

# Linebacker

Manufactured using the latest production technologies to ensure consistently strong performance across the range.

Linebacker products all benefit from high quality face materials, adhesives and backing paper. There is a wide choice of white boards and papers with gloss and satin coatings, plus two vinyl finishes. A range of folio sizes is available, and there's an A4 line that's guaranteed for laser printing.

## Product features and benefits:



Manufactured to the international environmental standard, ISO 14001



Offset line guaranteed for laser and inkjet printing

## Environmental statements:

When printing on Linebacker, you may wish to include a combination of the following environmental statements on your work. Linebacker :

- is manufactured to the ISO 14001 international standard, minimising negative impacts on the environment

## Range specifications:

			White MC Gloss	White MC Satin	White MC Opaque	White Cast Coated	White Offset	White Laser	Vellum
87g/m <sup>2</sup>	A4	210x297					◀		
	SRA3	320x450	◀				◀		
	SRA2	450x640	◀▶ ◁▷	◀▶	◀	◀▶	◀	▶	
	B2	500x700	◀▶ ◁▷	◀▶	◀	◀▷	◀		
	B1	700x1000		▶					
150g/m <sup>2</sup>	B2	500x700		▶					
	B1	700x1000		▶					
160g/m <sup>2</sup>	B2	500x700						▶	
250g/m <sup>2</sup>	B2	500x700				▶			

- ◀ Available split back, permanent (LSP)
- ◁ Available split back, removable (LSR)
- ▶ Available solid back, permanent (LDP)
- ▷ Available solid back, removable (LDR)

Product information continued overleaf...

**Packaging specifications:**

			White MC Gloss	White MC Satin	White MC Opaque	White Cast Coated	White Offset	White Laser	Vellum
87g/m <sup>2</sup>	A4	210x297					200		
	SRA3	320x450	200				400		
	SRA2	450x640	200	200	200	200	200	200	
	B2	500x700	200	200	200	200	200		
	B1	700x1000	125						
150g/m <sup>2</sup>	B2	500x700	150 / 175						
	B1	700x1000	100						
160g/m <sup>2</sup>	B2	500x700							125
250g/m <sup>2</sup>	B2	500x700				100			

Quantity shown = ream wrapped / bulk packed

**Technical specifications:**

		Caliper	Opacity	Brightness	Gloss
		ISO534	ISO2471	ISO2470	ISO 8254-1
		MIC	%	%	(Gardner) %
87g/m <sup>2</sup>	White MC Gloss	88	91.0	93	-
	White MC Satin	64	-	-	-
	White MC Opaque	65	100.0	-	65
	White Cast Coated	94	88.0	-	83
	White Offset	88	85.0	104	-
	White Laser	88	85.0	104	-
150g/m <sup>2</sup>	White MC Gloss	125	94.0	97	-
160g/m <sup>2</sup>	Vellum	170	-	113	-
250g/m <sup>2</sup>	White Cast Coated	308	-	90	90

**Printing Tips (storage/printing/guillotining):**

**Storage**

As with all self-adhesive products, Linebacker should be stored even more carefully than other printing papers. Keep the sheets flat, rotate the stock and do not stack more than 2,500 sheets at any one time. Store in a cool dry place away from any heaters or direct sunlight with relative humidity between 50 and 55% (18-23 °C). Material should always be given time to adjust to print room conditions before opening, ideally 24 hours. Also, any printed material should be covered in-between printing sessions.

**Printing**

Linebacker sheet stock can be considered as normal paper with respect to ink type, dryers and retarders. When using Linebacker in offset litho printing, however, the following points are worth consideration. Reset the impression nip between blanket and plate cylinder to allow for the extra thickness. This will reduce problems of tail edge creasing and mis-register. The double sheet trip should always be used to prevent any damage to plates. Always use minimum damping to prevent edge waving. To prevent edge curl, always shroud sheets in polythene between colours if multi-coloured machines are not being used. Finished work should be shrouded in polythene until cut and packaged.

**Guillotining**

This is the most critical stage in self-adhesive material preparation. There are five important guidelines to overcome potential problems. Cut only in 100 sheet lots of one-inch stacks. Use minimum clamp pressure. Always use a sharp blade. Always use a clean blade. After guillotining, fan, shuffle and powder the stack. Because adhesives are more viscous, or runny, in warm temperatures, the blade may need more frequent cleaning in such conditions than in cooler temperatures.

