

**Product Texts**

Product-nomenclature: ISO 16396-PA6I/6T,,FT,C11-030

Partially aromatic Polyamide

**Product Attributes**

Improved heat resistance, Highly transparent, Barrier material

**Markets****Automotive**

Interior

**Electricals & Electronics**

Electrical appliances

**Industry & Consumer goods**

Housewares

**Packaging**

Injectionstretchblowmoulded containers, Cosmetics / Personal care, Medical packaging

**Approvals****Burning Behaviour**

UL V2

**Food Contact**

EU Requirements, FDA

**Medical**

USP VI, ISO 10993

**Potable Water Contact**

NSF 61

Processing/Physical Characteristics	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Molding shrinkage, parallel	0.3 / *	%	ISO 294-4, 2577
<sup>[C]</sup> Molding shrinkage, normal	0.5 / *	%	ISO 294-4, 2577
<sup>[C]</sup> Density of melt	1100	kg/m <sup>3</sup>	-
<sup>[C]</sup> Thermal conductivity of melt	0.21	W/(m K)	-
<sup>[C]</sup> Spec. heat capacity of melt	2000	J/(kg K)	-
<sup>[C]</sup> Eff. thermal diffusivity	9.55E-8	m <sup>2</sup> /s	-
<sup>[C]</sup> Ejection temperature	120	°C	-

[C]: CAMPUS

Mechanical properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Tensile Modulus	3000 / 3000	MPa	ISO 527
<sup>[C]</sup> Yield stress	100 / 100	MPa	ISO 527
<sup>[C]</sup> Yield strain	5 / 5	%	ISO 527
<sup>[C]</sup> Nominal strain at break	>50 / >50	%	ISO 527
<sup>[C]</sup> Charpy notched impact strength, +23°C	8 / 8	kJ/m <sup>2</sup>	ISO 179/1eA
<sup>[C]</sup> Charpy notched impact strength, -30°C	8 / 2	kJ/m <sup>2</sup>	ISO 179/1eA
<sup>[C]</sup> Shore D hardness	85 / *	-	ISO 7619-1

[C]: CAMPUS

Thermal properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Melting temperature, 10°C/min	125 / *	°C	ISO 11357-1/-3
<sup>[C]</sup> Glass transition temperature, 10°C/min	120 / *	°C	ISO 11357-1/-2
<sup>[C]</sup> Temp. of deflection under load, 1.80 MPa	105 / *	°C	ISO 75-1/-2
<sup>[C]</sup> Temp. of deflection under load, 0.45 MPa	115 / *	°C	ISO 75-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, parallel	60 / *	E-6/K	ISO 11359-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, normal	60 / *	E-6/K	ISO 11359-1/-2

## Grivory GTR 45 natural

PA6I/6T

EMS-GRIVORY | a unit of EMS-CHEMIE AG

<sup>[C]</sup> Burning Behav. at thickness h	V-2 / *	class	IEC 60695-11-10
Thickness tested	0.8 / *	mm	-

[C]: CAMPUS

Electrical properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Volume resistivity	1E12 / 1E12	Ohm*m	IEC 62631-3-1
<sup>[C]</sup> Surface resistivity	* / 1E13	Ohm	IEC 62631-3-2
<sup>[C]</sup> Electric strength	27 / 27	kV/mm	IEC 60243-1
<sup>[C]</sup> Comparative tracking index	- / 600	-	IEC 60112

[C]: CAMPUS

Other properties	dry / cond	Unit	Test Standard
<sup>[C]</sup> Water absorption	7 / *	%	Sim. to ISO 62
<sup>[C]</sup> Humidity absorption	2 / *	%	Sim. to ISO 62
<sup>[C]</sup> Density	1180 / -	kg/m <sup>3</sup>	ISO 1183

[C]: CAMPUS

Test specimen production	Value	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Injection Molding, melt temperature	260	°C	ISO 294
Injection Molding, mold temperature	80	°C	ISO 294
Injection Molding, injection velocity	250	mm/s	ISO 294
Injection Molding, pressure at hold	75	MPa	ISO 294

[C]: CAMPUS

## Characteristics

### Processing

Injection Molding

### Delivery form

Granules, Natural Color

### Special Characteristics

Heat stabilized or stable to heat, Transparent

### Features

Barrier Properties

### Certifications

Food contact, Food approval FDA 21 CFR, Drinking water contact, Drinking water contact NSF 61, Medical Grade, Biocompatibility ISO 10993, US Pharmacopeia Class VI Approved

### Applications

Automotive, Electrical and Electronical, Medical, Packaging

### Regional Availability

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