoid free fall of liquid - use earthing.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

SAPMA Rating: 2-H-E PPE: Respirator and Eye protection

Inhalation: Use air supplied respirator or hood.

Skin: Avoid direct contact. Use barrier cream and impervious gloves.

Eyes: Use goggles. Avoid direct contact.

Ingestion: Observe the rules of hygiene. Wash before eating, drinking or smoking.

OEL Type: Mix- Mixture - See Section 2 Skin annotation

Inhalation Sensitiser









SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Chemical class: PAINT Description: Viscous liquid Smell: Pungent

Boil. pt (C): >35 FlashPoint (C): >23

SECTION 10. STABILITY AND REACTIVITY

Stable under normal conditions Could generate static - USE EARTHING Inert - no reaction with fire-fighting water

SECTION 11. TOXICOLOGICAL INFORMATION

No carcinogenic, mutagenic or genetic effects established

SECTION 12. ECOLOGICAL INFORMATION

May cause undesirable effects to aquatic organisms.

SECTION 13. DISPOSAL INFORMATION

Hazardous. Use reputable waste disposal contractors. Destroy used containers.

SECTION 14. TRANSPORT INFORMATION

UN no: 1263 Packing group: II IMO Class: 6.1

Hazchem: 3[Y]



SECTION 15. REGULATORY INFORMATION

EC no. : n/a Contains : TOLUENE DI-ISOCYANATE

EC Classification: - Xn N R10,20/21,42,52/53 S36/37,02,13,23,43A,46,51,56,59

R10 - Flammable

R20/21 - Harmful by inhalation and contact with the skin

R42 - May cause sensitisation by inhalation

R52/53 - Harmful to aquatic organisms, may cause long term adverse effects in the aquatic environment.

S36/37 - Wear suitable protective clothing and gloves

S2 - Keep out of reach of children. (Retail sales items)

S13 - Keep away from food, drink and animal feeding stuffs

S23 - Do not breathe gas/fumes/vapour/spray (SEE TEXT) (appropriate wording to be specified by the manufacturer)

S43A - In case of fire, use water fog, foam or powder - Do not use water jets!

S46 - If swallowed seek medical advice immediately and show this container or label

S51 - Use only in well ventilated areas

S56 - Do not discharge into drains or the environment, dispose to an authorised waste collection point

S59 - Refer to manufacturer/supplier for information on recovery/recycling





SECTION 16. OTHER INFORMATION

THIS SUBSTANCE IS A POTENTIAL SENSITISER - ENSURE PRECAUTIONS ARE TAKEN. IN CASE OF ANY DISCOMFORT ALWAYS SEEK MEDICAL ADVICE.

This MSDS conforms with General Administrative Regulations of 6 Sept.1996 (ISO-11014/ANSIZ400.1.1996) OELs derived from OHS Act Regulations for Dangerous Chemical Substances of 25 Aug. 1995 (EH-42) SAPMA Rating - South African Paint Manufacturers Association Guide to Health Hazards (SABS ARP 006:1991) All information is given in good faith but without guarantee in respect of accuracy. No responsibility is accepted for errors or omissions or the