

PENTENS T-305TH

Cementitious Waterproofing Coating

Product Data Sheet

Description

PENTENS T-305TH is a cement based waterproofing coating incorporates 2 polymer components. Apply directly to concrete and mortar to prevent water infiltration.

Uses

PENTENS T-305TH can be used for positive and negative side waterproofing, sealing of hair line cracks and as a protective coating against aggressive chemicals such as carbon dioxide (eg. in concrete repair work), frost and de-icing agents. The areas of application are including:

- Potable water tanks
- Terraces and balconies
- RC gutters
- Bathroom floors and walls
- Basements
- Retaining walls
- Seawalls

Advantages

- Pre-batched and ready for used
- Mixes and applies easily
- Highly workability
- Good adhesion to sound substrates
- Impermeable
- Increased frost and salt resistance
- Resist carbon dioxide penetration
- Non-toxic
- Slightly flexible



Technical & Physical Data

Tensile Strength (kgf/cm ²) (ASTM D412 (Die C))	8.3
Elongation (%) (ASTM D412 (Die C))	24.30
Tear Strength (kgf/cm) (ASTM D624)	7.20
Hardness (Shore A) (ASTM D2240)	54
100% Modulus of Elasticity (kgf/cm ²) (ASTM D412 (Die C))	5.80
Shear Strength (kgf/cm ²) (ASTM D1002)	4.70
Water Vapor Transmission of Material i. WVT (g/hxm ²)(23°C, 50% RH) - ASTM E96	37
ii. Permeance (g/sxm ² xPa) – Method B	1.98 x 10 ⁻⁵
Abrasive Test (g) – Taber CS-17, 1000g, 1000 Cycles (ASTM C501)	0.043
Puncture (kgf)	9
Compressive strength @ 28 days (n/mm ²) (ASTM E154)	>40
Pot life	30min at 30°C and will be shortened at higher temperatures
Shelf life	6 months when unopened
Storage condition	Store in a dry cool place
Packaging	A: 10kg/pail B: 25kg/bag

Important Notes

1. Minimum ambient and substrate temperature is 5°C.
2. Never apply more than 5 kg/m² of PENTENS T-305TH in one single layer.
3. Apply only to clean, sound substrates – surfaces should be well dampened but free of surface water and leaks.

Instruction for Use

Surface Preparation

Surfaces must be clean, free from grease, oil and loosely adhering particles. All surfaces must be as flat and level as possible.

Absorbent surfaces have to be thoroughly saturated with water prior to application of first coat of PENTENS T-305TH. However, no loose standing water should be on the surface before application.

Mixing

Under normal circumstances, when the full quantities of both components are mixed together, a consistent mortar will result. Mixing shall be carried out in a clean container by gradually adding the powder component to the liquid component and stirring with slow speed mixer. Use mixture within 30 minutes. 1 set of PENTENS T-305TH can be added <1kg of water for smooth application.

Coverage

- Bathrooms, terraces and balconies: 2.0kg/m²/two coats.
- For waterproofing coating up to 1m water head: 3.0kg/m²/three coats.
- For waterproofing coating more than 1m water head: 4.0kg/m²/four coats

NOTE:

- PENTENS T-305TH must be applied in minimum 2 coats.
- More coats may be required in areas of extremely high infiltration.

Application

Dilute 1 portion of PENTENS T-007 permeable primer or 1 portion of PENTENS T-305TH with 3 portions of clean water and then plaster directly to the surface to be waterproofed, in order to improve the bonding.

Apply or plaster first and finish coat of PENTENS T-305TH to construction surface by using brush, roller or spray method. The time interval between coats shall be 4 – 8 hours, and make sure that the first layer of plastering has been dried and formed as membrane.

Over coating

After the primer, PENTENS T-305TH can be applying directly provided with areas exposed hot drying winds. For indoor areas, it is recommended that allow approximately 30 minutes after the primer.

For over coating with cementitious materials, allow the second coat to harden for at least 1 day prior to over coating.

For more details, please refer to our Technical Department.

Curing

For optimum performance, PENTENS T-305TH should be allowed to cure for 24 hours before the finishing concrete, tiles etc and during this time precautions must be taken in order to prevent damaging to the coating.

Cleaning

Tools and equipment just can be clean with clean water immediately, after use. Hardener material can only be mechanically removed.

Safety

As cement is alkaline and may cause irritation, applicators are recommended to wear gloves and goggles when using PENTENS T-305TH. In case contact with eyes, flush immediately with clean water and seek medical assistance if symptoms persist.