POLYWATER® POWERPATCH® SLOW CURE PASTE SEALANT

DESCRIPTION

The PowerPatch® Slow Cure Paste Sealant is a two-part resin system designed to make permanent repairs. The cured resin maintains a high level of adhesion and structural integrity in typical outside plant environments to ensure a quality leak repair.

USAGE

PowerPatch Slow Cure is a sealant designed to seal leaks on difficult-to-adhere surfaces under difficult conditions. The sealant bonds to polyethylene, lead, aluminum, ceramic and steel. In contrast to the original PowerPatch, PowerPatch Slow Cure provides an extended working time of 60 minutes as compared to 5 minutes for the original product. Resin volume in PowerPatch Slow Cure is much larger than that of original PowerPatch. PowerPatch Slow Cure is useful in applications over large areas and when extended working time is required.

COMPONENT PROPERTIES

	PART A	PART B
Chemical Description	Resin	Hardener
Appearance	Black paste	White paste
VOC	0 g/L	0 g/L
Specific Gravity	1.25	1.17
Shelf Life	24 months	15 months

TYPICAL PHYSICAL PROPERTIES

	METHOD	VALUE
Tensile Shear Strength (aluminum)	ASTM D1002	>1000 lb/in² (6.9 N/mm²)
Tensile Shear Strength (polyethylene)	ASTM D1002	155 lb/in² (1.1 N/mm²)
Flexural Strength	ASTM D790	8022 lb/in² (0.32 MPa)
Flexural Strain	ASTM D790	0.0106 in/in (0.0106 mm/mm)
Cured Hardness - Durometer	ASTM D2240	75 Shore D
Dielectric Breakdown	ASTM D149	520 Volts/Mil (20.5 kV/mm)

CHEMICAL RESISTANCE (ASTM D543, 7 DAYS/50ºC)

Cured samples of PowerPatch Slow Cure are weighed and then submerged in various solutes for 7 days and held at 50ºC. The surfaces of the samples are then dried, and the samples are reweighed to determine the % weight change due to the exposure to the solute.

SOLUTE	% WEIGHT CHANGE
Tap Water	1.0
1% Soap	1.3
5% Acetic Acid	6.3
3% Hypochlorite	0.2

ENVIRONMENTAL RESISTANCE

A hole 1/8” in diameter is drilled in a 2” duct of various materials. The hole is patched with PowerPatch Slow Cure following written instructions. The pipe is sealed and then subjected to increasing internal air pressure without leaking. The test is repeated following temperature cycling of 10 cycles from -22ºF to 200ºF (-30ºC to 93ºC).

PRESSURE TESTING	
Galvanized Steel	300 psi (2.07 MPa)
Polyethylene	80 psi (0.55 MPa)

APPLICATION PROPERTIES

	VALUE
Work Time	60 minutes (70ºF / 21ºC)
Functional Cure Time	24 hours (70ºF / 21ºC)
Application Temperature	45ºF to 120ºF (7ºC to 49ºC)
Service Temperature	-40ºF to 230ºF (-40ºC to 110ºC)
Color	Dark gray

CONTACT US

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