



Hostalen CRP 100 RESIST CR orange

Polyethylene, High Density

Product Description

Hostalen CRP 100 RESIST CR orange is a high density polyethylene (HDPE), orange coloured similar RAL 1033 with high melt viscosity for extrusion, injection and compression moulding. The product is classified as PE 100-RC and provides a very good long term hydrostatic strength. Especially developed for non-conventional pipe installations methods the product has a superior resistance to slow crack growth. It fulfils the material requirements of PAS 1075:2009-04.

It is not allowed for any medical, pharmaceutical or food contact application.

Product Characteristics

Status	Commercial: Active
Test Method used	ISO
Availability	Europe, North America, Asia-Pacific, Australia/NZ, Africa-Middle East, Latin America
Processing Methods	Extrusion Pipe Sheet and Semi Finished Products
Typical Customer Applications	Gas Pipe, Industrial

Typical Properties	Method	Value	Unit
Physical			
Density	ISO 1183	0.950	g/cm ³
Melt flow rate (MFR)	ISO 1133		
(190°C/21.6kg)		7.3	g/10 min
(190°C/5.0kg)		0.27	g/10 min
Mechanical			
Tensile Modulus (23 °C, v = 1 mm/min, Secant)	ISO 527-1, -2	1050	MPa
Tensile Stress at Yield (23 °C, v = 50 mm/min)	ISO 527-1, -2	23	MPa
Tensile Strain at Yield (23 °C, v = 50 mm/min)	ISO 527-1, -2	9	%
Tensile Creep Modulus 1h	ISO 899-1	850 [2.0]	MPa
Note: [Test stress in MPa]			
Tensile Creep Modulus 1000h	ISO 899-1	360 [2.0]	MPa
Note: [Test stress in MPa]			
Maximum elongation TD	EN 638	≥ 350	%
MRS classification	ISO/TR 9080	10	MPa
FNCT (4.0 MPa, 2% Arkopal N 100, 80°C)	ISO 16770	≥ 8760	h
Flexural creep modulus	DIN 19537-2		
(4 point loading method, 1 min-value)		1100	MPa
(4 point loading method, 24 h-value)		560	MPa
(4 point loading method, 2000 h-value)		330	MPa
Impact			
Charpy notched impact strength	ISO 179		
(23 °C)		26	kJ/m ²
(-30 °C)		13	kJ/m ²
Hardness			
Shore hardness (Shore D (3 sec))	ISO 868	62	
Thermal			
Vicat softening temperature (VST/B/50 K/h (50 N))	ISO 306	74	°C
Oxidation induction time (OIT) (210°C)	ISO 11357-6 / EN 728	≥ 30	min

Additional Properties

Processing:
Recommended melt temperatures: 190-220 °C.
Recommended injection moulding temperatures: 200-280 °C.

Notes

Typical properties; not to be construed as specifications.