

PARAGUM ST



Nature of product

PARAGUM ST prefabricated waterproofing membranes are obtained by coextrusion of a compound, based on elastoplastomeric bitumen-polymer with base of metallocene resins, derived from the special PARALLOY component (widely known for its superior technical and performance characteristics), and a composite reinforcement in non-woven polyester with a continuous filament stabilised with glass fibres, inserted in the thickness of the membrane in complete synergy with the same. The precise formulation and the particular dispersion of distilled bitumens and polymers determine good mechanical performance and ageing.

The PARAGUM ST membranes are manufactured in the black version, with a powdered exposed face, 4 mm thick, which can be covered with suitable compatible protective paints, colored or metallising, and ARD/S, with an areic mass of 4.5 kg/m² and finishing of the upper face with slate flakes in natural grey (standard), red, green and White Reflecta (on request). All versions of the PARAGUM ST membranes have the lower face, anchoring to the support, coated with the film "TERMOTENE", which facilitates application and improves adhesion to the surface to be waterproofed.

They are packaged in rolls with plastic strips and accompanied by a Quality Control Certificate; they comply with the current requirements for CE marking; they do not contain asbestos, tar or other dangerous substances.

Finally, the PARAGUM ST membranes are accompanied by the prestigious "Agrément Technique avec Certification" certification issued by the UBAtc institute, member of the "UEAtc - Union Européenne pour l'Agrément technique dans la construction".

Intended use

The PARAGUM ST membranes are specifically used to create waterproofing works in general. Moreover, compared to the use on roofs and in foundations, the different versions can be used with reference to the following diagram ⁽¹⁾. For clarification on the systems that can be obtained, consult the Technical Services of IMPER ITALIA srl.

PRODUCTS	FIELDS OF USE ⁽¹⁾							
	Roofing (EN 13707)					Under-tile (EN 13859-1)	Steam control (EN 13970)	Foundations (EN 13969)
	Exposed		Roof gardens	Under heavy-duty protection				
	Single-ply	Multi-ply		Root-resistant	Single-ply	Multi-ply		Multi-ply
Upper		Lower						
PARAGUM ST 4	•	•	•		•	•		•
PARAGUM ST ARD/S		•					•	

⁽¹⁾ In compliance with the applicable AISPEC/SITEB-MBP Guidelines.

Application procedure

The application methods are a determining factor capable of characterising the performance of the waterproof covering itself. In general terms, we remind you to carry out careful preparation and cleaning of the substrate followed by the priming treatment with a suitable primer (applied with a long-handled brush, roller, spray), with a consumption of 0.2÷0.3 l/m² and in any case variable with the degree of porosity of the substrate itself. The membrane will be applied with the aid of a propane gas torch; particular care must be given to performing of sealing between the sheets always laid with staggered joints: the lateral joints must be installed with overlap of 8 ÷ 10 cm and the end joints with overlapping of 12 ÷ 15 cm. For correct and detailed documentation, as well as to identify the most effective intervention solutions in all circumstances, we recommend consulting the Technical Services of IMPER ITALIA srl which are in any case available for the consultation of particular problems as well as to provide all the assistance necessary for the best use of these materials.

TECHNICAL SPECIFICATIONS

Specifications	EN Standards	Unit of Measure	Tolerances ⁽¹⁾	PARAGUM ST	
				4	ARD/S ⁽²⁾
Roll dimensions	1848-1	m	≥	10 x 1 (-1%)	
Thickness	1849-1	mm	±5%	4	-
Mass per unit area	1849-1	kg/m ²	±10%	-	4.5
Watertightness	1928-B	kPa	≥	60	
Cold flexibility	1109	°C	≤	-15	
Flow resistance at elevated temperature	1110	°C	≥	+120	
L/T tensile strength	12311-1	N/5cm	±20%	750 / 650	
L/T tensile elongation	12311-1	%	±15	50 / 50	
L/T dimensional stability	1107-1	%	≤	0.3 / 0.3	
Static puncture	12730	kg	≥	25	
Dynamic puncture	12691-B	mm	≥	1000	
L/T tear resistance	12310-1	N	±30%	160 / 180	
Joint peel resistance	12316-1	N/5cm	±20	60	
Joint cut resistance	12317-1	N/5cm	±20%	650 / 550 ⁽³⁾	
Durability after aging:					
• Cold flexibility	1296-1109	°C	+15°C	-5	
• Flow resistance at elevated temperature	1296-1110	°C	-10°C	+120	
• UV Ageing	1297	-	-	Passes the test	
• Watertightness	1296-1928	kPa	≥	60	
• Chemical resistance	-	-	-	NPD ⁽⁴⁾	
• L/T tensile strength	12311-1	N/5cm	±20%	750 / 650	
• L/T tensile elongation	12311-1	%	±15	50 / 50	
Steam permeability	1931	μ	≥	20,000	
Root resistance	13948		-	NPD ⁽⁴⁾	
External fire behaviour	13501-5	EC ⁽⁵⁾	-	Froof	
Fire reaction	13501-1	EC ⁽⁵⁾	-	F	
Solar Reflectance Index (SRI)	ASTM Standard E1980	%	-	81 ⁽⁶⁾	

Notes: (1) In compliance with the applicable AISPEC/SITEB-MBP Guidelines.

(2) Upper finish in slate flakes, standard color Natural gray.

Other colors on request: Red, Green, White Reflecta (SRI = 81%)

(3) Or off-joint breakage.

(4) Characteristic not determined because it is not relevant for use.

(5) Euroclass.

(6) Only for the version with Reflecta White slate, in heavy wind conditions.

Rev. 04 (06-22)

Considerando le diverse situazioni d'impiego dei prodotti e l'intervento di fattori da noi non dipendenti (supporti, condizioni di esercizio, in osservanza delle prescrizioni, ecc.), non è possibile alla IMPER ITALIA srl assumere responsabilità in merito ai risultati ottenuti. Il progresso unito alla costante ricerca dei massimi livelli prestazionali possono apportare - nel tempo - modificazioni alle informazioni contenute in questo stampato, senza che la IMPER ITALIA srl debba darne preavviso a tutti gli interessati.

