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TECHNICAL DATA SHEET: **CORROCLAD IPR 70**

CORROCLAD

PRODUCT DESCRIPTION

CORROCLAD IPR 70 is a single component UV cured Isophthalic Polyester resins reinforced with chopped glass fibers and surfacing tissues. These materials are extensively used as a non metallic seamless cladding in the protection of all types of industrial insulation, mitigating problems associated with Corrosion Under Insulation (CUI).

PRODUCT FEATURES

- Low vapour permeability
- UV Curing – Single Component
- High temperature chemical resistance
- Excellent adhesion to a wide range of substrates
- High impact resistance
- High Fire Performance
- Ease of application
- Low maintenance

GENERAL PRODUCT INFORMATION

Appearance
Colour: Grey or off White

Mixing Ratio
Single Component: N/A

Roll Sizes
10 M x 1000 MM
10 M x 600 MM

Thickness
1.5 – 2.5 MM

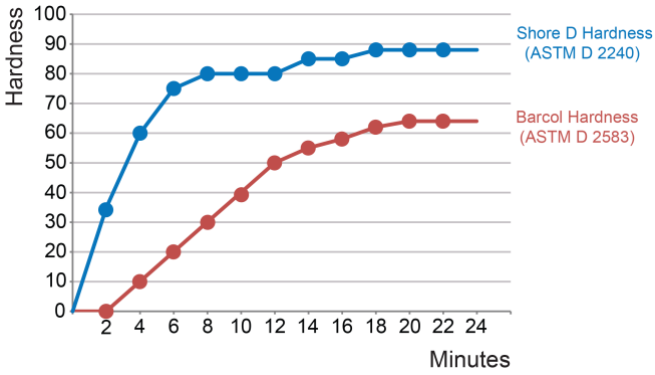
Solids content
100%

Curing Method
The Product cures with UV light in the wavelength 365 – 420 nm at temperatures between -15°C and +70^{0}C (5-158^{0}F). With the use of artificial UV lights the material has cured down to -30^{0}C.

Storage
The shelf life of the product is typically 12 months if unopened and stored in cool dry conditions below 25°C (77F°).

CURING

To determine material has fully cured use a Durometer to measure hardness. As a guide the following chart tracks hardness development against UV exposure.



INSPECTION

Corroclad IPR 70 can be inspected for pinholes and holidays using high voltage spark tester. Before use the material should be washed down with clear water to remove any contamination on the surface and allowed to dry. Typical voltage for testing should be 4kV. Please refer to the equipment manufacturers recommendations as voltages may vary with equipment type.

CHEMICAL RESISTANCE

Once fully cured the product resists attack by a wide variety of chemicals. The product is also resistant to mineral oils, lubricating oil and a wide range of hydrocarbons. For further information please refer to the chemical resistant chart or a technical representative.

TECHNICAL SUPPORT

Zoom Corrosion Technology offer complete technical support and assistance, from discussing application requirements to training approved local contractors. For further information please contact a CORROCLAD representative or your nearest CORROCLAD authorised dealer.

HEALTH AND SAFETY

Please refer to the product safety data sheet for detailed information on handling, storage, shipping and disposal.

TECHNICAL DATA SHEET:
CORROCLAD IPR 70

MECHANICAL PROPERTIES

Typical Physical Properties	Value	Method
Tensile Strength	71 MPa / 10,298 psi	ASTM D3039
Tensile Elongation at Break	1.25 %	ASTM D3039
Flexural Strength	143 MPa / 20,740 psi	ASTM D790-03
Compressive Strength	138 / 20015	ASTM D695
Impact Resistance (Izod)	57 KJ/m² / 27.12 ft-lb/in²	ASTM D256-06
Hardness	67 Barcol	ASTM D2583
Max Operating Temp	90 °C / 194°F	
Heat Distortion Temp	>255°C / 491°F	ASTM D648
Water Vapour Permeability	0.0058 g/(m²/h/mm/Hg) 0.0010 ** g/(m²/h/mm/Hg)	ASTM E96
ASTM E84 Flame Spread/Smoke Developed	15/50 Index	ASTM E84
NFP 92-501 Epiradiateur Test	M1 Index	NFP 92-501
Smoke Emissions	No Halogens - IMO pass	IMO Res MSC 61(67) Annex 1 Part 2
Spread of Flame	Class 0 IMO pass	BS 476 Part 6 and 7 IMO MSC 307 (88) Annex 1 part 5
UV stability testing	>90% Strength Retention >50% Gloss Retention	Florida outdoor (2 years) ASTM D5894 (2016hrs): *Strength retention only* ISO 20340 (4200hrs)

* Advice from Zoom Corrosion Technology should be requested if operating temperatures are expected above 70°C (158°F) to ensure that terminations are conservatively designed.

** Result in combination with a PAP / Mylar vapour barrier as used in cryogenic/cold insulation systems.

Corroclad products are manufactured for:
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