

## Technical Data Sheet

### Moplen HP3644



Polypropylene, Homopolymer

#### Product Description

Moplen HP3644 is a polypropylene homopolymer designed for the production of biaxially oriented polypropylene films (BOPP). The product is suitable for metallizable film, use in monolayer and in coextruded structures. It contains a standard processing stabilisation but does not contain any slip, antiblocking agents and is Calcium Stearate free.

Moplen HP3644 offers good optical, easy processing and very good film profile. Typical applications are BOPP packaging films and Solid Phase Thermoforming sheets.

Moplen HP3644 is suitable for food contact

<b>Application</b>	Food Packaging Film; Thermoformed Food Containers
<b>Market</b>	Flexible Packaging
<b>Processing Method</b>	BOPP; Thermoforming
<b>Attribute</b>	Good Processability; High Clarity; High Gloss; Homopolymer; Medium Flow

Typical Properties	Nominal Value	Units	Test Method
<b>Physical</b>			
Melt Flow Rate			
(230 °C/2.16 kg)	3.0	g/10 min	ISO 1133-1
(230 °C/2.16 kg)	3.0	g/10 min	ASTM D1238
Density	0.90	g/cm <sup>3</sup>	ISO 1183-1
(23 °C)	0.90	g/cm <sup>3</sup>	ASTM D792
<b>Mechanical</b>			
Flexural Modulus	1500	MPa	ASTM D790
Tensile Strength at Yield	33	MPa	ASTM D638
Tensile Stress at Break, (23 °C, 50 mm/min)	23	N/mm <sup>2</sup>	ISO 527-1, -2
Tensile Stress at Yield, (23 °C, 50 mm/min)	34	N/mm <sup>2</sup>	ISO 527-1, -2
Tensile Elongation at Yield	11	%	ASTM D638
Tensile Strain at Break, (23 °C, 50 mm/min)	>500	%	ISO 527-1, -2
Tensile Strain at Yield, (23 °C, 50 mm/min)	12	%	ISO 527-1, -2
<b>Impact</b>			
Notched Izod Impact Strength, (34 °C)	34	J/m	ASTM D256
<b>Hardness</b>			
Shore Hardness, (Shore D)	70		ISO 868
<b>Thermal</b>			
Vicat Softening Temperature, (A50)	154	°C	ISO 306
Deflection Temperature Under Load			
(0.46 N/mm <sup>2</sup> )	97	°C	ASTM D648
(0.45 MPa, Unannealed)	85	°C	ISO 75B-1, -2