

AKROMID®

B3 GF 30 2 RM-D black (3424)

PA6+ABS GF30

AKROMID® B3 GF 30 2 RM-D black (3424) is a 30% glass fibre reinforced, UV-stabilised polyamide 6 with limited moisture absorption. The material is characterised by good adhesion to PUR systems.

Features

UV-stabilised reduced moisture

Properties

Modulus

9.300 MPa

Strength

145 MPa

Impact

55 kJ/m²

Mechanical Properties

Tensile modulus

ISO 527-2

1 mm/min | d.a.m.

9300 MPa

1 mm/min | conditioned

7000 MPa

Tensile stress at break

ISO 527-2

5 mm/min | d.a.m.

145 MPa

5 mm/min | conditioned

110 MPa

Tensile strain at break

ISO 527-2

5 mm/min | d.a.m.

2,3 %

5 mm/min | conditioned

3 %

Flexural modulus

ISO 178

2 mm/min | d.a.m.

9200 MPa

Flexural strength

ISO 178

2 mm/min | d.a.m.

210 MPa

Flexural strain at break

ISO 178

2 mm/min | d.a.m.

2,6 %

Charpy impact strength

ISO 179-1/1eU

23°C | d.a.m.

55 kJ/m²

23°C | conditioned

50 kJ/m²

-30°C | d.a.m.

50 kJ/m²

-30°C | conditioned

45 kJ/m²

Charpy notched impact strength

ISO 179-1/1eA

23°C | d.a.m.

13 kJ/m²

23°C | conditioned

11 kJ/m²

-30°C | d.a.m.

11 kJ/m²

-30°C | conditioned

9 kJ/m²

Ball indentation hardness

ISO 2039-1

961N/30s | d.a.m.

195 MPa

Thermal Properties

Temperature of deflection under load HDT/A

ISO 75

1,8 MPa

175 °C

Melting temperature

ISO 11357-3

DSC, 10K/min

220 °C

Coefficient of linear thermal expansion

ISO 11359-1/2

23°C to 80°C | parallel

0,18 10⁻⁴/K

23°C to 80°C | transverse

1,05 10⁻⁴/K

Flammability

Flammability

UL 94

0,8 mm Wall thickness

HB Class

Burning rate (<100 mm/min)

FMVSS 302

> 1 mm Thickness

+

General Properties

Density

ISO 1183

23°C

1,33 g/cm³

Humidity absorption

ISO 1110

70°C, 62% r.H.

1,4 %

Molding shrinkage

ISO 294-4

flow

0,1 - 0,3 %

transverse

0,5 - 0,7 %

Rheological Properties

MVR

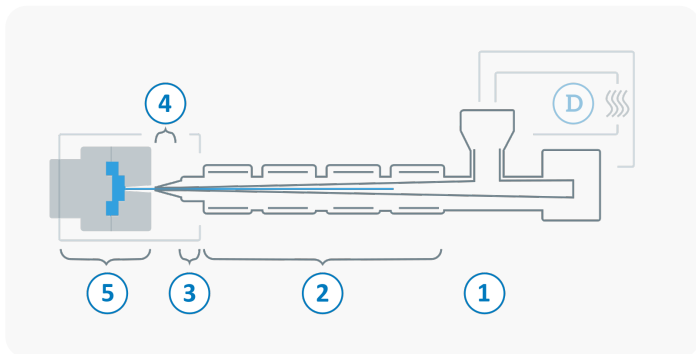
ISO 1133

275°C/5kg

12 cm³/10 min

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 ($\tau \leq -30^{\circ}\text{C}$)	80 °C
Processing moisture	0,02 - 0,1 %
(1) Feed section	60 - 80 °C
(2) Temperature Zone 1 - Zone 4	220 - 280 °C
(3) Nozzle temperature	240 - 290 °C
(4) Melt temperature	240 - 280 °C
(5) Mold temperature	80 - 100 °C
(→) Holding pressure, spec.	300 - 800 bar
(←) Back pressure, spec.	50 - 150 bar
Injection speed	medium to high
Screw speed	8 - 15 m/min