

AKROMID®

C3 GF 35 1 natural (4748)

PA66+PA6 GF35

AKROMID® C3 GF 35 1 natural (4748) is a 35% glass fiber reinforced polyamide 6.6/6 blend. It is characterised by a high stiffness and strength. Furthermore, the material is heat stabilised and therefore perfectly suitable for technical parts in industrial engineering and in the automotive industry. The material has a light inherent color.

Features

heat stabilised 130

Properties

Modulus

11.000 MPa

Strength

200 MPa

Impact

100 kJ/m²

Mechanical Properties

Tensile modulus

ISO 527-2

1 mm/min | d.a.m.

11000 MPa

Tensile stress at break

ISO 527-2

5 mm/min | d.a.m.

200 MPa

Tensile strain at break

ISO 527-2

5 mm/min | d.a.m.

3 %

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.

17 kJ/m²

Thermal Properties

Melting temperature

ISO 11357-3

DSC, 10K/min

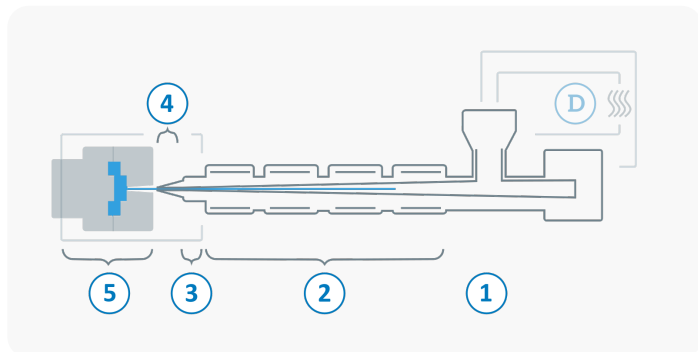
260 °C

General Properties

| | | |
|---------------------------------------|------------|------------------------------|
| Density ISO 1183 | 23°C | 1,40 g/cm³ |
| Molding shrinkage ISO 294-4 | flow | 0,1 - 0,3 % |
| | transverse | 0,55 - 0,75 % |

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 | 260 - 300 °C |
| 3 | Nozzle temperature | 270 - 300 °C |
| 4 | Melt temperature | 270 - 300 °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 |