

## PRODUCT INFORMATION

### TYPICAL VALUES

Plastazote® is a closed cell, cross-linked polyethylene block foam manufactured using Zotefoams unique production process.

The values provided in this product information represent data gathered from random samples of Plastazote® LD33 foam and represent typical data. These are given to the best of our knowledge and should be considered as guidance for selecting a suitable grade for a given application.

PROPERTY	TEST STANDARD	UNITS	TYPICAL VALUE
<b>Apparent Density</b> Skin/Skin	BS EN ISO 7214:2012	kg/m <sup>3</sup>	(nominal) 33
<b>Cell Size</b> (Cell Diameter)	Internal	mm	0.4
<b>Compression Stress-Strain</b> 25% compression 50% compression	"BS EN ISO 7214:2012 25 mm cell-cell"	kPa	66 133
<b>Tensile Strength</b> <b>Tensile Elongation</b>	BS EN ISO 7214:2012	kPa %	419 149
<b>Flammability</b> <b>Automotive</b>	FMVSS.302 – Burn rate	<100mm/min.	Pass at 9mm
<b>Compression Set</b> 25% comp., 22hr, 23°C ½ hr recovery" 24 hr recovery	"BS EN ISO 7214:2012 25 mm cell-cell"	% set	9 4
<b>Tear Strength</b>	"BS EN ISO 8067:2008 Method B"	N/m	1888
<b>Shore Hardness</b> 00 Scale"	BS EN ISO 868:2003		58
<b>Recommended maximum operating temperature*</b>	Internal	°C	95
<b>Water absorption</b>	ISO 2869:2001 Ed3.	%	<1
<b>"Thermal conductivity</b> Mean temperature 10°C"	ISO 8301:1991	W/mK	0.039

\* RECOMMENDED MAXIMUM OPERATING TEMPERATURE

The maximum operating temperature shown is defined as the temperature which will typically cause a linear shrinkage of 5% after a 24hr exposure period, using sample dimensions of 100mm x 100mm x 25mm. This figure is provided for general guidance only. The actual level of shrinkage the foam will undergo at any particular temperature is dependant on a number of system variables such as, sample dimensions, cell size, loading conditions and exposure period.



## PRODUCT INFORMATION

Melinex® FS1 is a sparkling optically clear knurled film with an antistatic coating on the inside surface providing a limited level of anti-fog performance and an adhesion promoting pretreatment on the outside.

## TYPICAL APPLICATIONS

Melinex® FS1 can be used for disposable medical face-shields and visors where its excellent clarity and anti-fog properties are utilised. Melinex® FS1 is available in thicknesses of 125, 175 and 250 micron.

## GENERAL INFORMATION

Melinex® FS1 can withstand a broad range of temperatures and has good resistance to moisture and most chemicals. As per Article 3(3) of the REACH regulation (EC) No 1907/2006 Melinex® FS1 film is classified as an article. There are no substances intended to be released from the above film under normal, reasonably foreseeable conditions of use, as defined by Article 7(1).

## FILM PROPERTIES

PROPERTY	UNIT	TYPICAL VALUE			TEST METHOD
<b>General</b>		<b>125</b>	<b>175</b>	<b>250</b>	
Thickness	micron	125	175	250	DTF Method
Area Yield	m <sup>2</sup> /kg	5.7	4.0	2.9	DTF Method
Relative Density		1.4	1.4	1.4	Based on ASTM D1505-79
<b>Electrical</b>		<b>125</b>	<b>175</b>	<b>250</b>	
Surface Resistivity	log ohms/square	10	10	10	DTF Method
<b>Mechanical</b>		<b>125</b>	<b>175</b>	<b>250</b>	
Tensile Strength at Break - MD	kgf/mm <sup>2</sup>	17.5	17.5	17.5	Based on ASTM D882-83
Tensile Strength at Break - TD	kgf/mm <sup>2</sup>	17.5	17.5	17.5	Based on ASTM D882-83
F5 (force to elongate 5% of gauge range) - MD	kgf/mm <sup>2</sup>	10	10	10	Based on ASTM D882-83
F5 (force to elongate 5% of gauge range) - TD	kgf/mm <sup>2</sup>	10	10	10	Based on ASTM D882-83
<b>Optical</b>		<b>125</b>	<b>175</b>	<b>250</b>	
Haze	%	1.0	1.0	1.0	Based on ASTM D1003-77
Total Luminous Transmission (TLT)	%	89	89	88	Based on ASTM D1003-77
<b>Thermal</b>		<b>125</b>	<b>175</b>	<b>250</b>	
Upper Melt Temperature	C	255-260	255-260	255-260	Based on ASTM E794-85
Coefficient of Thermal Expansion (between 20 and 50°C)	pmm/K	19	19	19	Based on ASTM E831-06
Shrinkage (after 5 mins at 150°C) - MD	%	1.2	1.2	1.2	Based on ASTM D1204-78
Shrinkage (after 5 mins at 150°C) - TD	%	0.5	0.5	0.5	Based on ASTM D1204-78

## DISPOSAL ADVICE

Disposal of Melinex® FS1 does not present special disposal problems. Where waste occurs in a clean, uncontaminated form it can be recycled. In most circumstances, once Melinex® FS1 has been laminated, coated, printed or metallised, incineration with Energy Recovery is the most environmentally efficient recovery route. Melinex® FS1 can also be burned in an incinerator with normal refuse or can be buried as a relatively inert material in a landfill. The disposal method should comply with appropriate local and country regulations.



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