

**Product Texts**

HiDura S3X NT is a high viscosity PA610 grade with 62% bio-based content. It is suitable for monofilament, film, and general purpose injection molding applications; it can also be used for molded applications where high abrasion resistance and ductility are key requirements. PA610 offers a unique balance of thermal, mechanical, and physical properties.

Processing/Physical Characteristics	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Molding shrinkage, parallel	1.8 / *	%	ISO 294-4, 2577
<sup>[C]</sup> Molding shrinkage, normal	1.6 / *	%	ISO 294-4, 2577

[C]: CAMPUS

Mechanical properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Tensile Modulus	1900 / 1100	MPa	ISO 527
<sup>[C]</sup> Yield stress	72 / 68	MPa	ISO 527
<sup>[C]</sup> Yield strain	5.2 / 21	%	ISO 527
<sup>[C]</sup> Charpy impact strength, +23°C	N / N	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy impact strength, -30°C	N / N	kJ/m <sup>2</sup>	ISO 179/1eU
<sup>[C]</sup> Charpy notched impact strength, +23°C	7 / 12	kJ/m <sup>2</sup>	ISO 179/1eA
<sup>[C]</sup> Charpy notched impact strength, -30°C	7.4 / 8	kJ/m <sup>2</sup>	ISO 179/1eA

[C]: CAMPUS

Thermal properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Melting temperature, 10°C/min	225 / *	°C	ISO 11357-1/-3
<sup>[C]</sup> Temp. of deflection under load, 1.80 MPa	52 / *	°C	ISO 75-1/-2
<sup>[C]</sup> Temp. of deflection under load, 0.45 MPa	121 / *	°C	ISO 75-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, parallel	100 / *	E-6/K	ISO 11359-1/-2
<sup>[C]</sup> Coeff. of linear therm. expansion, normal	105 / *	E-6/K	ISO 11359-1/-2

[C]: CAMPUS

Electrical properties	dry / cond	Unit	Test Standard
<b>ISO Data</b>			
<sup>[C]</sup> Electric strength	30 / 28	kV/mm	IEC 60243-1

[C]: CAMPUS

Other properties	dry / cond	Unit	Test Standard
<sup>[C]</sup> Water absorption	0.5 / *	%	Sim. to ISO 62
<sup>[C]</sup> Humidity absorption	1.5 / *	%	Sim. to ISO 62
<sup>[C]</sup> Density	1070 / -	kg/m <sup>3</sup>	ISO 1183
Biobased content	62	%	-

[C]: CAMPUS

**Characteristics****Processing**

Injection Molding, Film Extrusion, Profile Extrusion, Sheet Extrusion, Other Extrusion, Casting

**Delivery form**

Pellets, Natural Color

**Features**

Ductile

**Certifications**

Contains renewable resources

**Applications**

General Purpose, Monofilament

**Regional Availability**

North America, Europe, Asia Pacific