

## LB-RA PCR聚烯烃热收缩膜 LB-RA Post-Consumer Recycled Polyolefin Shrink Film



LB-RA是一种含有30%的PCR原料（post-consumer recycled：经过市场消费后，重新收集加工再重复利用）的聚烯烃收缩膜。在使用了大量PCR原料的同时，该膜采用特殊的原料配方，以实现与LB-A基本相同的性能，包括良好的物理性能、良好的热封性、高收缩率和对各种包装机的适应性等优点。

LB-RA涵盖了客户对收缩包装的需求，但减少了新原材料的使用，为我们的地球环境做出了贡献。该薄膜通过了GRS4.0认证（全球回收标准认证）。

厚度：15micron, 19micron, 25micron, 30micron.

LB-RA is a polyolefin shrink film contains 30% of post customer recycled raw material. In addition of using plenty of PCR returns, this film applies unique production process and resin formulation to allow basically same properties and application as LB-A. It also has the advantages of good mechanical properties, good heat sealing, high shrinkage, and good adaptability to various packaging machines.

LB-RA covers shrink pack demands from customers, but reduce the usage of new raw materials to contributes our earth environment. This film passed the GRS4.0 certification (global recycling standard certification).

Thickness: 15micron, 19micron, 25micron, 30micron.

### TECHNICAL DATA / 技术指标

TEST ITEM	UNIT	ASTM TEST	TYPICAL VALUES				
Post Consumer Recycling	31% Recycled post-consumer polyethylene (RM0193)						
GAUGE 厚度			15um	19um	25um	30um	
TENSILE STRENGTH 拉伸强度							
Tensile Strength (MD)	N/mm <sup>2</sup>	D882	115	110	90	88	
Tensile Strength (TD)			110	105	85	80	
ELONGATION 断裂伸长率							
Elongation(MD)	%	D882	105	110	105	100	
Elongation (TD)			100	105	95	90	
TEAR 撕裂强度							
MD at 400gm	gf	D1922	10.5	13.5	16.5	20.5	
TD at 400gm			9.8	12.5	16.5	22.5	
SEAL STRENGTH 热封强度							
MD\Hot Wire Seal	N/mm	F88	0.85	0.96	1.15	1.35	
TD\Hot Wire Seal			1.05	1.15	1.25	1.55	
COF (Film To Film)							
Static 静摩擦		D1894	0.20	0.18	0.22	0.23	
Dynamic 动摩擦			0.20	0.18	0.22	0.23	
OPTICS							
Haze 雾度		D1003	3.5	3.8	4.0	4.3	
Clarity 透明度		D1746	93.0	92.0	91.0	90.0	
Gloss @ 45Deg 光泽度		D2457	85.0	82.0	80.0	81.0	
BARRIER 阻隔性							
Oxygen Transmission Rate 透氧率	cc/ m <sup>2</sup> /day	D3985	9200	8200	5600	4200	
Water Vapor Transmission Rate 透水汽率	gm/ m <sup>2</sup> /day	F1249	25.9	17.2	14.5	11.2	
SHRINKAGE PROPERTIES 收缩性能			MD	TD	MD	TD	
Free Shrinkage 收缩率	100°C	%	D2732	17.0	26.0	14.0	23.0
	110°C			32.0	44.0	29.0	42.0
	120°C			54.0	59.0	53.0	60.0
	130°C			68.0	69.0	68.0	69.0
Shrink Tension 收缩率	100°C	Mpa	D2838	1.65	2.35	1.70	2.25
	110°C			2.55	3.20	2.65	3.45
	120°C			2.70	3.45	2.95	3.65
	130°C			2.45	3.10	2.75	3.20

Note: The above information is based on our internal evaluation data and is for reference only. 以上资料是本公司内部评测之数据，仅供参考。