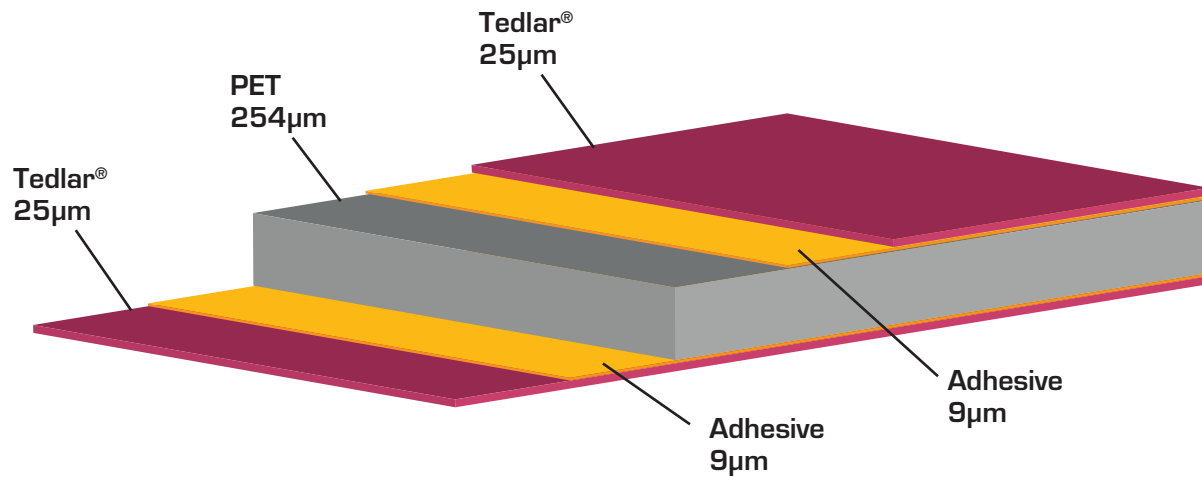


FLEXcon multiGUARD® TPT W12



FLEXcon's multiGUARD® brand, a range of backsheets for photovoltaic modules, stands for multiple guarding properties – engineered to protect against moisture and humidity and provide superior partial discharge and high voltage insulation for proper functioning of the module. FLEXcon's line of backsheet products are designed to meet required standards and regulations.

FLEXcon multiGUARD® TPT W12 is a multi-layered white laminate – Tedlar® / PET / Tedlar® – that exceeds 1,000 volts in the IEC partial discharge test as measured by TÜV and is UL recognized according to the QIHE2 standard*. TPT W12 has excellent laminate bond strength and is designed to maintain a superior bond to most standard fast- and ultra-fast cure encapsulants.

Physical Properties	Value	Test Method
Maximum System Voltage	1147 VDC	IEC 61730-2; IEC 60664-1
Breakdown Voltage	21.44 kV	IEC 60243-1
Comparative Tracking Index	600V; PLC = 1	IEC 60112; ASTM D3638
Bond Strength (Internal)	> 5 N/cm	ASTM D903; D1876
Bond Strength to Encapsulant ¹	> 40 N/cm	ASTM D903
Damp Heat Exposure ²	> 1000hrs	IEC 61215
MVTR ³	2.6 g/m ² /day	ASTM F1249
Thickness (Total Laminate)	323µm ± 10%	ASTM D1593
Specific Gravity	1.52	ASTM D1505
Tensile Strength	MD 164 N/mm ² TD 149 N/mm ²	ASTM D882
Tensile Elongation	MD 337% TD 196%	ASTM D882
Tensile Modulus	MD 1076 N/mm ² TD 1182 N/mm ²	ASTM D882
Shrinkage ⁴	MD < 1.5% TD < 1.0%	ASTM D1204

We strongly recommend fully testing this product in the end use application to confirm product performance.

¹ Results may vary based on encapsulant

² 85°C/85% RH

³ 38°C/90% RH

⁴ 150°C/30min



Precisely Right.



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