TECHNICAL DATA ADE, Inc. Chicago, IL

Product Description

CANCEL® 3 Metalized 4" REINFORCED CELL CUSHIONING MATERIAL

Description:

Cancel 3 Metalized Cushioning is a static free 1/4" thick material that is reinforced with a metalized composit top film. It is designed to provide ESD and EMI shielding along with physical protection.

Composition and Structure:

Cushioning:

- Low and linear low density polyethylene (LDPE and LLDPE).
- Proprietary internal antistatic additive.
- Comprised of adjoining tapered cells that are hexagon shaped on the film (flat) side and rounded on the other.

Top film

2.0 mil composit of a 0.5 mil vacuum metalized (aluminum) polyester laminated to a 1.5 mil static dissipative polyethylene. The metalized side of the polyester is laminated "in" to the polyethylene. The polyethylene side is laminated to the Cancel and the exposed polyester side is coated with a static dissipative compound.

Product Forms:

<u> Form</u>	Description	<u>Dimension</u>
Rolls	Slit width	Min. 2" to max. 48"
Sheets	Size	Min. 3" by 6"
Die-cuts	Shape and size	As specified

Product Put-ups:

Description	Put-up
Rolls	Poly-bagged bundles. 300 ft. long, by 48" wide, by 35" diameter. 1.5
	MSF per bundle. Stock 4-12", 2-24", 1-48" or custom slits available.
Sheets	Corrugated cases typically containing about 0.5 MSF of sheets per
	case.
Die-cuts	Corrugated cases. Quantity per case depends on shape and size
	specified.

Dimensional Tolerances:

Description	Rolls	Sheets	Die-cuts
Length	+/- 5%	+/- 1/4"	+/- 1/8"
Width (slit rolls)	+/- 1/4"	+/- 1/4"	+/- 1/8"
Width (48" bundles)	$-1/4$ ", $+\frac{1}{2}$ "		
Thickness	+/- 1/32"	+/- 1/32"	+/- 1/32"

Physical Properties (Top Film):

Property	Method	Typical Result
Thickness	ASTM D2103	2.0 Mils
Tensile Strength	ASTM D882	> 15 lbs.
Puncture Resistance	FTMS 101C, Method 2065	> 8 lbs.
Transparency	ADE, Inc. # G216	> 40%

Physical Properties (finished Product):

PropertyMethod/RequirementTypical ResultsWorkmanshipADE, Inc./must complycompliesHeat SealabilityADE, Inc./ 4 lb weightno separation

ESD Properties (Finished Product):

<u>Property</u> <u>Method</u> <u>Typical Value</u>

Surface Resistivity ASTM D 257/CID-AA-3129

Cell and film sides < 1.0 X 10(12) ohms/square
Buried metal layer 1.0 X 10 (2) ohms/square

Surface Resistance STM 11.11 < 1.0 X 10 (11) Ohms (cell & Film)

Capacitive Probe EIA 541 (200pf,1.5K ohms) 4.0 to 6.0 volts

RFI Shielding Mil-STD-285 (@ 390 mHz) 4 dB (@ 27 mHz) 10 dB

Compliance Issues:

Based on information supplied by our suppliers and strict adherence to our manufacturing procedures, we can state that Cancel ® 3 Metalized Cushioning material does not contain Cadmium, Lead, Mercury, Hexavalent Chromium, Polybrominated Biphenyl (PBB) or Polybrominated Diphenyl (PBDE) materials that are banned per RoHS (EU) Directive and CONEG (USA) Regulations.

Effects of Solvents and Ultraviolet Rays:

Cancel 3 Metalized Cushioning material should not be exposed to solvents such as alcohols, ketones or hydrocarbons. Contact with these solutions will remove the conductive surface. Exposure to ultraviolet rays of sunlight will cause fading of the color but will not materially affect the antistatic properties.