

# Sarlink® TPE ML-1130B BLK (PRELIMINARY DATA)

Teknor Apex Company - Thermoplastic Elastomer

Thursday, June 29, 2017

## General Information

### Product Description

Sarlink ML-1100 is a general purpose thermoplastic elastomer series, available in NAT and BLK designed for automotive interior applications. Sarlink ML-1130B BLK is a low hardness, high density, filled grade suitable for injection molding.

### General

Material Status	• Preliminary Data		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America
Features	• Chemical Resistant • Filled • Good Adhesion • Good Flexibility	• Good Moldability • Good Tear Strength • Good Toughness • High Density	• High Specific Gravity • Low Flow • Low Hardness • Resilient
Uses	• Automotive Applications • Automotive Interior Parts • Flexible Grips	• General Purpose • Grommets • Knobs	• Rubber Replacement • Soft Touch Applications
RoHS Compliance	• RoHS Compliant		
Appearance	• Black		
Forms	• Pellets		
Processing Method	• Injection Molding		

## ASTM & ISO Properties <sup>1</sup>

Physical	Nominal Value	Unit	Test Method
Density	1.19	g/cm <sup>3</sup>	ISO 1183
Melt Mass-Flow Rate (MFR) (190°C/2.16 kg)	0.50	g/10 min	ASTM D1238
Elastomers	Nominal Value	Unit	Test Method
Tensile Stress <sup>2</sup>			ISO 37
Across Flow : 100% Strain	79.8	psi	
Flow : 100% Strain	146	psi	
Tensile Stress <sup>2</sup>			ISO 37
Across Flow : Break	479	psi	
Flow : Break	305	psi	
Tensile Elongation <sup>2</sup>			ISO 37
Across Flow : Break	860	%	
Flow : Break	470	%	
Tear Strength <sup>3</sup>			ISO 34-1
Across Flow	70	lbf/in	
Flow	93	lbf/in	
Compression Set <sup>4</sup>			ISO 815
73°F, 22 hr	15	%	
158°F, 22 hr	39	%	
194°F, 70 hr	71	%	
257°F, 70 hr	94	%	
Hardness	Nominal Value	Unit	Test Method
Shore Hardness			ISO 868
Shore A, 1 sec, Injection Molded	32		
Shore A, 5 sec, Injection Molded	30		
Shore A, 15 sec, Injection Molded	28		

上海松翰塑化科技有限公司  
 TEKNOR APEX 一级分销商  
 teknorapex.shshsj.com 联系电话: 021-58958519

Revision Date: 2/24/2017

The information and recommendations contained in this bulletin are, to the best of our knowledge, accurate and reliable but no guarantee of their accuracy is made. All products are sold upon condition that purchasers shall make their own tests to determine the suitability of such products for their particular purposes and uses and purchasers assume all risks and liability for the results of use of the products, including use in accordance with seller's recommendations. Nothing in this bulletin constitutes permission or a recommendation to practice or use any invention covered by any patent owned by this company or by others. There is no warranty of merchantability and there are no other warranties for the products described.

# Sarlink® TPE ML-1130B BLK (PRELIMINARY DATA)

## Teknor Apex Company - Thermoplastic Elastomer

Aging	Nominal Value	Unit	Test Method
Change in Tensile Strength in Air <sup>5</sup>			ISO 188
Across Flow : 230°F, 1008 hr	70	%	
Flow : 230°F, 1008 hr	120	%	
Across Flow : 100% Strain 230°F, 1008 hr	-1.8	%	
Flow : 100% Strain 230°F, 1008 hr	-16	%	
Across Flow : 257°F, 168 hr	73	%	
Flow : 257°F, 168 hr	130	%	
Across Flow : 100% Strain 257°F, 168 hr	-7.3	%	
Flow : 100% Strain 257°F, 168 hr	-20	%	
Change in Tensile Strain at Break in Air <sup>5</sup>			ISO 188
Across Flow : 230°F, 1008 hr	23	%	
Flow : 230°F, 1008 hr	99	%	
Across Flow : 257°F, 168 hr	45	%	
Flow : 257°F, 168 hr	110	%	
Change in Shore Hardness in Air			ISO 188
Shore A, 230°F, 1008 hr <sup>6</sup>	-2.2		
Shore A, 230°F, 1008 hr	-2.1		
Shore A, 230°F, 1008 hr <sup>7</sup>	-3.6		
Shore A, 257°F, 168 hr <sup>8</sup>	-2.9		
Shore A, 257°F, 168 hr <sup>6</sup>	-3.2		
Shore A, 257°F, 168 hr <sup>7</sup>	-3.5		

