Biplas PL 4/200

APP high performance membrane polyester reinforced - Plain

PRODUCT

Biplas PL 4/200 is a high performance roofing and waterproofing membrane, reinforced with a core of non woven polyester of 200g/m² nominal weight, suitable for a variety of applications among them; roofs, terraces, foundations, basements, pile capping, footing, tanking, car parks, bridge decks and abutments, tank lining, swimming pools, airport aprons, ramp areas and others.

SPECIAL FEATURES

- · Positive barrier to water and dampness.
- · Excellent resistance to ageing and atmospheric agents.
- · Remains flexible at low temperatures.
- · Maintains shape stability at high temperatures.
- · Accommodates structural movements.
- Withstands thermal shock and can be left exposed if coated with a reflective coat.
- · Can be provided with a lap line.
- May be torched directly over old shingles or old bituminous membranes.
- The top surface is covered with either fine sand (SAND) or a thin Polyethylene film (PBS). The bottom surface is covered with a thin easy torched poly-Ethylene film (a sand bottom is also available on request).
- · Resistant to water-borne chemical attack.

COATING MIXTURE OF THE MEMBRANE

The waterproofing capability is provided by the coating mix of the SODAMCO membrane. The reinforcement made of nominal 200gm/m² non-woven polyester mat is impregnated with this mix and then coated to factory regulated thickness. The mix is made up of bitumen, heavily modified with Amorphous Poly-olefins, thermoplasticresins and stabilizers giving the membrane its excellent resistance to atmospheric agents and ageing, maintaining shape stability at high temperatures, improving adhesion strength and making the membrane easy to apply saving on time and labor.

INSTRUCTIONS FOR USE

The application of **Biplas PL 4/200** is both easy and quick. For applications on concrete, tiles or any other porous surface, coat the substrate with **weberdry prime SB** (solvent based bituminous primer according to ASTM D 4I) at the rate of $4-5m^2$ / litre.

Allow this coating to dry thoroughly. In time of high humidity we recommend it should be left overnight.

The **Biplas PL 4/200** should first be unrolled and positioned correctly. Each roll should overlap the adjacent roll by 10 cm. Once the roll has been positioned correctly, the membrane should be rolled up again, taking care not to change its



orientation. Using left to right movements, heat the lower surface of the membrane with a propane gas torch. This will cause slight surface melting and the molten bitumen will adhere to the surface. You then torch on the side overlap to the recommended size of 100 mm. Continue the above method for consecutive rolls remembering end-laps must be minimum 200 mm. Inspection of lap joints must be carried out to ensure total adhesion.

TOOLS & EQUIPMENT

The application of the SODAMCO membrane requires very limited tools like propane gas torches and cylinder, a knife for cutting the membranes to size and a trowel with rounded end. Various torch heads are sold separately by SODAMCO on request.



Biplas PL 4/200

CHARACTERISTICS

SODAMCO products are tested at random intervals by independent laboratories to international standards and the results of these tests are available on request. In addition, each batch manufactured is subject to strict quality control procedures to ensure it meets appropriate and applicable standards and/or norms.

ASTM		Procedure	Units	Tolerance	Value
Length			m	< -1%	10
Width			m	< -1%	1
Thickness		ASTM D5147	mm	-0.2mm	4.00
Tensile properties: max. tensile force - long - trans		ASTM D5147	N/50mm	±20%	960
		ASTM D5147	N/50mm	±20%	700
Tensile properties: elongation	- long	ASTM D5147	%	±15	45
	- trans	ASTM D5147	%	±15	50
Resistance to tearing	- long	ASTM D5147	N	min	625
	- trans	ASTM D5147	Ν	min	425
Lap joint strength	- long	ASTM D5147	N/5mm	±20%	960
	- trans	ASTM D5147	N/5mm	±20%	860
Low temperature flexibility*			С	min	0
Dimensional stability at +80 °C	- long	ASTM D5147	%	mlv	-0.5
	- trans	ASTM D5147	%	mlv	-0.5
Water Absorption		ASTM D5147	%	mlv	<0.15
CE					
Visible defects		EN 1850-1	Nº/m2	0	0
Length		EN 1848-1	m	< -1%	10
Width		EN 1848-1	m	< -1%	1
Straightness		EN 1848-1	mm	< 20mm	pass
Mass per unit area		EN 1849-1	kg/m2	± 10%	4.70
Thickness		EN 1849-1	mm	-0.2mm	4.00
Watertightness to liquid Water		EN 1928-1	mlv	> 60kPa	pass
Tensile properties: max. tensile force - long		EN 12311-1	N/5cm	±20%	960
	- trans	EN 12311-1	N/5cm	±20%	700
Tensile properties: elongation	- long	EN 12311-1	%	±15	45
	- trans	EN 12311-1	%	±15	50
Resistance to tearing (nail shank)	- long	EN 12310-1	N	min	220
	- trans	EN 12310-1	Ν	min	240
Shear resistance of joint	- long	EN 12317-1	N/5cm	±20%	960
	- trans	EN 12317-1	N/5cm	±20%	860
Resistance to static loading (method A)		EN 12730	kg	min	20
Resistance to impact		EN 12691	mm	mlv	>700
Flexibility at low temperature*		EN 1109	С	min	0
Dimensional Stability	- long	EN1107-1	%	max	-0.5
Flow Resistance less than 2mm		EN1110	С	mlv	100
Reaction to fire		EN 13501-1		Euroclass	F
Cold bending		UEATC	°C		-]
Form stability		UEATc	°C		110
Water pressure resistance		DIN 16935	KPa		> 400
Softening point R&B		ASTM D-36	°C		157
DWON penetration @ 25 °C		ASTM D-5	dmm		19

^{*} Different cold flexibility values can be supplied to special order.



Biplas PL 4/200

DISCLAIMER

While the company guarantees its products against defective materials, the use and application of these products are made without guarantee since the conditions of their application are beyond its control. It is recommended to verify with the company that the product is suitable for the intended use, and that this Data Sheet version is the latest one. The company may modify it without prior notice. Technical characteristics are listed for guidance only. For more information, please contact the company's office in your location.

NOTE

The information included on this Technical Data Sheet is the sole property of Saint-Gobain Middle East Holding SAL (previously SODAMCO Holding). The unauthorized disclosure, use, dissemination or copying (either whole or partial) of this data sheet or any information it contains, is prohibited and subject to legal pursuit.

PG:29

