



# Shielding Fabrics & Conductive Tapes

## SHIELDING FABRICS

Shielding effectiveness is determined by a combination of the reflection and absorption of RF signals. Absorption depends on the thickness of the shield material. However, reflection occurs at the shield surface and its effectiveness is independent of thickness. Reflection is the determining factor for all high frequency signal attenuation. (Note: When using these materials for conductive shielding gaskets, conductivity is the determinant.) Maximum reflection occurs with the highest conductivity materials – the best being copper, nickel and combinations of both.

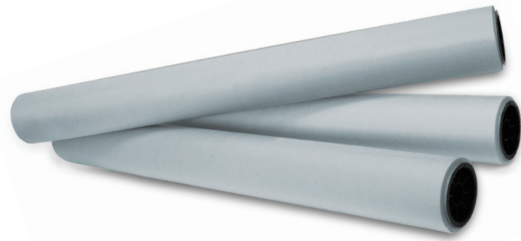
### Applications

Bonding or laminating to complex geometric shapes with optional hot melt or conductive adhesive.

- Large surface coverage with minimal seams due to 41" material width
- ESD/RFI-EMI shielding attenuation > 70dB up to 10 GHz for CuNi type
- Seal enclosure panels and frames, seams or joints
- Use for architectural shielding or shielded room wall and ceiling finishing

### Options

- All materials are available in non-adhesive, hot melt or conductive adhesive backing
- Standard sheets are 41" x 36" (1041 x 914 mm)
- Longer lengths can be custom ordered – please consult factory for information
- Full rolls are 325' (99M) long – please consult factory for ordering information. Note: conductive adhesive versions are 164' (50M) long



Part Number w/o Adhesive	w/Hot Melt Adhesive	w/Conductive Adhesive	Description	Width	Length	Thickness	Surface Resistivity	500KHz	100MHz	300MHz	1GHz
SF005PCN	SF005PCN-HM	SF005PCN-CA	Conductive CuNi Cloth	41 1041	36 914	0.003 0.08	.005 ohm/mm <sup>2</sup>	79dB	81dB	86dB	82dB
SF030PCU	SF030PCU-HM	SF030PCU-CA	Conductive Cu Cloth	41 1041	36 914	0.003 0.08	.035 ohm/mm <sup>2</sup>	60dB	67dB	65dB	62dB
SF050PNI	SF050PNI-HM	SF050PNI-CA	Conductive Ni Cloth	41 1041	36 914	0.004 0.10	.050 ohm/mm <sup>2</sup>	60dB	72dB	67dB	63dB



## FABRIC SHIELDING TAPES

### Applications

Cable shielding, enclosure seams, shielded room joints, PCB component shields, irregular surface/component shields, alternative to custom die-cut shielding gaskets or sections.

- Service Temperature: -40°F to 212°F (-40°C to 100°C)
- Adhesion: (peel) 50 oz/in. (54N/100mm)
- Material: CuNi metalized fabric and conductive acrylic adhesive backing w/release liner

Part	Width	Thickness	Length	Resistivity	Impedance
ST005PCN25	.25 6.35	.005 0.13	85.0 ft. rolls 25.0m	0.03 - 0.05 ohms/inch <sup>2</sup>	
ST005PCN50	.50 12.7	.005 0.13	85.0 ft. rolls 25.0m	0.03 - 0.05 ohms/inch <sup>2</sup>	69dB@100MHZ
ST005PCN75	.75 19.05	.005 0.13	85.0 ft. rolls 25.0m	0.03 - 0.05 ohms/inch <sup>2</sup>	62dB@500MHZ
ST005PCN100	1.00 25.4	.005 0.13	85.0 ft. rolls 25.0m	0.03 - 0.05 ohms/inch <sup>2</sup>	