



## 3285 tinned mu-copper Technical Datasheet

### Thinned mu-copper foil

Thinned mu-copper foil is a 1.5 mil (38 micron) special electrolytic grade, zero temper, high tensile copper foil clad on both surfaces with tin and coated with an aggressive acrylic adhesive system. This copper foil readily accepts solder and is corrosion resistant.

Thinned mu-copper foil is designed to meet a wide variety of EMI and RFI shielding applications in the electronics industry. Also for use in printed circuit manufacture and repair.

Tinned Mu-copper foil has superb shielding performance (also at low frequencies), can be soldered, and can easily be folded in the right shape. Mu-copper foil is used for making small EMI shields like PCB shielding cans, but is also used for the EMI shielding of complete existing rooms (Faraday cages, screen rooms, shielded boxes and so on)

#### Product Construction



#### Features & Benefits

- UL 510 Listed  
UL file # E137857Opsomming
- Corrosion resistant tin clad foil
- Malleable foil conforms well to irregular contours
- Exceptional solderability
- Permanently bonds to low surface energy materials and difficult textured surfaces
- In stock product available for immediate delivery
- High shielding performance
- Easy to solder
- Flame retardant

#### Product Configurations

- Standard roll sizes and custom rolls available on request

#### How to order

When you want to order Thinned mu-copper foil from the 3285 series than please mention the part number as follow:

Part number	Height (mm)	Width (mm)	option	Top finish
3285	300	200	03	#1
			01 : standard adhesive (non-conductive)	#01 without insulation layer
			02 : without self adhesive	#02 with insulation layer
			03 : with conductive self adhesive	#03 with flame retardant insulation layer
				#04 with conductive self adhesive layer

Test	Typical Value	Typical Value (Metric)	Test Method
Product Thickness $\Omega$	3.0 mils	0.08mm	PSTC-133
Peel Adhesion $\Delta$	36 oz/in	10.0 N/25 mm	PSTC-101
Shear Adhesion	>24 hrs @ 2.2 psi	>24 hrs @ 15.2 kPa	PSTC-107
Tensile Strength	36 lb/in	162.7 N/25 mm	PSTC-131
Elongation	6%	6%	PSTC-131
Service Temperature	-40 to 250°F	-40 to 121°C	
$\Omega$ -excluding liner		$\Delta$ -20 minute dwell	

Typical values are not intended to be used for specification development. Technical data is believed to be true and accurate; Thinned mu-copper foil recommends that the purchaser test for fitness of use in all applications.

#### Shielding Effectiveness: Frequency Attenuation

Per MIL-STD-285M:

100 Khz	141 db
1 Mhz	137 db
10 Mhz	114.5 db
50 Mhz	96 db
100 Mhz	101.5 db
200 Mhz	111 db
400 Mhz	102 db
800 Mhz	>128 db
900 Mhz	>127 db
1 Ghz	>116 db
5 Ghz	92 db
10 Ghz	80 db
17 Ghz	87 db

#### Resistance

MIL-STD-202C Method 307: 0.002 ohms/in<sup>2</sup>