

LF 33-750 Low Temperature Polymer Silver Conductor

Description: LF 33-750 polymer silver conductor paste is designed for use in photovoltaic applications on thin film, crystalline silicon and microcrystalline silicon solar cells. The conductor provides a low contact resistance

and high bulk conductivity. It also displays excellent adhesion on a wide variety of substrates. LF 33-750 is compatible with high throughput manufacturing techniques, including screen printing, dispensing and pad printing.

Typical Properties	
	LF 33-750
Viscosity (Pa.s) ¹ :	50-80
Solids Content	80-83%
Wet Thickness	26-34 μm
Cured Thickness:	21-29 μm
Sheet Resistance ² (milliohms/square):	50
Coverage	100 cm^2/g @ 35 μm wet
Recommended Thinner:	0800
Clean Up	Butyl Carbitol Acetate

All properties are target values and are not meant to represent product specifications

Notes:

¹ Viscosity as measured on Brookfield model HBT viscometer with 13R small sample adapter chamber and #27 spindle at 10 rpm, 25°C.

² Milliohms/sq. @ 24 μm fired thickness.

Product Advantages:

- RoHS compliant³
- Cadmium free⁴
- Low contact resistance
- High bulk conductivity
- Excellent solderability
- Excellent adhesion
- Compatible with high throughput manufacturing

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Low Temperature Polymer
Silver Conductor

Processing Recommendations

Printing: A 200 mesh stainless steel screen with 1 mil emulsion thickness is recommended. Other screen meshes with appropriate emulsion thicknesses can be used.

Cure Temperature: 160 - 200°C

Paste Storage & Shelf Life: 4 months from date of shipment when stored at 5°C. Allow unopened jars to stabilize to room temperature after removal from refrigerator to prevent condensation.

Notes:

³ Complies with EU Directives on Restriction of the use of Hazardous Substances (RoHS; 2002/95/EC) and Waste from Electrical and Electronic Equipment (WEEE; 2002/96/EC). Current exemptions allow lead contained in the glass system of thick film materials used in electronic components. In anticipation of future amendments and more stringent environmental regulations, Ferro continues to expand its range of Lead Free⁵ materials.

⁴ Initial product composition was certified by SGS laboratories to be below the detection level for cadmium. This conductor paste is not routinely analyzed for cadmium content and is not the basis for product specification or warranty.

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