

Technical Data Sheet

Schulablend M/MK NAT

Acrylonitrile Butadiene Styrene + PA

Product Description

Schulablend M/MK NAT is a Acrylonitrile Butadiene Styrene + PA material and is typically used in Injection Molding applications. Features include: Chemical Resistant, and High Impact Resistance.

Processing Method	Injection Molding
Attribute	Good Chemical Resistance; High Impact Resistance
Resin ID	ABS-PA

Typical Properties	Nominal Value	Units	Test Method
Physical			
Melt Volume Flow Rate, (250 °C/5.0 kg)	11	cm ³ /10 min	ISO 1133
Density, (Method A)	1.08	g/cm ³	ISO 1183
Mechanical			
Tensile Stress at Yield			
(Type 1A, 50 mm/min)	39.0	MPa	ISO 527-2
(Type 1A, 50 mm/min) - Conditioned	27.0	MPa	ISO 527-2
Tensile Strain at Yield			
(Type 1A, 50 mm/min)	3.4	%	ISO 527-2
(Type 1A, 50 mm/min) - Conditioned	21	%	ISO 527-2
Tensile Modulus			
(1 mm/min, Type 1A)	1700	MPa	ISO 527-1
(1 mm/min, Type 1A) - Conditioned	900	MPa	ISO 527-1
Impact			
Charpy Impact Strength - Notched			
(23 °C, Type 1, Edgewise, Notch A)	80	kJ/m ²	ISO 179
(-30 °C, Type 1, Edgewise, Notch A)	22	kJ/m ²	ISO 179
(23 °C, Type 1, Edgewise, Notch A) - Conditioned	91	kJ/m ²	ISO 179
Charpy Impact Strength - Unnotched			
(23 °C, Type 1, Edgewise)	No Break		ISO 179
(-30 °C, Type 1, Edgewise)	No Break		ISO 179
(23 °C, Type 1, Edgewise) - Conditioned	No Break		ISO 179
Hardness			
Ball Indentation Hardness, (H 358/30)	85.0	MPa	ISO 2039-1
Thermal			
Vicat Softening Temperature			
(B (50N), 50 °C/h)	120	°C	ISO 306
(A (10N), 50 °C/h)	204	°C	ISO 306

Deflection Temperature Under Load Unannealed (0.45 MPa), (Flatwise)	87.0 °C	ISO 75-2/B
Deflection Temperature Under Load Unannealed (1.80 MPa), (Flatwise)	66.0 °C	ISO 75-2/A
Flammable		
Glow Wire Flammability Index		
(1.5 mm)	650 °C	IEC 60695-2-12
(3.0 mm)	650 °C	IEC 60695-2-12
UL Information		
Flammability Classification		
(1.5 mm)	HB	IEC 60695-11-10, -20
(3.0 mm)	HB	IEC 60695-11-10, -20
UL File Number	E86615	