

# Terlux HD 2812

Methyl Methacrylate Acrylonitrile Butadiene Styrene (MABS)

## TECHNICAL DATASHEET

### DESCRIPTION

Terlux® HD 2812 is an easy-flowing injection molding grade based on a MABS polymer. Terlux® HD 2812 offers an unique combination of properties, such as a balanced stiffness/toughness ratio and the high transparency well known in SAN molding compositions.

### FEATURES

- Excellent transparency
- Good resistance to chemicals
- Good Stiffness and surface finish
- High impact strength
- HD service package available
- Easy-flow grade

### APPLICATIONS

- Medical devices

Property, Test Condition	Standard	Unit	Values
<b>Rheological Properties</b>			
Melt Volume Rate 220 °C/10 kg	ISO 1133	cm <sup>3</sup> /10 min	8
Melt Volume Rate, 220 °C/21.6 kg	ISO 1133	cm <sup>3</sup> /10 min	45
<b>Mechanical Properties</b>			
Charpy Notched Impact Strength, 23° C	ISO 179/1eA	kJ/m <sup>2</sup>	5
Charpy Notched Impact Strength, -30 °C	ISO 179/1eA	kJ/m <sup>2</sup>	2
Charpy Unnotched, 23 °C	ISO 179/1eU	kJ/m <sup>2</sup>	110
Charpy Unnotched, -30 °C	ISO 179/1eU	kJ/m <sup>2</sup>	70
Tensile Stress at Yield, 23 °C	ISO 527	MPa	42
Tensile Strain at Yield, 23 °C	ISO 527	%	4
Tensile Modulus	ISO 527	MPa	1900
Nominal Strain at Break, 23 °C	ISO 527	%	20
Flexural Strength, 23 °C	ISO 178	MPa	60
Hardness, Ball Indentation	ISO 2039-1	MPa	75
<b>Thermal Properties</b>			
Vicat Softening Temperature VST/B/50 (50N, 50 °C/h)	ISO 306	°C	87

# Terlux HD 2812

Methyl Methacrylate Acrylonitrile Butadiene Styrene (MABS)

## TECHNICAL DATASHEET

Property, Test Condition	Standard	Unit	Values
Heat Deflection Temperature A; (annealed 4 h/80 °C; 1.8 MPa)	ISO 75	°C	87
Heat Deflection Temperature B; (annealed 4 h/80 °C; 0.45 MPa)	ISO 75	°C	93
Coefficient of Linear Thermal Expansion	ISO 11359	10 <sup>-6</sup> /°C	80 - 110
Thermal Conductivity	DIN 52612-1	W/(m K)	0.17
<b>Electrical Properties</b>			
Dielectric Constant (100 Hz)	IEC 62631-2-1	-	3
Dissipation Factor (100 Hz)	IEC 62631-2-1	10 <sup>-4</sup>	160
Dissipation Factor (1 MHz)	IEC 62631-2-1	10 <sup>-4</sup>	130
Volume Resistivity	IEC 62631-3-1	Ohm*m	10 <sup>14</sup>
Surface Resistivity	IEC 62631-3-1	Ohm	10 <sup>15</sup>
<b>Optical Properties</b>			
Refractive Index, Sodium D Line	ISO 489	-	1.54
<b>Other Properties</b>			
Density	ISO 1183	kg/m <sup>3</sup>	1080
Water Absorption, Saturated at 23 °C	ISO 62	%	0.7
<b>Processing</b>			
Linear Mold Shrinkage	ISO 294-4	%	0.4 - 0.7
Melt Temperature Range	ISO 294	°C	230 - 260
Mold Temperature Range	ISO 294	°C	50 - 75
Injection Velocity	ISO 294	mm/s	200
Drying Temperature	-	°C	70
Drying Time	-	h	2

Typical values for uncolored products

## PROCESSING

Terlux is primarily processed through injection molding but any process suitable for thermoplastic molding compositions may also be used.

**DISCLAIMER**

The aforementioned data shall constitute the agreed contractual quality of the product sold by INEOS Styrolution at the time of passing of risk. INEOS Styrolution does not make any further warranty, representation or guarantee of any kind, express or implied, regarding the suitability of the product for any particular purpose or application and INEOS Styrolution disclaims all liability in connection therewith. The customer himself is required to verify whether or not the product is suitable for the further processing or application intended and whether or not the product complies with the relevant statutory requirements. Unless explicitly and individually otherwise agreed in writing, INEOS Styrolution's sole and exclusive liability with respect to its products is set forth in INEOS Styrolution's General Terms and Conditions for Sale.

---