MARPOL® ULTRA LOW DENSITY

Ethylene Vinyl Acetate Copolymer

Marco Polo International, Inc.

Message:

MARPOL® Ultra Low Density is an ethylene-copolymer resin that exhibits great flow characteristics and is suitable across an array of applications. Recommended Applications: General purpose thermoplastic elastomers, wire, cable, blending with polypropylene and polyethylene. Also good for applications requiring good electrical, heat aging and weather resistance properties.

Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness ASTM D2240 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Termal Nominal Value Unit Test Method	General Information			
Good electrical performance Good liquidity Good heat aging resistance Uses Wire and cable applications Mixing General Physical Nominal Value Unit Test Method Specific Gravity 0,870 - 0,890 0,870 - 0,890 0,700 min ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2-16* kg) Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness 66 Shaw A 1 sec 67 Shaw A 1 sec 68 Mu ASTM D240 Mechanical Nominal Value Unit Test Method Test Method Test Method Test Method Test Method MPa ASTM D638 Tensile Strength 2,30 MPa ASTM D638 Tensile Elongation (Break) 1100 MPa ASTM D638 Tensile Inogetion (Break) 1109 MPa ASTM D638 Tensile Strength 109 MPa ASTM D790 ASTM D790 Residency MPa AST	Features	Low density		
Good liquidity Good heat aging resistance Good weather resistance Good weather resistance Wire and cable applications Mixing General Wire and Cable applications Mixing M		Copolymer		
Good heat aging resistance Good weather resistance Good weathere		Good electrical performance		
Good weather resistance Good weather res		Good liquidity		
Wire and cable applications Mixing General		Good heat aging resistance		
Physical Nominal Value Unit Test Method Specific Gravity 0.870 - 0.890 g/cm³ ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness 66 Shaw A, 1 sec 66 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D638 ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Thermal N		Good weather resistance		
Physical Nominal Value Unit Test Method Specific Gravity 0.870 - 0.890 g/cm³ ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness 4STM D2240 ASTM D2240 Shaw A, 1 sec 66 3.0 ASTM D2240 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 1100 % ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tensile Strength 37.1 KN/m ASTM D624	Uses	Wire and cable applications		
Physical Nominal Value Unit Test Method Specific Gravity 0.870 - 0.890 g/cm³ ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness Korn D2240 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength 5.70 MPa ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Thermal Nominal Value Unit Te		Mixing		
Specific Gravity 0.870 - 0.890 g/cm³ ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness ASTM D2240 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 1100 % ASTM D638 Flexural Modulus 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Test Strength Nominal Value Unit Test Method		General		
Specific Gravity 0.870 - 0.890 g/cm³ ASTM D792 Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness ASTM D2240 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 1100 % ASTM D638 Flexural Modulus 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Test Strength Nominal Value Unit Test Method	Physical	Nominal Value	Unit	Test Method
Melt Mass-Flow Rate (MFR) (190°C/2.16 kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness ASTM D2240 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 1100 % ASTM D638 Flexural Modulus 10.9 MPa ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Thermal Nominal Value Unit Test Method	•			
kg) 3.0 - 7.0 g/10 min ASTM D1238 Mooney Viscosity (ML 1+4, 121°C) 8 MU ASTM D1646 Hardness Nominal Value Unit Test Method Durometer Hardness 66 ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 4STM D790 MPa ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Termal Nominal Value Unit Test Method	·		<i>9, •···</i>	
Hardness Nominal Value Unit Test Method Durometer Hardness ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5.70 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 10.9 MPa ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Terroral Nominal Value Unit Test Method	kg)	3.0 - 7.0	g/10 min	ASTM D1238
Durometer Hardness ASTM D2240 Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5,70 MPa ASTM D638 100% strain 2,30 MPa ASTM D638 Flexural Modulus 1100 % ASTM D638 Flexural Modulus MPa ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Mooney Viscosity (ML 1+4, 121°C)	8	MU	ASTM D1646
Shaw A, 1 sec 66 ASTM D2240 Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 5.70 MPa ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Hardness	Nominal Value	Unit	Test Method
Shaw D, 1 sec 17 ASTM D2240 Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 ASTM D638 5.70 MPa ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant ASTM D790 2% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Durometer Hardness			ASTM D2240
Mechanical Nominal Value Unit Test Method Tensile Strength ASTM D638 5.70 MPa ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Shaw A, 1 sec	66		ASTM D2240
Tensile Strength ASTM D638 5.70 MPa ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Shaw D, 1 sec	17		ASTM D2240
5.70 MPa ASTM D638 100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus ASTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Mechanical	Nominal Value	Unit	Test Method
100% strain 2.30 MPa ASTM D638 Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus XSTM D790 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	Tensile Strength			ASTM D638
Tensile Elongation (Break) 1100 % ASTM D638 Flexural Modulus 1% secant 10.9 MPa ASTM D790 2% secant 10.8 MPa ASTM D790 Elastomers Nominal Value Unit Test Method Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method		5.70	MPa	ASTM D638
Flexural Modulus 1% secant 10.9 MPa ASTM D790 ASTM D790 ASTM D790 ASTM D790 MPa ASTM D790 ASTM D790 MPa ASTM D790 MPa ASTM D790 Listomers Nominal Value Unit Test Method Tear Strength Nominal Value Unit Test Method Test Method	100% strain	2.30	MPa	ASTM D638
1% secant10.9MPaASTM D7902% secant10.8MPaASTM D790ElastomersNominal ValueUnitTest MethodTear Strength37.1kN/mASTM D624ThermalNominal ValueUnitTest Method	Tensile Elongation (Break)	1100	%	ASTM D638
2% secant10.8MPaASTM D790ElastomersNominal ValueUnitTest MethodTear Strength37.1kN/mASTM D624ThermalNominal ValueUnitTest Method	Flexural Modulus			ASTM D790
ElastomersNominal ValueUnitTest MethodTear Strength37.1kN/mASTM D624ThermalNominal ValueUnitTest Method	1% secant	10.9	MPa	ASTM D790
Tear Strength 37.1 kN/m ASTM D624 Thermal Nominal Value Unit Test Method	2% secant	10.8	MPa	ASTM D790
Thermal Nominal Value Unit Test Method	Elastomers	Nominal Value	Unit	Test Method
	Tear Strength	37.1	kN/m	ASTM D624
Vicat Softening Temperature 37.0 °C ASTM D1525	Thermal	Nominal Value	Unit	Test Method
	Vicat Softening Temperature	37.0	°C	ASTM D1525

The information and data on this page are provided by manufacturers and document providers. SHANGHAI SUSHENG assumes no legal liability. It is strongly recommended to verify all technical data with material suppliers before final material selection. All rights belong to the original authors. If any infringement occurs, please contact us immediately.

Recommended distributors for this material

Susheng Import & Export Trading Co.,Ltd.

Tel: +86 21 5895 8519

Phone: +86 13424755533 Email: sales@su-jiao.com

No. 215, Lianhe North Road, Fengxian District, Shanghai, China

