

AF-312 (Flame Repardant Grade)

Application

(TBBA flame retardants)TV, V1R, printer, facsmilie, computer, monitor . Electric parts requiring flame retardant property

Feature

AF-312 is specifically engineered to meet the need for high performance products in the flame retardant resin applications. AF-312 provides an optimum balance of physical properties,high heat resistance,outstanding UV stability and good finished part aesthetics.

Properties	Test Method	Test Condition	Unit	Value
Physical				
Specific Gravity	ASTM D792		g/cc	1.18
Molding Shrinkage	ASTM D955		%	0.4~0.7
Melt Flow Index	ASTM D1238(G)	200℃/ 5kg	g/10min	6
	-	220℃/ 10kg	g/10min	52
	ASTM D1238(I)	230℃/ 3.8kg	g/10min	15
Mechanical				
Tensile Strength at yield	ASTM D638	50mm/min	kg/cm ²	440
			lb/in ²	6,100
Tensile Modulus	ASTM D638	1mm/min	kg/cm ²	22,000
			lb/in ²	
Elongation at yield	ASTM D638	50mm/min	%	5
Elongation at break	ASTM D638	50mm/min	%	20
Flexural Strength at yield	ASTM D790	15mm/min	kg/cm ²	700
			lb/in ²	9,900
Flexural Modules	ASTM D790	15mm/min	kg/cm ²	25,000
			lb/in ²	355,000
Izod Impact Strength (Noched)	ASTM D256	1/4" , '23℃	kg·cm/cm	24
		1/4" , '-30℃	kg·cm/cm	9
		1/8" , '23℃	kg·cm/cm	28
		1/8" , '-30℃	kg·cm/cm	9
Rockwell Hardness	ASTM D785	R-Scale	-	103
Thermal				
Heat Deflection Temp	ASTM D648	18.5kg/cm ² , 1/4" (annealed)	℃	83
			°F	181
		18.5kg/cm ² , 1/4" (unannealed)	℃	76
			°F	169
		4.6kg/cm ² , 1/4" (annealed)	℃	88
			°F	190
4.6kg/cm ² , 1/4" (unannealed)	℃	84		
	°F	183		
Vicat Softening Temp	ASTM D1525	5kg, 50℃/h	℃	84
			°F	183
Flammability	UL94	1/8"	class	V-0, 5VB
		1/10"	class	V-0, 5VB
		1/16"	class	V-0
	IEC707	1/8"	mm/min	
		1/16"	mm/min	FV0