

Technical Data Sheet

THICK FILM MATERIALS

Product Type: Conductors

Product Name: PCC11827



Pb Free Nitrogen Fireable Copper Conductor

Description

PCC11827 is a Pb free copper conductor designed for screen printing as a termination paste for resistor networks.

Key Benefits

- REACH¹ and ROHS² compliant
- Excellent solderability
- Excellent adhesion

Typical Properties

Resistivity

≤ 1.1 mΩ/□ at 25 μm fired film thickness

Adhesion

80 x 80 mil pads
Sn62/Pb36/Ag2 at 230 °C
Initial: ≥ 7.0 lbs

Solderability

80 x 80 mil pads
Sn63/Pb37 at 230 °C
Excellent coverage

Viscosity

260 – 325 Kcps, Brookfield RVT
Spindle 7 at 10 rpm, 25 °C

Recommended Processing Guidelines

Printing

150 – 280 mesh stainless steel screen
0.4 – 1.0 mil emulsion

Print Speed

Up to 25 cm/sec (10 in/sec)

Drying

130 °C for 10 minutes

Firing Profile

Fire in Nitrogen with O₂ between 2 – 10 ppm
940 – 975 °C peak temperature
Dwell time of 2 – 5 minutes

Thickness

Fired: 22 – 28 μm

Warranty

Material guaranteed to meet specifications for 6 months from date of shipment.

Storage

Store in a dry location at 5 – 25 °C.

DO NOT REFRIGERATE.

Allow paste to come to room temperature prior to opening. Spatulate well before using, as settling may have occurred during storage.

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Legend:

1) REACH compliant according to the latest ** Annex XIV to Regulation (EC) of the European Parliament and of the council on the Registration, Evaluation, Authorisation and Restriction of Chemicals ("REACH") by European Chemicals Agency and its subsequent amendments; the material does not contain any substance listed in Annex XIV.

2) RoHS compliant according to the latest ** Directives (European Union) of Restriction of Hazardous Substances ("RoHS") and its subsequent amendments (including the exceptions related to Pb)

* See the data sheet issue date (DD/MM/YY) as reference of validity of latest edition which is available on request

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