### Backing Papers

Split Back is for guillotining Solid Back is for Die and Kiss Cutting If printing both sides of the sheet, it is recommended that the backing sheet be printed first Splits run parallel to the long edge, 35mm split widths apart Split direction parallel to machine direction

### Linebacker Adhesion Advice

From time to time printers may encounter adhesion problems, and these can be expensive as they can occur after labels have been printed. We recommend printers and end users request A4 samples to adhere to the actual substrate to which the finished labels will be applied. This is because no manufacturer of self-adhesive materials can make a product that will always adhere successfully to all substrates, at all times, and in all conditions

### Recommended Adhesion Test

Cut out several labels, same size and in the same grain direction as the proposed printing label Peel off backing and apply to object to be labelled in the same position as the eventual requirements. Rub down lightly with fingers or rubber pad Ideally, prepare several samples and place one in a dry atmosphere and one in high humidity Leave for 24 hours minimum before assessment of adhesion

### Assessment of Adhesion

Examine visually for edge lift Lift up corner of the label and peel with a firm, slow pull Good adhesion should result in at least 30% fibre tear (by area) in the label paper. (Filmic labels can only be assessed by the peel force required to remove the label) Removable labels can be tested in the same way, but should not give fibre tear or surface damage when removed

### Surface to be labelled

Surfaces may not be what they appear to be. For example, glass may have a protective coating or anti-suff agent on the surface. There is no substitute for a test carried out on the object to be labeled Test for adhesion under conditions that are as close as possible to the end use Do not carry out the test on a flat, empty plastic bag, for example, when the end user is labelling one filled with product Check whether the label is to be applied to a plain or printed part of the pack On plastic, filmic surfaces and carton board, plasticizers may be evident in the construction. Your base material supplier should be asked for advice as plasticizers can have a determined effect on adhesion

### Application Surfaces Requiring Caution

Surface where damage can be caused by application of self-adhesive products: Plasticized products, e.g. PVC Weaker bonded surface finishes e.g. flock-coated fabric, acrylic vehicle paint Animal skins and natural fibres e.g. suede, leather, wool Tarnishable metal surfaces e.g. copper, brass, and silver Some glass surfaces e.g. optical lenses.

### Surface to which it is difficult to obtain satisfactory adhesion.

Low energy surfaces where 'wetting' is difficult, e.g. PTFE, untreated polyolefin, silicone-treated or contaminated surfaces Surfaces chemically treated for corrosion resistance Waxed surfaces Printed polyethylene (polyamide inks, greasy surfaces) Rough surfaces where surface contact is likely to be low e.g. wood, metal, lacquered finishes, cork, foam, open weave fibres Moist and/or cold surfaces where adhesive tack will be normally deadened by either water or low temperatures e.g. surfaces with condensate bloom, ice, deep frozen food packs. Irregular shaded surfaces, in particular curved surfaces of less than 25mm diameter and where label is applied to the convex surface, e.g. glass phials, ampoules, and spirit miniatures Dusty or easily crumbled surfaces where adhesive tack may be removed on surface contact e.g. plaster, asbestos Surfaces prone to gassing (caused by undercure) which, if it occurs after label application, may lead to eventual bond failure, e.g. polycarbonate, fibreglass, sealant Surfaces where adhesives may be significantly exposed to the atmosphere resulting in eventual breakdown and failure of the adhesive e.g. drum labelling.

### Applications where specific advice should be sought prior to use.

Direct food labelling, Toy Labelling, Medical Applications e.g. direct skin contact, blood bags, sterilization processes Fabric labelling, promotional gimmicks, flag days, extreme environmental exposure e.g. temperatures >80°C or <-20C, direct/continuous exposure to UV, seawater exposure, solvent-laden atmospheres Application involving health and safety aspects e.g. crash helmets, objects, charts, antiques

*Please note that the information provided is intended for guidance only. Care has been taken to ensure that data is accurately representative of the product properties at the time of preparation of the information. We reserve the right to modify the product in response to changes in demand. To ensure that a product is suitable under particular conditions of use, or for a special application, it is strongly recommended that exploratory tests are carried out by the printer and/or user. If requested, we will advise on suitability for use and, if appropriate, carry out confirmatory testing.*