

## V251.A57.B

#### **PRODUCT DESCRIPTION**

A soft , black thermoplastic vulcanizate, TPV (EPDM/PP) in the thermoplastic elastomer (TPE) family which offers higher temperature resistance and very good compression set with very good UV resistance. This product is specially designed for weatherseal applications.

GENERAL PROPERTIES			
Material Status	Active		
Availability	Europe North America Asia- Pasific Africa & Middle East		
Features	Ozone Resistance Adhesion to Polyolefins Recyclable Compliant with RoHS Directive 2011/65/EU		
Certification	RoHS		
Appearance	Black		
Form	Pellets		
Processing Method	Injection,Extrusion		
	Automotivo Spocifications		

GM/GMW 15812P (TYPE 4E)

CHRYSLER MS-AR-100 AGV

Property	Typical Value (English)	Typical Value (SI)	Test Method	
Density	0.96 g/cm <sup>3</sup>	0,96 g/cm <sup>3</sup>	ASTM D 792	
Durometer Hardness, 3 sec (Shore A)	57.00	57,00	ASTM D 2240	
Tensile Strength at Break	653 Psi	4,50 MPa	ASTM D412, Method A	
Mod.of Elasticity %100	f Elasticity %100 218 Psi		ASTM D412, Method A	
Mod.of Elasticity %300	377 Psi		ASTM D412, Method A	
Elongation at break	500.00 %	500,00 %	ASTM D412, Method A	
Compression Set (at 73 °F, 22 h)	t (at 73 °F, 22 h) 17.00 %		ASTM D 395, Type 2, Method E	
Compression Set (at 158 °F, 22 h)	ion Set (at 158 °F, 22 h) 27.00 %		ASTM D 395, Type 2, Method E	
Compression Set (at 212 °F, 22 h)	) 33.00 %		ASTM D 395, Type 2, Method E	
Tear Resistance	114.20 lbf/in	20,00 N/mm	ASTM D624	

Snrinkage					
Property	Typical Value (English)	Typical Value (SI)	Test Method		
Flow	2.00%	2.00%	ASTM D955		
Across Flow	1.68%	1.68%	ASTM D955		
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### elast n ENGINEERING LIFE

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Ageing Tests					
Additional Information	Typical Value (English)	Typical Value (SI)	Test Method		
Ozone Resistance-Stressed	No cracks	No cracks	ASTM D 1149		
Bondable to					
PE					

Elastron products are not compatible with PVC and Acetal. Regrinding level up to %20 is recommended with minimum property loss.

Injection Molding	Typical Value (English)		Typical Value (SI)	
Drying temperatures	194	°F	90	°C
Drying time	2	hours	2	hours
Rear Zone temp.	311-347	°F	155- 175	°C
Middle Zone temp.	329-365	°F	165- 185	°C
Front Zone temp.	338-374	°F	170- 190	°C
Nozzle Temperature	356-410	°F	180- 210	°C
Injection Speed	High	-	High	-
Injection Time	1- 3	sec.	1- 3	sec.
Injection Pressure	10-40	bar	10-40	bar
Hold Pressure	5- 20	bar	5- 20	bar
Back Pressure	5- 40	bar	5- 40	bar
Screw Speed	50- 200	rpm	50- 200	rpm
Mold Temperature	77-122	°F	25- 50	°C
Screw Comp. ratio	2.0:1- 4.0:1	-	2.0:1- 4.0:1	-
Screw L/D ratio	18- 24	-	18- 24	-
Residence time	1-2 shot	-	1-2 shot	-
Cushion size	0.3120	inc	8	mm
Suggested Max Regrind	20	%	20	%

Extrusion Molding	Typical Value (English)		Typical V	'alue (SI)
Drying temperatures	194	°F	90	°C
Drying time	2	hours	2	hours
Screw Comp. Ratio	2.0:1- 4.0:1	-	2.0:1- 4.0:1	-
Screw L/D	18- 30	-	18- 30	-
Feed Zone temp.	311-329	°F	155- 165	°C
Rear Zone temp.	320-356	°F	160- 180	°C
Center Zone temp.	329-365	°F	165- 185	°C
Front Zone temp.	338-374	°F	170- 190	°C
Head temp.	356-410	°F	180- 210	°C
Die temp.	365-419	°F	185- 215	°C
Suggested Max Regrind	20	%	20	%
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#### ISO 9001: 2015 & IATF16949: 2016 & ISO 14001: 2015 REGISTERED QUALITY SYSTEMS



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