

CONCOAT EPT500

Solvent Free Epoxy Tar Protective Coating

Composition and Application Field

CONCOAT EPT500 is a high performance, two component, solvent free epoxy coal tar pitch extended reacting with curing agent to form a hard coating with excellent adhesion to certain metal, concrete, and granolithic screeds surfaces. It cures to form corrosion resistance a semi-gloss finish which is easily cleaned.

Advantages

- Hard wearing – durable.
- Low maintenance costs.
- High abrasion resistance.
- Provides hygienic.
- Excellent adhesion.
- Good chemical resistance.
- Protect against corrosion.
- Applicable to metal and concrete.

Surface Preparation

All surfaces should be clean, dry and free from dust and other contaminants. Wet substrates should be sponge dried to remove all surface water, then dried. Treat oil or grease contamination with degreaser followed by water or steam cleaning. The substrate must be free from any oils, greases. Concrete floors should be at least 28 days and have a moisture content of less than 5%. Excessive laitance should be removed by mechanical method. Dust and other debris should be removed by vacuum cleaning. **EPOMORTAR FC** two component fast curing epoxy mortar (Refer to TDS). Steel surface should be grit blasted in accordance with BS 4232 or SSPC - SP 5 then clean by **THINNERCOAT 10** (organic solvent) and kept to dry. Cleaned steel surface should be coated as soon as possible before the formation of rust.

Mixing

The entire contents of the hardener container should be poured into the base container and the two materials mixed thoroughly for at least 3 minutes. Use of heavy duty slow speed power drill with a jiffy mixing blade. Mix the two components in the quantities supplied taking care to ensure hardener container is scraped clean. Do not add solvent thinners at any time.

Application Method

CONCOAT EPT500 is recommended to apply in two coats. **CONCOAT EPT500** can be applied to prepared surface using airless spray, brush or roller. Ensure that the area is completely coated. The second coat can be applied after the first coat has initially dried (typically 12 to 18 hours at 35 °C).

Coverage

Coverage depends on the absorption of the substrate and the rate will be 5 m²/liter/coat.

Cleaning

Tools and equipment can be cleaned immediately by using **THINNERCOAT 10** (organic solvent).

Package

18 Liter pack including (base and hardener).

Technical Properties

Mixed Density	1.42 + 0.05
Volume Solids	100 %
ASTM D 2823	
Application Temperature	12°C to 45°C
Tack Free Time	3-4 hours at 35°C
Full Curing	7 days at 35°C
Pot Life	1 hour at 35 °C
Shore D Hardness	80
ASTM D 2240	
Pull – Off ASTM D 4541	2.5 N/mm ² (CF)
(On concrete)	2.5 N/mm ² (CF)
(On steel)	
Abrasion Resistance (ASTM D 1044, CS-17	100 cycles 5 -10 mg
Wheel 500 gm load)	500 cycles 35 - 45 mg
	1000 cycles < 90 mg
Flash Point	28°C

Chemical resistance to the following as per lab test:

Acids:	Alkalies:	Aqueous Salts:	Organic Solvents:
Acetic acid 12%	Amonia 12%	Sea water	Gasoline
Citric acid 1%	Calcium hydroxide 20%	Sewage water	Kerosine
Hydrochloric acid 10%	Sodium hydroxide 20%	Sodium chloride	White spirit
Nitric acid 10%		Sodium carbonate	Toluene
Phosphoric acid 10%			Diesel
Sulphuric acid 10%			

Storage and Shelf Life

Product should be stored at 25°C in dry conditions. 12 months in tightly closed container.

Health and Safety

Avoid contact with the skin and eyes. Wear suitable protective clothing such as overalls, goggles, dust mask and gloves. Use a barrier cream. Ensure that there is adequate ventilation in the area where the product is being applied. Do not breathe vapour or spray. MSDS is available on request for the safe handling of this product.

FIRST AID

Eyes: In the event of accidental splashes, flush eyes with warm water immediately and obtain medical advice.

Skin: Wash skin thoroughly with soap and water or approved industrial cleaner. DO NOT USE solvent or thinners.

Inhalation: Remove to fresh air, loosen collar and keep patient rested.

Ingestion: In case of accidental ingestion DO NOT INDUCE VOMITING. Obtain immediate medical attention