

**Product Texts**

Chemical abbreviation according to ISO 1043-1: POM Molding compound ISO 29988- POM-K, M-GNS, 02-002 POM copolymer Injection molding type, modified with PTFE; good chemical resistance to solvents, fuel and strong alkalis as well as good hydrolysis resistance; high resistance to thermal and oxidative degradation; for sliding combinations with very low coefficient of friction. UL-registration in natural and a thickness more than 1.57 mm as UL 94 HB, temperature index UL 746 B electrical 105 °C, mechanical 95 °C (tensile impact) and 100 °C (tensile). Burning rate ISO 3795 and FMVSS 302 < 100 mm/min for a thickness more than 1 mm. Ranges of applications: For sliding combinations with very low coefficient of friction. FMVSS = Federal Motor Vehicle Safety Standard (USA) UL = Underwriters Laboratories (USA)

Flammability @1.6mm nom. HB  
thickn.

-

Flammability at thickness h (3.18 HB  
mm)

UL recognition (h)

**Processing/Physical Characteristics**

	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Melt volume-flow rate, MVR	6	cm <sup>3</sup> /10min	ISO 1133
Temperature	190	°C	-
Load	2.16	kg	-
<sup>[C]</sup> Molding shrinkage, parallel	2.0	%	ISO 294-4, 2577
<sup>[C]</sup> Molding shrinkage, normal	1.7	%	ISO 294-4, 2577

[C]: CAMPUS

**Mechanical properties**

	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Tensile Modulus	2500	MPa	ISO 527
<sup>[C]</sup> Yield stress	48	MPa	ISO 527
<sup>[C]</sup> Yield strain	7	%	ISO 527
<sup>[C]</sup> Nominal strain at break	16	%	ISO 527
<sup>[C]</sup> Charpy impact strength, +23°C	60	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy impact strength, -30°C	60	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy notched impact strength, +23°C	4	kJ/m <sup>2</sup>	ISO 179/1eA
<sup>[C]</sup> Charpy notched impact strength, -30°C	4	kJ/m <sup>2</sup>	ISO 179/1eA

[C]: CAMPUS

**Thermal properties**

	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Melting temperature, 10°C/min	166	°C	ISO 11357-1/-3
<sup>[C]</sup> Temp. of deflection under load, 1.80 MPa	98	°C	ISO 75-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, parallel	110	E-6/K	ISO 11359-1/-2
<sup>[C]</sup> Burning Behav. at 1.5 mm nom. thickn.	HB	class	IEC 60695-11-10
Thickness tested	1.6	mm	-
<sup>[C]</sup> Burning Behav. at thickness h	HB	class	IEC 60695-11-10
Thickness tested	3.2	mm	-
Yellow Card available	yes	-	-

[C]: CAMPUS

**Electrical properties**

	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Relative permittivity, 100Hz	3.7	-	IEC 62631-2-1
<sup>[C]</sup> Relative permittivity, 1MHz	3.7	-	IEC 62631-2-1
<sup>[C]</sup> Dissipation factor, 100Hz	20	E-4	IEC 62631-2-1
<sup>[C]</sup> Dissipation factor, 1MHz	80	E-4	IEC 62631-2-1
<sup>[C]</sup> Volume resistivity	1E12	Ohm*m	IEC 62631-3-1
<sup>[C]</sup> Surface resistivity	1E14	Ohm	IEC 62631-3-2
<sup>[C]</sup> Electric strength	33	kV/mm	IEC 60243-1

[C]: CAMPUS

Other properties	Value	Unit	Test Standard
<sup>[C]</sup> Water absorption	<b>0.65</b>	%	Sim. to ISO 62
<sup>[C]</sup> Humidity absorption	<b>0.2</b>	%	Sim. to ISO 62
<sup>[C]</sup> Density	<b>1510</b>	kg/m <sup>3</sup>	ISO 1183

[C]: CAMPUS

Processing Recommendation Injection Molding	Value	Unit	Test Standard
Pre-drying - Temperature	<b>100 - 120</b>	°C	-
Pre-drying - Time	<b>3 - 6</b>	h	-
Processing humidity	<b>≤0.2</b>	%	-
Melt temperature	<b>190 - 210</b>	°C	-
Mold temperature	<b>80 - 120</b>	°C	-

**Characteristics**

**Processing**

Injection Molding, Other Extrusion

**Delivery form**

Pellets, Natural Color

**Additives**

Lubricants, Release agent

**Features**

Thermal Stability, Tribologic Grade, Copolymer

**Chemical Resistance**

Alkali Resistance, Solvent Resistance, Hydrolytically Stable, Oxidation Resistance

**Certifications**

Drinking water contact

**Applications**

Automotive

**Regional Availability**

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

**Other text information**

**Injection molding**

General drying is not necessary due to low moisture absorption of the resin.

In case of bad storage conditions (water contact or condensed water) the use of a recirculating air dryer (100 to 120 °C / max. 40 mm layer / 3 to 6 hours) is recommended.

Max. Water content 0,2 %  
Standard injection moulding machines with three phase (15 to 25 D) plasticating screws will fit.

Conditioning e.g. moisturizing is not necessary.