

Epoxy Ceramic Paste

Solvent free epoxy coating filled with ceramic particles

A two component, surface tolerant, solvent free, amine cured epoxy coating filled with ceramic particles, in paste form, for direct application onto steel, concrete & fibreglass surfaces.

Intended Uses:

A high performance, solvent free epoxy product that provides long term corrosion protection to steel & concrete in immersion conditions. Epoxy Ceramic Paste is also used as a seamless repair material for rigid polyurethane & epoxy systems.

Properties:

- Fast cure, touch dry in 2 hours.
- Designed to seal and protect new equipment exposed to erosion and corrosion.
- Protect pump casings, impeller blades, gate valves, water boxes and fan blades.
- Rebuild heat exchangers, tube sheets and other circulation water equipment.
- Excellent abrasion resistance.
- Produces a hard-slick surface.
- Resistant to cutting oils, petrol, dilute acids & alkalis.
- No primer required.
- Manufactured in accordance with SANS 1217 Type 1B Potable Water.

Technical Data:

Colour	White
Viscosity	Paste
Finish	Semi-gloss
Volume Solids	100%
Mix Ratio (Volume)	2 : 1
Activator	Epoxy Activator Ceramic Paste
Typical Film Thickness	500 – 5000µm DFT depending on system
Theoretical Coverage	1 m ² / Litre @ 1000µm DFT, allow for loss factors
Method of Application	Brush or putty knife
Number of Coats	Two coats should be applied to achieve typical DFT and a pinhole free coating.
Temperature Resistance	• Wet immersion - 65°C • Dry continuous - 80°C • Intermittent repairs - 105°C

Drying Information:

	10°C	20°C	30°C	40°C	50°C	60°C
Touch Dry	8 hrs	3 hrs	1 hr	45 min	30 min	-
Hard Dry	12 hrs	5 hrs	3 hrs	1.5 hrs	1 hr	-
Overcoating Data – See Limitations						
Substrate Temp.	10°C	20°C	30°C	40°C	50°C	60°C
Minimum	8 hrs	3 hrs	1 hr	45 min	30 min	-
Maximum	-	-	36 hrs	-	-	-

Note: A curing temperature below 10°C is not recommended, adequate ventilation should be maintained during application and curing.

Industrial & Protective: Steel & Concrete Protection - Immersion

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Whilst we endeavour to ensure that all advice we give about the product is correct, the information given in this data sheet is not intended to be exhaustive and any person using the product for any purpose other than that specifically recommended in this sheet without first obtaining written confirmation from us as to the suitability of the product for the intended purpose does so entirely at his own risk. As conditions of use, method of application and suitability of the substrate prior to painting are beyond our control, no guarantee is implied by the recommendations contained herein. We therefore do not accept any liability whatsoever or howsoever arising from the performance of this product or for any loss or damage arising out of the use of this product. The information contained in this sheet is liable to modification from time to time in the light of experience and ongoing product development programmes. It is the user's responsibility to ensure that this sheet is current prior to using the product

Issue Date:
01/05/2019

Certifications:

Epoxy Ceramic Paste Has the Following Approvals:

- SANS 1217:2011 – Conforms with the requirements for drinking water.

Consult A Specialized Coating Systems technical representative for details.

Systems & Compatibility:

Epoxy Ceramic Paste can be applied directly to correctly prepared bare steel.

Consult Specialized Coating Systems technical representative for coating system solutions.

Surface Preparation:

Abrasive Blast Cleaning and Mechanical Preparation

All surfaces to be coated must be dry, clean, and free from contamination. This product must only be applied to surfaces prepared by abrasive blast cleaning to SA 2½ in accordance with International Standard ISO 8501:2007 and SSPC-SP10. A sharp angular profile of 75 – 100 microns is recommended.

Concrete

Remove all dirt, oils, grease etc. and any loose material. All laitance should be removed by light abrasive blasting. Holes in concrete should be filled with an approved filler.

Application:

Mixing	Material is supplied in two containers as a kit. Always mix a complete kit in the quantities supplied. Once mixed the product should be used within the pot life specified. Stir the base component well with a flat-bottomed paddle or mechanical mixer until product is uniform. Continue stirring and add the entire contents of the activator container. Continue stirring until the mixture is homogeneous. Transfer the mixed contents to a clean container and continue to mix with a clean mixer to avoid any contamination by unmixed material. Ensure that sufficient material be mixed so that the product can be applied within its use-able life. The temperature of the mixed product should preferably be above 10°C.	
Mix Ratio	2 part(s) base : 1 part(s) activator by volume	
Pot Life	30 minutes at 20°C 25 minutes at 25°C 8 minutes at 50°C 4 minutes at 60°C 2 minutes at 70°C	
Brush	Recommended	
Putty Knife	Recommended	
Thinner	Not required	Temperature can be used to control viscosity
Cleaner	SA65 Thinner (For dry paint & equipment)	
Work Stoppage	Work strictly in accordance with the specified pot life of the material. Discard material after expiration of pot life. Thoroughly flush and clean all equipment with SA65 Thinner. Once the kit has gelled, recommence work with freshly mixed units.	
Clean Up	Clean all equipment immediately after use with SA65 Thinner .	

Industrial & Protective: Steel & Concrete Protection - Immersion

Environment:

	Surface Temperature	Ambient Temperature	Relative Humidity
Minimum	10°C*	10°C	No lower limit
Maximum	60°C**	45°C	100%

* Or 3°C above dew point

** Higher temperatures result in reduced sag resistance and faster cure.

Limitations:

- Unmixed material (in closed containers) should be maintained in protected storage in accordance with information given in the STORAGE section of this data sheet.
- Technical and application data herein is for the purpose of establishing a general guideline of the coating application procedures.
- Test performance results were obtained in a controlled laboratory environment and Specialized Coating Systems makes no claim that the exhibited published test results, or any other tests, accurately represent results found in all field environments. As application, environmental and design factors can vary, due care should be exercised in the selection and verification of the performance and use of the coating.
- This product will chalk on the surface when exposed to sunlight.

Pack Size:

- 1 & 5 Litre.
- 100 & 200ml squish packs.

Storage:

- Shelf Life: 18 months at 25°C from date of manufacture. Subject to inspection thereafter.
- Store in dry conditions out of direct sunlight, away from sources of heat or ignition.

Precautions:

For complete safety and handling information please refer to the appropriate Safety Data Sheets prior to using this product.