

Properties	Test Method	Terms	Units	GF Reinforced Alloy Flame Retardant
				5817GN2-30
				GF30
<b>Physical properties</b>				
Density	ISO 1183	-	g/cm <sup>3</sup>	1.54
<b>Dimensional properties</b>				
Moulding shrinkage (2mmt)	-	MD TD	%	0.3 0.6
<b>Rheological properties</b>				
Melt Volume flow Rate	ISO 1133	-	cm <sup>3</sup> /10min -	20 250°C × 5kg
<b>Mechanical properties</b>				
Yield stress	ISO 527-1,2	-	MPa	
Stress at break	ISO 527-1,2	-	MPa	130
Strain at break			%	2
Flexural strength	ISO 178	-	MPa	190
Flexural modulus			MPa	9,700
Charpy impact	ISO 179-1, 2	- notched	kJ/m <sup>2</sup> kJ/m <sup>2</sup>	10
<b>Thermal properties</b>				
Melting temperature	ISO 11357-3	-	°C	223
Temperature of deflection under load	ISO 75-1, 2	1.80MPa 0.45MPa	°C	- -
Coefficient of Linear thermal expansion	ISO 11359-2	MD: -30~120°C	1E-5/°C	-
		MD: -30~35°C		-
		MD: 35~120°C		-
		TD: -30~120°C		-
		TD: -30~35°C		-
		TD: 35~120°C		-
Flammability	UL94	-	-	V-0(1.5mmt) V-0(3mmt) - -
<b>Electrical properties</b>				
Volume resistivity	IEC 60093	-	Ω·m	>1E12
Surface resistivity	IEC 60093	-	Ω	>1E14
Electric strength	IEC 60243-1	1mmt	MV/m	-
		2mmt		-
		3mmt		-
CTI	UL746A	-	-	PLC 3
RTI(Elec)	UL746B	-	-	-
RTI(Imp)	UL746B	-	-	-
RTI(Str)	UL746B	-	-	-
<b>Molding Conditions (Standard example)</b>				
Pre-drying Temperature	-	-	°C	120
Pre-drying Time	-	-	h	5-8
Cylinder temperature	-	-	°C	240-265
Mold temperature	-	-	°C	50-90
Injection speed	-	-	-	Middle-High
Injection pressure	-	-	MPa	20-150
Screw speed	-	-	rpm	80-150

The values described are typical values only.