

Product Texts

BERGAMID A700G45H, PA66 reinforced
45% glass fibre, general-purpose injection molding grade
heat stabilized, UL-listing

Mechanical properties	dry / cond	Unit	Test Standard
ISO Data			
Tensile Modulus	11000 / 14500	MPa	ISO 527
Stress at break	170 / 220	MPa	ISO 527
Strain at break	3 / 2	%	ISO 527
Charpy impact strength, +23°C	100 / 90	kJ/m ²	ISO 179/1eU
Charpy impact strength, -30°C	80 / 80	kJ/m ²	ISO 179/1eU
Charpy notched impact strength, +23°C	23 / 17	kJ/m ²	ISO 179/1eA
Charpy notched impact strength, -30°C	18 / 15	kJ/m ²	ISO 179/1eA

Thermal properties	dry / cond	Unit	Test Standard
ISO Data			
Melting temperature, 10°C/min	261 / *	°C	ISO 11357-1/-3
Temp. of deflection under load, 1.80 MPa	250 / *	°C	ISO 75-1/-2
Temp. of deflection under load, 0.45 MPa	250 / *	°C	ISO 75-1/-2
Coeff. of linear therm. expansion, parallel	15 / *	E-6/K	ISO 11359-1/-2
Coeff. of linear therm. expansion, normal	60 / *	E-6/K	ISO 11359-1/-2
Burning behav. at 1.5 mm nom. thickn.	HB / *	class	IEC 60695-11-10
Thickness tested	1.5 / *	mm	-
Yellow Card available	yes / *	-	-
Burning behav. at thickness h	HB / *	class	IEC 60695-11-10
Thickness tested	0.7 / *	mm	-
Yellow Card available	yes / *	-	-

Electrical properties	dry / cond	Unit	Test Standard
ISO Data			
Relative permittivity, 1MHz	5.6 / 3.7	-	IEC 62631-2-1
Dissipation factor, 1MHz	1600 / 150	E-4	IEC 62631-2-1
Volume resistivity	1E10 / 1E13	Ohm*m	IEC 62631-3-1
Surface resistivity	* / 1E10	Ohm	IEC 62631-3-2
Electric strength	80 / 90	kV/mm	IEC 60243-1
Comparative tracking index	500 / -	-	IEC 60112

Other properties	dry / cond	Unit	Test Standard
Water absorption	4.7 / *	%	Sim. to ISO 62
Humidity absorption	1.5 / *	%	Sim. to ISO 62
Density	- / 1500	kg/m ³	ISO 1183

Material specific properties	dry / cond	Unit	Test Standard
ISO Data			
Viscosity number	135 / *	cm ³ /g	ISO 307, 1157, 1628

Test specimen production	Value	Unit	Test Standard
ISO Data			
Injection Molding, melt temperature	280	°C	ISO 294
Injection Molding, mold temperature	80	°C	ISO 294

Characteristics**Processing**

Injection Molding

Special Characteristics

Heat stabilized or stable to heat

BERGAMID® A700G45H

PA66-GF45

Avient Corporation

Delivery form

Pellets

Regional Availability

Europe

Other text information**Injection Molding**

PREPROCESSING

Max. Water Content 0,1%

Pre-Drying: 80°C 4 Hours

PROCESSING

Melt Temperature 280-300°C

Mould Temperature 80-90°C