3014 Dauphine Street, Ste A, PMB 4847 New Orleans, LA 70117

PRIME 200-MF

Solventless Epoxy Coating

PRODUCT DESCRIPTION

Prime 200-MF is an environmental moisture tolerant barrier coating, speclally formulated for the protection of metalllc and non-metalllc surfaces. Prime 200-MF has been designed speclflcally for substrate temperatures ranging from 0 - 40°C (32°F - 104°F). Air temperature and humidity has negligible impact on application and cure.

APPLICATION AREAS

The system Is specifically designed for applicatlons where water, oil or algae contamination cannot be effectively removed Including splash zones, and Insulated Pipe.

PRODUCT INFORMATION

WORKING LIFE

Will vary according to temperature. At 20°C (68°F) the usable life of mixed material Is 45 minutes.

COVERAGE RATE

Applied at a thickness of 350µ (14mll), the theoretical coverage rate is 115 ft^2/gal per coat should be achieved. In practice many factors Influence the exact coverage rate achieved. Application at low temperatures will reduce coverage rates, On rough surfaces such as pitted steel the coverage rate achieved may be reduced by up to 20%.

DRYING INFORMATION

	10°C	15°C	25°C	35°C
Touch Dry [ISO 9117/3:2010]	24 hrs	12 hrs	8 hrs	5 hrs
Hard Dry [ISO 9117-1:2009]	36 hrs	24 hrs	18 hrs	8 hrs
Pot Life	no data	90 mins	60 mins	45 mins

BASE COMPONENT

Appearance	Viscous liquid
Color	Grey
Density	2.19 - 2.25 g/cm^3

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HARDENER (PT B)

Appearance	Thin liquid
Colour	Clear to Straw
Density	1.0 - 1.1 g/cm^3

MIXED PROPERTIES

Mixing Ratio by Weight (Base : Solldlfler)	1.75 : 1
Mixing Ratio by Volume (Base : Solldlfler)	2 : 1
Mixed Density	1.7 - 1.8 g/cm^3
Mixed Colour	Grey

TENSILE SHEAR

When tested In accordance with ASTM D1002, using mild steel substrates:

Clean and Dry	12.2 MPa (1770 psi)	Ground
	13.2 MPa (1920 psi)	Blasted
Underwater	10.6 MPa (1540 psi)	Ground
	7.5 MPa (1090 psi)	Blasted
Oil Contaminated	12.5 MPa (1810 psi)	Ground
	13.8 MPa (2010 psi)	Blasted

PULL OFF ADHESION

The Dolly Pull Off Strength on 10mm thick grit blasted mild steel, as determined In accordance with ASTM D4541 and ISO 4624, following a 7 day cure at 20°C/68°F, wlll typically be:

Clean and Dry	15.66 MPa
Wet	10.00 MPa
Seawater Immersion (4,200 HRS)	19.36 MPa
Cyclic Aging (4,200 HRS)	11.35 MPa
Concrete (Dry)	6.31 MPa
Concrete (Wet)	5.89 MPa

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When determined In accordance with ASTM D695, typical values will be:

	Compressive Strength	Proportional Limit	Youngs Modulus
68°F/20° C	20.4 MPa	8.9 MPa	2621 MPa
cure & test	2,962 psi	1,284 psi	0.38×10^5 psi
28 days at 68°F/20°C	77.4 MPa	29.5 MPa	759.3 MPa
cure & test	11,221 psi	4,272 psi	1.10×10^5 psi
212°F/100°C	90.5 MPa	59.9 MPa	1,303.7 MPa
cure & 68°F/20°C test	13,119 psi	8,692 psi	1.89×10^5 psi

When tested In accordance with ASTM DI49, method A, with voltage rise of 2kV/s, typical value wlll be:

Dielectric strength 30.9 kV/mm

ELONGATION & TENSILE PROPERTIES

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When determined in accordance with ASTM D638, typical values will be:

Tensile Strength (Maximum)	
13.12 MPa	7 days at 20°C (68° F)
15.16 MPa	28 days at 20°C (68° F)
22.81 MPa	7 days at 100°C (212° F)

Tensile Strength (Yield)	
3.72 MPa	7 days at 20°C (68° F)
3.76 MPa	28 days at 20°C (68° F)

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Elongation	
4.66 %	7 days at 20°C (68° F)
1.22 %	28 days at 20°C (68° F)
0.41 %	7 days at 100°C (212° F)

Young's Modulus	
1,307 MPa	7 days at 20°C (68° F)
2,012 MPa	28 days at 20°C (68° F)
4,401 MPa	7 days at 100°C (212° F)

FLEXURAL STRENGTH

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When tested to ASTM D790 typical values obtained are:

20.1 MPa	amblent cure

HARDNESS

HARDNESS

Shore D

The Shore D hardness of the material when tested to ASTM D2240 is typically:

76	68°F (20°C) cure

Barcol Hardness

The Barcol hardness, when determined in accordance with ASTM D2583, will typically be:

	Ambient cure	Post cure
	(68°F/20°C)	(212°F/100°C)
Barcol 935	62	81

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	HEAT RESISTANCE
WET HEAT RESISTANCE	Up to 40°C (104°F).
DRY HEAT RESISTANCE	-40°C (-40°F) — 180°C (356°F)

	SHELF LIFE
SHELF LIFE	Separate base and solidfier components shall have a shelf life of 3 years from date of manufacture when stored in their origincal unopened containers between 41°F (5°C) and 86°F (30°C).