

SHIELDCOTE 150



EXCELLENT CHEMICAL AND MECHANICAL RESISTANCE COATING

Shieldcote 150 | May, 2020 | Review 01

DESCRIPTION

SHIELDCOTE 150 is a monolithic anticorrosive coating composed of epoxy vinyl ester resin plus curing agent (components A + B) and a mix of inert mineral fillers (component C). After mixing (components A + B + C), they form a polymeric mortar with excellent chemical and mechanical resistance. Applied in one or more layers without fiberglass reinforcement. Product with three applicable components and cold curable.

APPLICATIONS

For anticorrosive protection of concrete structures in areas of constant washing and severe chemical attacks, floors in areas under forklift traffic and constant loading and unloading. Recommended for applications in channels, pump and tank bases, containment dikes, industrial structures, tanks, vessels and filters for process or storage.

It is used as a Base Layer in the Glass Shield 325 system coatings for concrete and steel substrates.

The Base Layer prevents shear stresses that can occur in the interface between coating and substrate. The base leveling layer also has the function of leveling substrate irregularities and rounding sharp corners. It can be applied using steel trowels and spatulas with an average thickness of 1.5 mm.

BENEFITS

- ✓ Fast application;
- ✓ Monolithic coating;
- ✓ Low shrinkage during curing;
- ✓ Good mechanical and abrasion resistance;
- ✓ Excellent resistance to a wide range of chemical exposures;
- ✓ Coefficient of thermal expansion like steel and concrete;
- ✓ Withstands high temperatures, total immersion up to 90°C, vapors and spills up to 120°C.

FORNECIMENTO

EMBALAGEM	
Shieldcote 150 Liquid – Part A	5.0 Kg Gallon
Shieldcote 150 Aggregate – Part C	9.0 Kg Bag
Shieldcote 150 Liquid – Part A	25 Kg Bucket
Shieldcote 150 Aggregate – Part C	22.5 Kg bag
Catalyzer MEKP LPT – Part B	1.00 Kg PEAD Gallon
Straightening 01	3.6 L Gallon 18 L Bucket
LP solvent - Cleaning solvent	5 L and 18 L Steel Can

PROPERTIES AT 25° C

Chemical basis	Bisphenol A Vinyl Ester Resins
Aggregate	Chemically inert mineral fillers
Specific mass (A + B + C)	2.05 g/cm ³
Color	Gray, white and green
Thickness	1 to 4.5 mm
Brookfield viscosity 25 ° C component A	9,000 - 11,000 cPs
Gel Time at 25 ° C	25 - 35 minutes
Tensile strength	14.5 MPa
Compressive strength	77.18 MPa
Barcol Hardness	60
Thermal expansion coefficient	12 – 15 x 10 ⁻⁶ mm/mm/°C
Abrasion resistance	Taber coefficient 40 (Disc C 517 – 5,000 cycles – 1,000g)

INSTRUCTIONS FOR USE

MIXING PROPORTION – 100 : 2 : 180

COMPONENT	WEIGHT RATIO	VOLUME RATIO
Shieldcote 150 Liquid – Part A	1.25 kg	1.00 liter
Catalyzer MEK-P – Part B	0.02 kg	15 ml
Shieldcote 150 Aggregate – Part C	2.25 Kg	1.90 liter

CONSUMPTION – MIX (A + B + C)

✓ 3.50 kg/m² for layer of 1.50 mm

COMPONENT	CONSUMPTION - KG/M ²
Shieldcote 150 Liquid – Part A	1.25
Catalyzer MEK-P – Part B	15 ml / kg of Part A
Shieldcote 150 Aggregate – Part C	2.5

RANGE BETWEEN LAYERS AND CURE

Minimum Interval between layers	4 horas
Maximum Interval between layers	48 horas
Total Cure	5 - 7 days at 25°C

Observing the primer overcoating interval, a layer of Shieldcote 150 Base Layer is applied in a thickness of 1.5 mm, reaching a practical consumption of the mixture of 3.50 kg/m².

The consumption of the Base Layer may change depending on the type and state of the substrate to be protected, the type of resin used, temperature at the application site, type of tool used and the skill and experience of the applicator.

For protective monolithic coatings, one, two or three layers of Shieldcote 150 can be applied in the desired thickness of 1 to 4.5 mm, reaching a consumption of 3.50 kg / m² of the mixture for each 1.5 mm of the coating thickness.

HOW TO APPLY

Shieldcote 150 is applied with a steel trowel, trowel, and spatula in a single layer as the Base Layer of Glass Shield 325 coatings. It can be applied in one, two or three layers as an anti-corrosion protection coating.

1. Homogenize the part A resin, before use, using helical propeller with low speed mechanical agitation.
2. Add Part B to Part A, respecting the product's mixing ratio, stir mechanically at low speed.
3. Gradually add Part C, in mixture A + B, keeping the stirring constant.
4. Mix perfectly with a low speed mechanical stirrer with helical coupled helix to avoid incorporation of air and obtain a homogeneous mass of the Parts A + B + C.
5. Apply the polymeric mortar using steel trowels, spatulas and brushes on the surface prepared and covered by the appropriate Epoprimer, respecting the thickness specified for the base layer of the coating.
6. Do not dilute the Part A resin.
7. Do not heat Parts A and B.
8. If the product is used as a protective coating, a layer of Glass Flake 421 D coating can be applied as Topcoat in abrasive environments and in the presence of extremely aggressive chemicals.

CLEANLINESS

Immediately after application, Shieldcote can be removed from tools and equipment using Solvent LP or Solvent EP. The product after hardening will only be removed mechanically.

STORAGE

Keeping the Shieldcote 150 in a dry place and in the original sealed packaging, protected from the sun and other heat sources, Shelf Life at 25°C is 3 months.

SAFETY

HEALTH AND SAFETY AT WORK

Avoid all contact with skin or eye. The environment during the application should be well ventilated to reduce inhalation of vapors. Workers should wear adequate breathing apparatus in confined spaces. Open flames, welding operations and any other spark inducing activity are not permitted near the work area. Smoking should not be allowed.

Some people are sensitive to contact with resins, catalysts and solvents. To avoid discomfort all workers should wear gloves and goggles at all time when there is a possibility of spillage or any other contact with these products. The use of protective creams is encouraged as added protection. Over sensitive personnel showing any sign of discomfort should be removed from the work area.

Resin spillage / drippings on the skin can be removed with soap and water. In case of contact with the eye, wash thoroughly for 15 minutes with clean water and get medical help. Medical assistance is required in case of accidental ingestion. Do not induce vomiting.

ADDITIONAL INFORMATION

Wolftank produces and sells a large variety of products designed to protect steel or concrete substrates against corrosion. Our product line includes coatings and linings, special paints, and products used in surface treatment.

We also carry a complete line of auxiliary products like grouts, anchoring systems, carbon fibers and a complete system solution to the problem of the structural rehabilitation of steel or concrete structures.

Please call us for further information about our products, tutorial videos and technical brochures.



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