

Polyguard PU

2 component UV stable, Polyurethane protective coating

CHARACTERISTICS

- ▶ Highly durable and UV stable
- ▶ Excellent abrasion resistance
- ▶ Good chemical resistance
- ▶ Can be applied to many different substrates and on cured epoxy systems
- ▶ Excellent glossy surface finish with different colors
- ▶ Easy to apply



DESCRIPTION

Polyguard PU is a 2 component UV stable polyurethane protective coating system. The coating provides a seamless chemical and abrasion resistant coating to cured epoxy systems, metal and concrete surfaces both internal and external.

FIELDS OF APPLICATION

Polyguard PU is designed as a protective and wear resistant coating for new and existing trafficked areas such as:

- sewage works / effluent treatment plants
- chemical processing areas.
- concrete floors / Factory ware houses.
- bridge and Culvert Decks
- swimming pool decks.
- jetties, harbors.
- stadiums, Balconies & Plant rooms.
- factory ware houses

APPLICATION INSTRUCTION

Surface preparation

Concrete surfaces:

The concrete surface to be coated must be clean, dry and free of laitance, oil, grease or any substance that may impair adhesion. Methods of substrate preparation includes, grit blasting, highpressure water jet cleaning, surface grinding etc. Weak or damaged concrete must be removed and repaired properly with Polyoxy nF.



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Priming

Prime the surface with Polyprime eP (Solvent free 100% solid epoxy primer @ 4-5 m²/kg) depending on the substrate condition.

Metal surfaces

Surface should be sand blasted or should be manually or mechanically sanded get a rust free finish. if necessary prime the surface with Polyprime ePS.

Fully cured epoxy surface

Clean the surface thoroughly, remove dust or any oil which is left on the surface and directly apply Polyguard PU.
noTe:-Primers should be completely dry before applying Polyguard PU.

Mixing

Mix both parts of Polyguard PU thoroughly for a few minutes to remove any sediment. Then add the contents of Part B to Part A and mix with a suitable paddle mixer fitted to a slow speed electric drill. The mixing is to be continued till a uniform and homogenous consistency is achieved.

Application

The material can be applied with a brush, roller. Apply the mixed material @ 120-150 micron WFT. if required a second coat can be applied at right angles to the first coat

at the same coverage rate. For getting an anti skid finish, broadcast Aggregate no. 8 @ 0.5-1.2 kg/m² on the wet primer. leave it for 24 hours and then when the primer has fully set, brush/vacuum away the excess aggregate from the surface. Apply the top coat as specified.

COVERAGE

Primer	4-5 m ² /L.
Aggregate no. 8	0.5 -1.2 kg. /m ²
Polyguard PU	4-5 m ² /L./coat.

SUPPLY

Primer	5L.
Aggregate no. 8	25 kg bag.
POLYGUARD PU	15L.

CLEANING

Clean all the tools with Polysolvent immediately after use. Hardened materials can be removed mechanically only.

STORAGE & SHELF LIFE

Store in a cool dry and shaded place. Protect from extreme weather conditions like storm & rain. The shelf life will be 6 Months out of contact with moisture at standard storage conditions.

HEALTH & SAFETY

As with all construction chemical products, caution should always be exercised. Protective clothing such as gloves and goggles should be worn. Treat any splashes to skin or eyes with fresh water immediately. Should any of the products be accidentally swallowed, do not induce vomiting, but call for medical assistance immediately.

TECHNICAL PROPERTIES

Pot life	30-40 min at 25° C
Density	1.2 g/cc
Solid content	65 %
Pendulum hardness	73 seconds
Abrasion resistance	50 mg (ASTM-D-4060) i0 n load, 1000 cycles, CS 10 roller
Touch dry	4 Hours at 25° C
Re-coatable	24 Hours
Full cure	7 Days
Color	Grey (other colors on request)
Resistance to	Dilute acids, alkalis, solvent, starch solution and milk.
Application thickness	120-150 microns WFT / Coat (i.e. 70 – 95 micron DFT/ Coat)
Coverage	6-8 m ² / L. depending on the surface finish.
Mix ratio	4:1 by vol. (Part A: Part B)
Application temperature	+10° C to + 45° C
Service temperature	-20° C to + 75° C

All values given are subject to 5-10% tolerance

Apart from the information given here it is also important to observe the relevant guidelines and regulations of various organisations and trade associations as well as the respective standards. The aforementioned characteristics are based on practical experience and applied testing. Warranted properties and possible uses which go beyond those warranted in this information sheet require our written confirmation. All data given was obtained at an ambient and material temperature of +23°C and 50 % relative air humidity at laboratory conditions unless specified otherwise. Please note that under other climatic conditions hardening can be accelerated or delayed.

The information contained herein, particularly recommendations for the handling and use of our products, is based on our professional experience. As materials and conditions may vary with each intended application, and thus are beyond our sphere of influence, we strongly recommend that in each case sufficient tests are conducted to check the suitability of our products for their intended use. Legal liability cannot be accepted on the basis of the contents of this data sheet or any verbal advice given, unless there is a case of wilful misconduct or gross negligence on our part. This technical data sheet supersedes all previous editions relevant to this product.