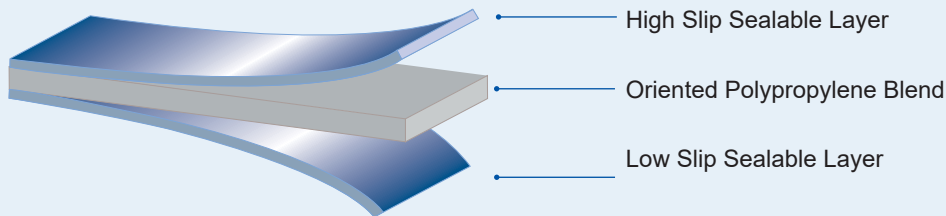


Propafilm™ MLT (Tobacco)

Technical Data Sheet

MLT - High Speed Overwrapping Film.

Biaxially oriented polypropylene (BOPP) film co-extruded on both sides with heat-sealable polyolefinic copolymers.



Features

- Excellent sparkling appearance
- High speed packing ability
- Excellent moisture and flavour barrier
- Non-shrink
- Differential slip properties
- Satisfies European requirements for vending blocking applications
- Enhanced machine performance

Applications

MLT is generally used for high speed overwrapping of packs and cartons. Particularly suitable for use in the tobacco industry.

PACK WRAP



Technical Properties (Typical Values)

Property	Test Method	Test Conditions	Units	MLT	
Thickness	Innovia Films test		micron	20	
			gauge	80	
Yield	Innovia Films test		m ² /kg	54.9	
			in ² /lb	38600	
			g/m ²	18.2	
Permeability to: Water vapour	ASTM F 1249	38°C 90% RH 100°F 90% RH	g/m ² .24 hrs	6.0	
			g/100in ² . 24 hrs	0.39	
Oxygen	ASTM F 1927	23°C 0% RH 73°F 0% RH	cc/m ² .24 hrs	1700	
			cc/100in ² . 24 hrs	110	
Optical: Gloss	ASTM D 2457	20°	units	130	
			ASTM D 1003	2.5°	1.3
Coefficient of friction (out to out)	ASTM D 1894	Static/ Dynamic		0.40	
				0.30	
Blocking	Innovia Films test	70°C (158°F) / 200g / 2hrs	N	6	
Tensile strength	ASTM D 882	Strain rate 50% / min	MN/m ²	MD	190
				TD	190
			lb/in ²	MD	27600
				TD	27600
Elongation at break	ASTM D 882	Strain rate 50% / min	%	MD	110
				TD	100
Elasticity modulus (1% secant)	ASTM D 882	Strain rate 10% / min	MN/m ²	MD	2900
				TD	2900
			lb/in ²	MD	420600
				TD	420600
Sealing range	Innovia Films test	2 secs; 0.10MN/m ² 2 secs; 15 psi	°C		110-145
			°F		230-295
Seal strength	Innovia Films test	120°C; 2 secs; 0.10MN/m ² 225°F; 2 secs; 15 psi	g(f)/25mm/ in		400
Shrinkage	Innovia Films test	60 secs at 120°C (248°F) 60 secs at 130°C (266°F)	%	MD	5.0
				TD	4.0
				MD	7.0
				TD	7.0

MD Machine Direction TD Transverse Direction
All properties are tested under standard laboratory conditions: 23 ± 2°C, 50 ± 5% RH.(73 ± 4F, 50 ± 5% RH), unless otherwise stated. Where relevant, tests are based on international testing standards.
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Propafilm™ MLT

Technical Data Sheet

Reel Specifications

Nominal Reel Diameters

Film	2x Length (metres)
MLT20	3800
Film	2x Length (feet)
MLT80	12467

Other reel lengths are available in multiples of the single length as per the core diameter listed below.

Outside Diameter	2x	4x	6x	8x	12x
For 77mm / 3in core	330mm 13in	-	-	-	-

Film Winding

Propafilm™ MLT has differential properties for maximum wrap tightness. When overwrapping, it is advised to use the low slip surface on the inside of the packs. The low slip surface is identified by a symbol on the reel label as below.

Low Slip/Treated Surface	Ordering Code	Label Symbol
Inside	I	Low slip/treatable >>
Outside	O	Low slip/treatable <<

Film Storage and Handling

No special conditions are required for the storage of Propafilm™ MLT but it is recommended that dry conditions at temperatures below 30°C (85°F) are employed. Propafilm™ MLT is suitable for use for 6 months from the date of delivery and stocks should be used in rotation. Films should be allowed to reach operating room temperatures for 24 hours before use.

Food Contact

Propafilm™ MLT complies with the applicable EU and US legislation for most applications involving direct contact with foods. Full details are given on the Declaration of Compliance. Customers intending to use Propafilm™ MLT in a food contact application should request a copy of this document from Innovia Films. Details of compliance with food contact legislation in non-EU countries are also available upon request.

Health & Safety Guidelines

For Health & Safety information, please refer to literature reference B190.

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