GECO®
WATERPROOFING SYSTEMS

GECOSELF T.A.

Heat activated waterproofing membrane

DESCRIPTION

GECOSELF T.A. range of membranes has been formulated with an heat activated compound to grant an efficient and easy loose laid application either for warm roofs or cold roofs. The compound is made of distilled bitumen and special synthesis polymers, which provides thermal adhesion properties to the lower waterproofing compound. The waterproofing compound of the upper face allows a fast heat transmission to the lower face to grant a perfect adhesion to any support. The heat activated waterproofing compound allows the product to be repositioned during the application and does not need to be torched as the traditional felts and it is particularly indicated for those surfaces where the use of naked flame is not allowed. The V version has a rot proof fiberglass reinforcement with very high dimensional stability; while the P version has a rot proof composite woven non woven single strand polyester, with high mechanical characteristics. The upper face is protected with a polyethylene film, while the lower part is provided with a thermoplastic removable film.

FIELDS OF USE

GECOSELF T.A. is used with success as a waterproofing layer under clay roof tiles and can be used in a wide range of both civil and industrial works. It is particularly indicated for all those areas of application where the use of open flame is not advised (ex. Polystyrene insulation & wooden decks). Use protective devices required by law. GECOSELF T.A. V & P can be used as a vapour shield or, in multi-layer systems, as the first layer. Due to the particular thermal activated waterproofing compound, during the application of the second layer by torch or hot air gun, GECOSELF T.A. V & P develop their adhesive properties and adhere to the substrate.

Technical Characteristics	Measure units	Reference norm	P	PA	V	Tolerance
Type of reinforcement			Polyester		Fiberglass	
Upper face finish			Polypropylene mat / PE film	Mineral*	PE film	
Lower face finish			Silicon release film			
Length	m	EN 1848-1	10 -1%			
Width	m	EN 1848-1	1 -1%			
Thickness	mm	EN 1849-1	2,5		2,5	±5%
Mass	kg/m^2	EN 1849-1		4,0		±10%
Cold flexibility	°C	EN 1109	NPD			
Cold flexibility after ageing	°C	EN 1296 EN 1109		NPD		
Tensile strength L/T	N/5 cm	EN 12311-1	400/300		300/200	-20%
Elongation at break L/T	%	EN 12311-1	35/35		2/2	-15 -2
Nail tear strength L/T	N	EN 12310-1	120/120		NPD	-30%
Static puncture resistance	kg	EN 12730	10		-	
Dynamic puncture resistance	mm	EN 12691-B	700		-	
Dimensional stability	%	EN 1107-1	-0,3		NPD	
Loss of mineral	%	EN 12039		30		
Fire resistance		EN 13501-5	F ROOF			
Fire reaction		EN 13501-1	F			
Watertightness	kPa	EN 1928	60			
Watertightness after ageing	kPa	EN 1296	60			
Water vapour permeability	μ	EN 1931	20000			

* Mineral self-protected products may undergo color tone variations due to the time and length of storage. Exposure to atmospheric conditions, after application, will tend to uniform the color after a few months. The change in color tone cannot therefore be contested and / or complained of as it is a natural phenomenon that the slate manufacturer himself cannot guarantee.
NPD = No Performance Declared in accordance with the EU Construction Products Directive.

GECO WATERPROOFING SYSTEMS

APPLICATION

- On cementitious surfaces and similar apply, by roller or airless, bituminous primer, approx. consumption 300 g/m^2. The operation is not necessary on wooden decks.
- Position GECOSELF T.A. on the application surface.
- Remove a portion of the release film and adhere that area to the surface by means of torch or hot air, the same procedure should also be done for both head & side laps. It is always suggested to mechanically fix head & side laps.
- Provide side & head laps respectively of 10 & 15 cm's between the sheets, making sure to remove the selvedge release strip.
- Remove the release film from the lower face.
- After application it is suggested to use a roller over the surface to further promote the adhesion.
- The adhesion of GECOSELF T.A. will be obtained by direct exposure to the sun. During the winter season it is suggested, after having finished the application, to warm the membrane with a gas or hot air torch and particularly the areas around chimneys, perimeters, protruding objects, skylights to promote the activation of the heat activated mass.
- Particular care should be given during the application around details (protruding objects, chimneys) of the up stands and change of slope, which will be applied by using a hot air torch.
- Apply the clay roof tiles.

RECOMMENDATIONS

To best use the technical characteristics of bituminous membranes and guarantee the maximum performance and durability of the jobs where they are used, some simple but fundamental rules must be respected.

- The rolls are to be stored in an upright position, indoors in a dry and ventilated area, away from heat sources. Absolutely avoid the stacking of rolls and pallets for storage or transport to avoid possible deformations which may compromise a perfect installation. It is recommended to store the product at temperatures above 0°C.
- The rolls shall be kept in a warm or heated storage area during application, should the workability of the material deteriorate or become stiff and difficult to install during application, these should be returned to the heated storage area and substituted with new rolls. The rolls that are temporarily stored on the roof before application, shall be kept elevated by being left on their own pallets and shall be covered and protected from the weather.
- The application surface must be smooth dry & clean.
- The application surface must be previously treated with a suitable bituminous primer to eliminate dust and enhance the adhesion of the membrane.
- **The application surface must not have any depressions to avoid the risk of ponding water, the slope must be at least 1.5% on concrete decks and 3% for steel or wooden ones, this to guarantee a proper run off of rainwater.**
- In situations of application on vertical surfaces superior to 2 meters or on very sloped substrates, apply suitable mechanical fixings to the head laps, after which they will be sealed when torching the head laps.
- The application must be done at temperature higher than +5°C.
- The application must be interrupted in adverse weather conditions (high humidity, rain, etc.).
- The pallets on which the rolls are packaged are intended for normal warehouse use.
- The materials on stock should be rotated following a first in first out rotation.
- For information concerning storage and application of Geco membranes, please refer to the "Installation manual".

FIELDS OF USE

EN13707 CONTINUOUS ROOFS 0958-CPR-2045/1

CERTIFICATION CE	N. LAYERS			METHOD OF APPLICATION						TYPE OF APPLICATION			TYPE			
	SINGLE LAYER	DOUBLE LAYER	MULTILAYER	TORCH	HOT AIR	MIXED (TORCH/AIR)	COLD BOND GLUE	MECHANICAL FIXING	THERMOADHESIVE / SELF-ADHESIVE	FULLY BONDED	PARTIALLY BONDED	LOOSE LAID	COMPLIMENTARY LAYER	TOP LAYER	HEAVY PROTECTION	ANTI-ROOT
GECOSELF T.A. P 2,5 MM		X	X						X	X			X			
GECOSELF T.A. V 2,5 MM		X	X						X	X			X			

EN13859-1 UNDER ROOF TILE

GECOSELF T.A. PA 4,0 KG/MQ	X								X	X				X		