AKROMID® PRELIMINARY
T9 ICF 40 1 black (7909)

PPA CF 40

AKROMID® T9 ICF 40 1 black (7909) is a 40% carbon fibre polyphthalamide with high stiffness and strength, as well as high chemical resistance. The compound is based on PA9T and has lower moisture uptake than conventional PA6T variants. This leads to a significantly higher consistency of the glass transition temperature and higher strength at elevated temperatures especially in conditioned state.

Features

heat stabilised 130 | recycled content | reduced moisture | metal substitution

Properties

Modulus	Strength	Impact
30.000 MPa	**235** MPa	**50** kJ/m²

Mechanical Properties

Tensile modulus ISO 527-2	1 mm/min | d.a.m.	**30000 MPa**
Tensile stress at break ISO 527-2	5 mm/min | d.a.m.	**235 MPa**
Tensile strain at break ISO 527-2	5 mm/min | d.a.m.	**1,1 %**
Charpy impact strength ISO 179-1/1eU	23°C | d.a.m.	**50 kJ/m²**
Charpy notched impact strength ISO 179-1/1eA	23°C | d.a.m.	**7 kJ/m²**

Thermal Properties

Melting temperature ISO 11357-3	DSC, 10K/min	**300 °C**

+135-3858-6433 (GuangDong)
+188-1699-6168 (ShangHai)
+852-6957-5415 (HongKong)

AKRO COMPOUNDS

Compound No.: **7909**

Flammability

Flammability UL 94	1,6 mm Wall thickness	**HB Class**

General Properties

Density ISO 1183	23°C	**1,32 g/cm³**

Electrical Properties

Surface resistivity IEC 62631-3-2	d.a.m.	**10^{1} Ω**

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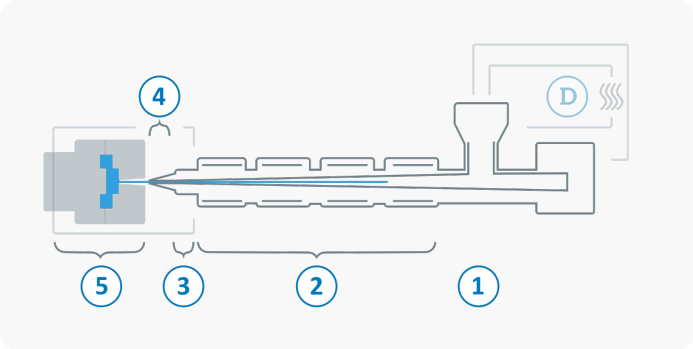
Processing

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)	120 °C
	Processing moisture	<0,05 %
1	Feed section	60 - 90 °C
2	Temperature Zone 1 - Zone 4	310 - 340 °C
3	Nozzle temperature	320 - 350 °C
4	Melt temperature	320 - 340 °C
5	Mold temperature	>150 °C
→	Holding pressure, spec.	300 - 800 bar
←	Back pressure, spec.	50 - 150 bar
	Injection speed	medium to high
	Screw speed	8 - 15 m/min