



LOGICBASE V-ST

Non-reinforced PVC membrane used as the second layer in double-layer PVC waterproofing systems with vacuum quality control

Product description

LOGICBASE V-ST is a special non-reinforced PVC membrane, which is used for waterproofing tunnels, foundations, underground parts of buildings and structures as the second layer in double-layer PVC waterproofing systems with vacuum quality control. It is also used as a protective layer of the waterproofing PVC system.

The material is produced by co-extrusion on a base of premium quality plasticized polyvinyl chloride (PVC-P). A specially textured surface of the material prevents two membranes of a double-layer waterproofing system from sticking together during the vacuum quality control.



Performance of works

LOGICBASE V-ST membrane is installed onto LOGICBASE V-SL membrane with textured surface downwards. Overlap seams are welded by hot air welding equipment. Then two layers are welded along the perimeter forming a waterproof compartment of up to 150 m². Upon welding of two waterproofing layers, holes are made in the upper (LOGICBASE V-ST) membrane in order to weld flanges and connect hoses for vacuum quality control. Contact with all materials containing bitumen or solvents should be avoided. Direct contact with polymeric materials made of polystyrene (EPS, XPS) is not allowed.

During the vacuum test, the air is pumped out from the waterproof compartment (space between two layers) through connected hoses and the vacuum level is measured. The textured surface of LOGICBASE V-ST membrane prevents layers from sticking together during the test. The tightness criterion is the preservation of vacuum in the cell within 5 minutes. In the absence of tightness, the damages are detected and eliminated. If necessary, the waterproofing layer repair is carried out by means of injections of special repair compound through connected hoses. After polymerization, the repair compound restores the tightness of the waterproofing layer.

Storage

Rolls of synthetic membranes are delivered on pallets. Every roll is packed in the additional individual pack. Rolls should be stored lying down on pallets fully protected from moisture with clean canvas tarpaulins. Keep the minimum distance of 1 m from any source of heat. Shelf life if all storage requirements are met: 18 months from the date of production.

Main characteristics

Properties	Performance	Test method
Thickness, mm	1.6 (-5/+10%)	EN 1849-2
Mass per unit area, kg/m ²	1.9	EN 1849-2
Length × width, m	20 × 2.05	EN 1848-2
Tensile strength L / T, MPa	≥14 / ≥11	EN 12311-2
Elongation, %	≥300	EN 12311-2
Tear resistance, N	≥150	EN 12310-2
Resistance to static load, kg	≥20	EN 12730 B
Resistance to impact on rigid / soft base, mm	≥700 / ≥1000	EN 12691
Peel resistance of joints, N/50 mm	≥300	EN 12316-2
Shear resistance of joints, N/50 mm	≥700	EN 12317-2
Foldability at low temperature, °C	≤-30	EN 495-5
Watertightness during 24 h at a pressure of 60 kPa	Pass	EN 1928-2 B