NOVADURAN™

MITSUBISHI CHEMICAL GROUP

Properties	Test Method	Terms	Units	GF Reinforced Alloy Flame Retardant 5817GN2-15L Low Warpage Low Density GF
Physical properties				
Density	ISO 1183	–	g/cm³	1.39
Dimensional properties				
Moulding shrinkage (2mmt)	–	MD TD	%	0.5 0.8
Rheological properties				
Melt Volume flow Rate	ISO 1133	–	cm³/10min –	30 250℃×5kg
Mechanical properties				
Yield stress	ISO 527-1,2	–	MPa	–
Stress at break Strain at break	ISO 527-1,2	–	MPa %	93 3
Flexural strength Flexural modulus	ISO 178	–	MPa MPa	141 5,300
Charpy impact	ISO 179-1, 2	– notched	kJ/m² kJ/m²	38 6
Thermal properties				
Melting temperature	ISO 11357-3	–	℃	224
Temperature of deflection under load	ISO 75-1, 2	1.80MPa 0.45MPa	℃	140 >200
Coefficient of Linear thermal expansion	ISO 11359-2	MD:-30～120℃ MD:-30～35℃ MD:35～120℃ TD:-30～120℃ TD:-30～35℃ TD:35～120℃	1E-5/℃	3.0 3.9 2.3 10.7 8.4 12.5
Flammability	UL94	–	–	same as V-0(1.5mmt)
Electrical properties				
Volume resistivity	IEC 60093	–	Ω・m	>1E12
Surface resistivity	IEC 60093	–	Ω	>1E14
Electric strength	IEC 60243-1	1mmt 2mmt 3mmt	MV/m	– 20 –
CTI	UL746A	–	–	same as PLC 3
RTI(Elec)	UL746B	–	–	–
RTI(Imp)	UL746B	–	–	–
RTI(Str)	UL746B	–	–	–
Molding Conditions (Standard example)				
Pre-drying Temperature	–	–	℃	120
Pre-drying Time	–	–	h	5-8
Cylinder temperature	–	–	℃	240-265
Mold temperature	–	–	℃	50-90
Injection speed	–	–	–	Middle-High
Injection speed	–	–	MPa	20-150
Screw speed	–	–	rpm	80-150

The values described are typical values only.