MIRROR Gold & Silver

Technical Data Sheet MIRROR Gold & Silver, Base Material:

	Method		+/-	130 g/m²	245 g/m²	330 g/m²
Basic Weight	ISO 536	g/m²	5%	100	215	300
Caliper	ISO 534	Micron	5%	118	270	387
Bulk	ISO 534	cm²/g	-	1.2	1.3	1.3
Gloss 20°	ISO 2813	%	>	25	45	45
ISO Brightness	ISO 2470	%	2	83	83	83
CIE Whiteness*	ISO 11475	%	7	90	90	90
COBB 120"	ISO 535	g/m²	5	20		
Moisture Content	ISO 287	%	1	5.5	5.5	5.5
L&W Stiffness	ISO 2493	mN MD/CD	>	150/75 15°/10mm	90/45 15°/50mm	240/120 15°/50mm

**Refers to Base Material*

ECF, Reach Compliance, Recyclable, PAP21, PAP22, FSC®-certified

PET foil as top layer: ~ 30g/m²

Processing – Technical guidelines

Material composition:

- White base paper or paperboard, coated on one side.
- Front side metallized, with a glossy, crystal-clear 12 µm PET film as the top layer. Foil is food contact proof.

Storage:

- Store packaged, indoors, at a relative humidity of 40–60%.

Handling (Important!):

- Due to the metallization, a uniform, mirror-like surface is created. While this effect is intentional and visually appealing, it also means that fingerprints, scratches, and creases become visible more quickly and more prominently than on conventional paper.
- We therefore recommend wearing unpowdered surgical gloves or cotton gloves at all stages involving manual handling.

Printing

With suitable printing inks and appropriate machine settings, the metallized side can be printed using the following methods:

- UV offset printing
- UV LED offset printing
- UV inkjet printing
- Screen printing
- Conventional offset printing with foil inks / oxidatively drying inks. When using conventional offset printing, particular attention must be paid to the very slow drying time. Especially for small batches, sheets should be laid out after printing and high stacking should be avoided.

In all cases, we recommend conducting a print test in advance.

Digital Printing: must be tested

Water-based inkjet: Very likely to be ruled out due to the material's lack of absorbency.

Laser toner: must be tested. The big topic here is, if the toner can be discharged, i.e. transferred well over the entire surface. Most likely full-surface prints will be difficult, whereas small parts of text of similar will be easier.

Finishing:
With suitable materials and appropriate machine settings, the metallized surface can be finished using:

- Film lamination
- Hot foil stamping
- UV varnishing, both spot and full-surface
- Blind embossing, relief embossing, and debossing, with the limitation that embossing edges will appear softer than on conventional paper
- Die-cutting, creasing, perforating

Further processing:
Bookbinding, die-cutting, creasing, perforating, stapling, etc. require appropriate care:

- To avoid fingerprints, wear unpowdered surgical gloves or cotton gloves.
- To prevent scratches, lift sheets from the top of the stack rather than pulling reams sideways.
- To avoid visible creases, bend as little as possible; using smaller stacks can help.
- In fully automated bookbinding, position any potentially scratching transport guides or hold-down devices in trim areas, or protect them with soft covers.
- Manual gluing: use double-sided adhesive tapes.
- Fully automated gluing in folding carton gluing machines: use specialized adhesive systems suitable for PET surfaces.
- In both cases, prior testing by your team is required.