

PRODUCT DATA SHEET

Avery Dennison® MPI™ 1100 Cast series

issued: 07/2017

Introduction

MPI 1100 Cast series consists of gloss white, highly conformable self-adhesive cast vinyls. The face film has been especially developed for exceptional print results on all major printer platforms using Latex, Eco-Solvent, Hard Solvent and UV-Curing inks. MPI 1104 and MPI 1104 Easy apply are recommended for applications on rivets and corrugations, without the need for additional application of primers or incisions. Due to the repositionable permanent adhesive the film is easy to position during application.

For low energy substrates or difficult surfaces, we especially recommend our MPI 1106 Hi-Tack or MPI 1106 Hi-tack Easy Apply.

MPI 1104 EA and MPI 1106 Hi-Tack EA are available with Avery Dennison's Easy Apply™ Technology to ensure entrapped air can easily be rubbed out without the need to puncture the film.

Description

Film		50 micron gloss white cast vinyl
Adhesive	MPI 1104/MPI 1104 EA MPI 1106 HT/ MPI 1106 HT EA	Repositionable permanent, grey tie coat, acrylic based Permanent, grey tie coat, acrylic based, designed for low-energy and difficult surface substrates
Backing paper	MPI 1104/MPI 1106 HT MPI 1104 EA/ MPI 1106 HT EA	Staflat liner Easy Apply liner

Conversion

Avery Dennison MPI 1100 series cast films have been designed to deliver an outstanding & consistent print performance across all major wide format inkjet printer platforms.

To enhance colour and to protect images against UV radiation and abrasion, Avery Dennison MPI 1100 Cast films are recommended to be protected using an overlamine. If the final graphic is used on corrugated vehicles or substrates, Avery Dennison DOL 1460 Z Gloss or Avery Dennison DOL Z 1480 Matt conformable laminates are recommended to protect the graphic and enhance its life span.

Do NOT use wet application methods for Avery Dennison Easy Apply products.

Uses

- Full vehicle wraps
- Vehicle graphics
- Interior & exterior decorative architectural applications
- All permanent applications requiring high conformability

Features

- Excellent print performance with Latex, UV, Eco-Solvent and hard solvent inks
- Superior 3D conformability* for demanding corrugations
- No additional installation techniques required for preparation of surface with deep corrugations
- Repositionable adhesive for easier positioning during application
- Air Egress feature (MPI 1104 EA/ MPI 1106 HT EA) to avoid air entrapment and wrinkles during application
- Adheres to low-energy surfaces (MPI 1106 HT/ MPI 1106 HT EA such as PP and PE)
- High gloss or matt finishes*
- Up to 7 years outdoor durability
- ICS Performance Guarantee

* when used in combination with DOL 1400 Z cast overlaminates

Physical properties

Features		Test method ¹	Results
Caliper, facefilm		ISO 534	50 micron
Caliper, facefilm + adhesive		ISO 534	80 micron
Elongation, typical value		DIN 53455	> 200 %
Dimensional stability		FINAT FTM 14	0.3 mm max.
MPI 1104	initial	FINAT FTM-1, stainless steel	400 N/m
	ultimate	FINAT FTM-1, stainless steel	600 N/m
MPI 1104 EA	initial	FINAT FTM-1, stainless steel	350 N/m
	ultimate	FINAT FTM-1, stainless steel	500 N/m
MPI 1106 HT	initial	LDPE, HDPE, Polypropylene,	440 N/m
	ultimate	LDPE, HDPE, Polypropylene,	500 N/m
MPI 1106 HT EA	initial	LDPE, HDPE, Polypropylene	440 N/m
	ultimate	LDPE, HDPE, Polypropylene	600 N/m
Flammability			Self-extinguishing
Shelf life		Stored at 22° C/50-55 % RH	2 years
Durability, unprinted		Vertical exposure	7 years

Temperature range

Features	Results
Minimum application temperature:	≥10 °C
Service temperature:	- 40 °C to + 80 °C

NOTE: Materials have to be properly dried before further processing, like laminating, varnishing or application. The residual solvents can otherwise change the products' specific features

For good print and converting result we recommend to let the rolls acclimatize in the print/lamination room at least 24 hours before printing or converting. Too much temperature or humidity deviation between material and room climate can cause layflatness and/or printability issues.

Generally, constant material storage conditions of ideally 20°C (+/-2°C) /50% rh (+/- 5%), without too big climate deviations, will support a more robust and stable printing/converting process. For further details, please refer to TB 1.11.

Important

Information on physical and chemical characteristics is based upon tests we believe to be reliable. The values listed herein are typical values and are not for use in specifications. They are intended only as a source of information and are given without guarantee and do not constitute a warranty. Purchasers should independently determine, prior to use, the suitability of this material to their specific use.

All technical data are subject to change. In case of any ambiguities or differences between the English and foreign versions of these Conditions, the English version shall be controlling.

Warranty

All Avery Dennison statements, technical information and recommendations are based on tests believed to be reliable but do not constitute a guarantee or warranty. All Avery Dennison products are sold with the understanding that purchaser has independently determined the suitability of such products for its purposes.

All Avery Dennison's products are sold subject to Avery Dennison's general terms and conditions of sale, see <http://terms.europe.averydennison.com>

1) Test methods

More information about our test methods can be found on our website.

2) Durability

The durability is based on middle European exposure conditions. Actual performance life will depend on substrate preparation, exposure conditions and maintenance of the marking. For instance, in the case of signs facing south; in areas of long high temperature exposure such as southern European countries; in industrially polluted areas or high altitudes, exterior performance will be decreased.