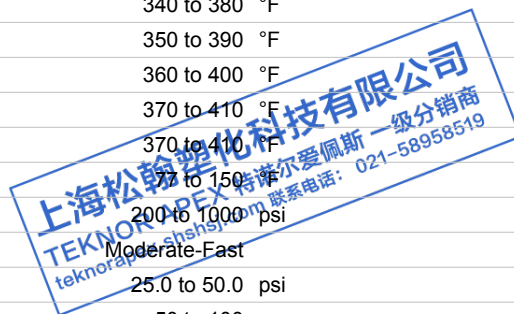
Fill Analysis	Nominal Value	Unit	Test Method
Apparent Viscosity (392°F, 206 sec <sup>-1</sup> )	177	Pa·s	ASTM D3835
Additional Information	Nominal Value	Unit	Test Method
Xenon Weatherometer			SAE J1885
For BLK grade only: Delta E - 1250 kJ	0.380		
For BLK grade only: Delta E - 2500 kJ	0.400		

### Legal Statement

The information and recommendations contained in this bulletin are, to the best of our knowledge, accurate and reliable but no guarantee of their accuracy is made. All products are sold upon condition that purchasers shall make their own tests to determine the suitability of such products for their particular purposes and uses and purchaser assumes all risks and liability for the results of use of the products, including use in accordance with seller's recommendations. Nothing in this bulletin constitutes permission or a recommendation to practice or use any invention covered by any patent owned by this company or others. There is no warranty of merchantability and there are no other warranties for the products described. For detailed Product Stewardship information, please contact us. Any product of Teknor Apex, including product names, shall not be used or tested in medical or food contact applications without the prior written acknowledgement of Teknor Apex as to the intended use. Please note that some products may not be available in one or more countries.

### Processing Information

Injection	Nominal Value	Unit
Rear Temperature	340 to 380	°F
Middle Temperature	350 to 390	°F
Front Temperature	360 to 400	°F
Nozzle Temperature	370 to 410	°F
Processing (Melt) Temp	370 to 410	°F
Mold Temperature	77 to 150	°F
Injection Pressure	200 to 1000	psi
Injection Rate	Moderate-Fast	
Back Pressure	25.0 to 50.0	psi
Screw Speed	50 to 100	rpm
Cushion	0.150 to 1.00	in



Revision Date: 2/24/2017

The information and recommendations contained in this bulletin are, to the best of our knowledge, accurate and reliable but no guarantee of their accuracy is made. All products are sold upon condition that purchasers shall make their own tests to determine the suitability of such products for their particular purposes and uses and purchasers assume all risks and liability for the results of use of the products, including use in accordance with seller's recommendations. Nothing in this bulletin constitutes permission or a recommendation to practice or use any invention covered by any patent owned by this company or by others. There is no warranty of merchantability and there are no other warranties for the products described.

# Sarlink® TPE ML-1130B BLK (PRELIMINARY DATA)

## Teknor Apex Company - Thermoplastic Elastomer

### Injection Notes

Drying is not necessary. However, if moisture is a problem, dry the pellets for 2 to 4 hours at 150°F (65°C).

### Notes

<sup>1</sup> Typical properties: these are not to be construed as specifications.

<sup>2</sup> Type 1, 20 in/min

<sup>3</sup> Method Ba, Angle (Unnicked), 20 in/min

<sup>4</sup> Type A

<sup>5</sup> Type 1

<sup>6</sup> 5 sec

<sup>7</sup> 1 sec

<sup>8</sup> 15 sec

### Teknor Apex Company Corporate Headquarters

*In U.S. for Vinyls, TPEs, Colorants,  
Engineered Thermoplastics (Chem Polymer)*

505 Central Avenue  
Pawtucket, Rhode Island 02861 U.S.

Phone: 401-725-8000  
Fax: 401-725-8095  
Toll Free (U.S. only) 800-556-3864

info@teknorapex.com

### Teknor Apex U.K. Ltd.

Tat Bank Road  
Oldbury, West Midlands B69 4NH England

Phone: (44) 121-665-2100  
Fax: (44) 121-544-5530

etpsales@teknorapex.co.uk

上海松翰塑化科技有限公司  
TEKNOR APEX 特诺尔爱佩斯 一级分销商  
teknorapex.shshsj.com 联系电话: 021-58958519

Revision Date: 2/24/2017

The information and recommendations contained in this bulletin are, to the best of our knowledge, accurate and reliable but no guarantee of their accuracy is made. All products are sold upon condition that purchasers shall make their own tests to determine the suitability of such products for their particular purposes and uses and purchasers assume all risks and liability for the results of use of the products, including use in accordance with seller's recommendations. Nothing in this bulletin constitutes permission or a recommendation to practice or use any invention covered by any patent owned by this company or by others. There is no warranty of merchantability and there are no other warranties for the products described.