

AKROMID® NEXT S3 GF 30 S1 black (8887)

PA610-I GF30

AKROMID® NEXT S3 GF 30 S1 black (8887) a partially biobased and impact modified PA6.10. With 15% glass fibre reinforcement, the material is suitable for household and industrial applications with high demands on strength, stiffness and impact strength. This sustainable grade is characterised by its low moisture absorption and high chemical resistance compared to classic PA6 and PA 6.

Features					
Bio-based	hydrolysis / chemically stabilised	impact modified	reduced moisture		
Properties					
Modulus	St	rength		Impact	
7.800 MPa	1:	35 MPa		100 kJ/m²	

Sustainability

Biobased carbon content	51 %

Mechanical Properties

Tensile modulus ISO 527-2	1 mm/min d.a.m.	7800 MPa
Tensile stress at break ISO 527-2	5 mm/min d.a.m.	135 MPa
Tensile strain at break ISO 527-2	5 mm/min d.a.m.	5 %
Charpy impact strength ISO 179-1/1eU	23°C d.a.m.	100 kJ/m²
Charpy notched impact strength ISO 179-1/1eA	23°C d.a.m.	25 kJ/m²





Thermal Properties

Temperature of deflection under load HDT/A	1,8 MPa	120 °C
Temperature of deflection under load HDT/B ISO 75	0,45 MPa	195 °C
Melting temperature ISO 11357-3	DSC, 10K/min	220 °C

General Properties

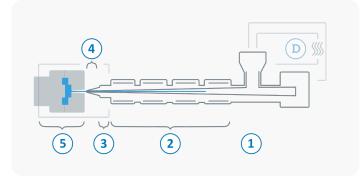
Density	23°C	1,27 g/cm ³
ISO 1183	25 C	1,27 g/cm





Processing

The values mentioned are recommendations. We only recommend desiccant / dry air dryers or vacuum dryers. Too long a drying time and the resulting residual moisture content below the lower limit can lead to filling problems and surface defects. The specified drying time refers to closed and undamaged bagged material. When processing from previously opened bags or from octabins with polyolefin inliners, a longer drying time may be necessary. It is recommended to check the residual moisture content after the drying process.



D	Drying time	0 - 4 h
	Drying temperature (τ <= -30°C)	80 °C
	Processing moisture	0,02 - 0,1 %
1	Feed section	60 - 80 °C
2	Temperature Zone 1 - Zone 4	240 - 290 °C
3	Nozzle temperature	240 - 300 °C
4	Melt temperature	270 - 290 °C
5	Mold temperature	80 - 100 °C
\ominus	Holding pressure, spec.	300 - 800 bar
\bigcirc	Back pressure, spec.	50 - 150 bar
	Injection speed	medium to high
	Screw speed	8 - 15 m/min