

Formosa TAIRIREX[®] HP825G

Formosa TAIRIREX HP825G is a general - purpose HIPS grade with high gloss, high tensile strength, and high heat distortion temperature, low monomer residue, suitable for injection molding, meeting FR HB requirements, used in appliance components like A/C housing.

Physical property		Standard	Value	Unit
Density 23°C		ASTM D792	1	g/cm ³
Density 23°C		ISO 1183	1	g/cm ³
Shrinkage 3. 2mm		ASTM D955	0.4 ~0.7	%
Melt Index 200°C 5kg		ASTM D1238	4	g/10min
Melt Index 200°C 5kg		ISO 1133	4	g/10min
Monomer Content		500		ppm
Mechanical	behavior	Standard	Value	Unit
Tensile Modulus 23°C		ASTM D638	19,000	kg/cm ²
Tensile Modulus 23°C		ISO 527	2,200	MPa
Tensile Strength 23°C		ASTM D638	300	kg/cm ²
Tensile Strength 23°C		ISO 527	33	MPa
Elongation 23°C		ASTM D638	40	%
Elongation 23°C		ISO 527	45	%
Flexural Strength 23°C		ASTM D790	550	kg/cm ²
Flexural Strength 23°C		ISO 178	54	MPa
Flexural Modulus 23°C		ASTM D790	20,000	kg/cm ²
Flexural Modulus 23°C		ISO 178	1,800	MPa
Izod	Notch Impact 23°C 6.4mm	ASTM D256	11	kg-cm/cm
Izod	Notch Impact 23°C 6.4mm	ISO 180	88	J/m
Thermal		Standard	Value	Unit
HDT Annealed 3.2mm Annealed at 80°C for 2 hours		ASTM D648	93	°C
HDT Annealed 3.2mm Annealed at 80°C for 2 hours		ISO 75	98	°C
Vicat Softening Temperature Annealed 3.2mm Annealed at 80°C for 2 hours		ASTM D1525	104	°C
Vicat Softening Temperature Annealed 3.2mm Annealed at 80°C for 2 hours		ISO 306	104	°C
Flammability		Standard	Value	Unit
Flame Rating All Color 1.5mm		UL94	HB	
Flame Rating All Color 3.0mm		UL94	HB	