



POLYPROPYLENE RANDOM COPOLYMER

MOPLEN EP548S

Producer: Lyondell Basell / Europe

Description: **Moplen EP548S** is a nucleated heterophasic copolymer with antistatic agent used for injection moulding applications. It exhibits an outstanding balance of mechanical properties combined with a medium high fluidity.

Moplen EP548S is extensively used in housewares and in thin-walled containers for food packaging (e.g. Margerine tubs,yoghurt pots, etc.).

Applications: Sports, Leisure and Toys, Housewares, Opaque Containers

TYPICAL PROPERTIES	METHOD	VALUE	UNIT
Density	ISO 1183	0.9	g/cm ³
Melt Flow Rate (MFR) (230°C/2.16kg)	ISO 1133	44	g/10 min
Melt volume flow rate ((230°C/2.16kg)	ISO 1133	59	cm ³ /10 min
<u>Mechanical</u>			
Tensile Modulus	ISO 527-1, -2	1550	Mpa
Tensile Stress at Yield	ISO 527-1, -2	28	Mpa
Tensile Strain at Break	ISO 527-1, -2	30	%
Tensile Stress at Yield	ISO 527-1, -2	5	%
<u>Impact</u>			
Charpy unnotched impact strength (23°C, Type 1, Edgewise)	ISO 179	110	kJ/m ²
(0°C, Type 1, Edgewise)		100	kJ/m ²
(-20°C, Type 1, Edgewise)		85	kJ/m ²
Charpy unnotched impact strength (23°C, Type 1, Edgewise, Notch A)	ISO 179	5.0	kJ/m ²
(0°C, Type 1, Edgewise, Notch A)		3.5	kJ/m ²
(-20°C, Type 1, Edgewise, Notch A)		3.0	kJ/m ²
Ductile/Brittle transition temperature	ISO 6603-2	-53	°C
<u>Hardness</u>			
Ball indentation hardness (H 358/30)	ISO 2039-1	68	MPa
<u>Thermal</u>			
Heat deflection temperature B (0.445 Mpa) Unannealed	ISO 75B-1,-2	95	°C
Vicat softening temperature A/50	ISO 306	151	°C
Vicat softening temperature B/50	ISO 306	80	°C