

# AKROLEN® PRELIMINARY

## NEXT PP LGF 40 2 black (8488BMBCI)

PP LGF40

AKROLEN® NEXT PP LGF 40 2 black (8488BMBCI) is based on biomass-balanced polypropylene copolymer. With 40% long glass fiber reinforcement, very high stiffness and strength can be achieved. The materials very good surface quality as well as the outstanding UV-stability make it the product of your choice for technical parts which are exposed to UV radiation. The material is certified according to ISCC PLUS. 80% of the fossil raw materials required for manufacturing this product were replaced by sustainable biomass-balanced PP (Allocation factor).

### Features

biomass balanced   UV-stabilised   Sports & leisure

### Regulatory



### Properties

#### Modulus

10.100 MPa

#### Strength

140 MPa

#### Impact

81 kJ/m²

## Sustainability

### Allocation factor

only valid for ISCC PLUS/REDcert² certified products

80 %

## Mechanical Properties

### Tensile modulus

ISO 527-2

1 mm/min | d.a.m.

10100 MPa

### Tensile stress at break

ISO 527-2

5 mm/min | d.a.m.

140 MPa

### Tensile strain at break

ISO 527-2

5 mm/min | d.a.m.

2 %

### Charpy impact strength

ISO 179-1/1eU

23°C | d.a.m.

81 kJ/m²

### Charpy notched impact strength

ISO 179-1/1eA

23°C | d.a.m.

32 kJ/m²

## Thermal Properties

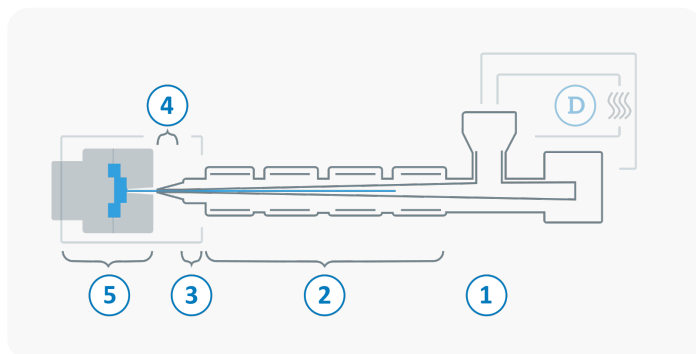
<b>Temperature of deflection under load HDT/A</b> ISO 75	1,8 MPa	<b>160 °C</b>
<b>Melting temperature</b> ISO 11357-3	DSC, 10K/min	<b>165 °C</b>

## General Properties

<b>Density</b> ISO 1183	23°C	<b>1,23 g/cm<sup>3</sup></b>
<b>Molding shrinkage</b> ISO 294-4	flow	<b>0,3 - 0,5 %</b>
	transverse	<b>0,4 - 0,6 %</b>

## 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.



<b>D</b>	Drying time	0 - 3 h
	Drying temperature ( $\tau \leq -30^{\circ}\text{C}$ )	80 °C
	Processing moisture	0,1 %
<b>1</b>	Feed section	40 - 80 °C
<b>2</b>	Temperature Zone 1 - Zone 4	200 - 255 °C
<b>3</b>	Nozzle temperature	200 - 255 °C
<b>4</b>	Melt temperature	215 - 265 °C
<b>5</b>	Mold temperature	30 - 80 °C
<b>→</b>	Holding pressure, spec.	300 - 800 bar
<b>←</b>	Back pressure, spec.	10 - 30 bar
	Injection speed	slow to medium
	Screw speed	5 - 15 m/min