

Amodel® AT-1002 HS

PPA

Syensqo

Processing/Physical Characteristics	Value	Unit	Test Standard
ASTM Data			
Mold Shrinkage, MD	0.02	mm/mm	ASTM D 955
Mold Shrinkage, TD	0.021	mm/mm	ASTM D 955
Mechanical properties	dry / cond	Unit	Test Standard
ISO Data			
Tensile Modulus	2760 / -	MPa	ISO 527
Yield stress	75.2 / -	MPa	ISO 527
Yield strain	5 / -	%	ISO 527
Stress at break	68.3 / -	MPa	ISO 527
Strain at break	15 / -	%	ISO 527
Flexural modulus, 23°C	2280 / -	MPa	ISO 178
Flexural modulus	1720 / -	MPa	ISO 178
Flexural modulus temperature	100	°C	-
Charpy impact strength, +23°C	N / -	kJ/m ²	ISO 179/1eU
Charpy notched impact strength, +23°C	13 / -	kJ/m ²	ISO 179/1eA
Izod impact strength, +23°C	N / -	kJ/m ²	ISO 180/1U
Izod notched impact strength, +23°C	13 / -	kJ/m ²	ISO 180/1A
ASTM Data			
Tensile Modulus	2760 / 2760	MPa	ASTM D 638
Tensile Strength	83.4 / 76.5	MPa	ASTM D 638
Elongation at Break	80 / 100	%	ASTM D 638
Flexural Modulus	2210 / 2280	MPa	ASTM D 790
Flexural Strength	103 / 73.1	MPa	ASTM D 790
Izod Impact notched, 1/8 in	144 / 150	J/m	ASTM D 256
Thermal properties	dry / cond	Unit	Test Standard
ISO Data			
Melting temperature, 10°C/min	315 / *	°C	ISO 11357-1/-3
Temp. of deflection under load, 1.80 MPa	118 / *	°C	ISO 75-1/-2
Burning behav. at thickness h	HB / *	class	IEC 60695-11-10
Thickness tested	3.2 / *	mm	-
ASTM Data			
Melting Temperature	315	°C	ASTM D 3418
Electrical properties	dry / cond	Unit	Test Standard
ASTM Data			
Dielectric Strength, Short Time	17 / 17	kV/mm	ASTM D 149
Dissipation Factor, 60 Hz	0.004 / 0.018	-	ASTM D 150
Dissipation Factor, 1 MHz	0.016 / 0.035	-	ASTM D 150
Dielectric Constant, 60 Hz	3.3 / 3.8	-	ASTM D 150
Dielectric Constant, 1 MHz	3.3 / 3.8	-	ASTM D 150
Surface Resistivity	* / 2.5E13	Ohm	ASTM D 257
Volume Resistivity	0 / 7E14	Ohm*cm	ASTM D 257
Other properties	dry / cond	Unit	Test Standard
Density	1130 / -	kg/m ³	ISO 1183
Water Absorption, 24hr	0.5	%	ASTM D 570
Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	110	°C	-
Pre-drying - Time	4	h	-
Processing humidity	≤0.06	%	-
Melt temperature	321 - 329	°C	-
Mold temperature	135	°C	-
Zone 1	304	°C	-
Zone 2	324	°C	-

Screw speed

100 - 200

rpm

-

Characteristics**Processing**

Injection Molding

Delivery form

Pellets, Black, Natural Color

Additives

Lubricants, Release agent

Special Characteristics

High impact or impact modified, Heat stabilized or stable to heat

Features

Ductile, Low Warpage

Chemical Resistance

General Chemical Resistance

Applications

Automotive, Electrical and Electronical

Regional Availability

North America, Europe, Asia Pacific, South and Central America, Near East/Africa