Low Temperature Co-fired Ceramic Systems
4007 Brazeable Au Conductor

Application
4007 Brazeable Au Conductor is a frit-less paste designed to provide Au-rich barrier layer on Ferro A6M-E and L8 LTCC tape to braze pins, leads, seal rings and heat sinks using Au/Sn braze paste or pre-forms.

Au-plated Kovar, Invar, and Alloy 42 metal components are recommended based on their close TCE match to A6M-E and L8.

C4007 Au paste is formulated and processed to be RoHS compliant.

Typical Formulation Properties
- Viscosity\textsuperscript{1}: 110 Pa.s
- Metal Content: 87%
- Line Resolution: 5 mil lines and spaces

Storage and Shelf-life: This product should be stored in a tightly sealed container at 10-25°C, in a dry place away from direct sunlight. Shelf life of a factory sealed container is minimum 6 months from date of shipment when properly stored.

Typical Process Parameters

Thinning: This paste is formulated at the appropriate viscosity for the intended application. Contact Technical Service for a recommended thinner to replace solvent loss.

Printing: 4007 is printed over a 6-9 µm pre-fired layer of FX30-025JH Au conductor using a 200 mesh stainless steel screen with a 15 µm emulsion.

Up to three print/dry cycles may be needed to achieve recommended 20-25 um dried thickness.

Leveling: The paste should be allowed to level for 3-4 minutes at room temperature.

Drying: 10-15 minutes at 100-120 °C with forced air flow and exhaust.

Firing: 850°C for 10 minutes at peak temperature with an overall profile of 45 minutes.

Typical Fired Properties
- Fired Thickness: 10-12 µm
- Resistivity\textsuperscript{2}: < 2.1 mΩ/Sq

\textsuperscript{1}Brookfield Model HBT 2X or DVIII, cone & plate viscometer
\textsuperscript{2}Normalized to 1 mil (25.4um) fired thickness

Limitation of Warranty and Liability
Ferro believes that the information contained in this document is accurate at the time of its publication. Ferro makes no warranty with respect to the information contained in this document. The information in this document is not a product specification, either in whole or in part. Your use of the information contained in this document and your purchase and use of this Ferro product are at your sole discretion. Downstream users are responsible for determination of the suitability of this product and for testing in specific applications. Nothing in this document shall be construed as a license for use that infringes upon any property rights of any third party. Please refer to the Safety Data Sheet (SDS) for safe use, handling and disposal information. All sales by Ferro to you are subject to Ferro’s Terms and Conditions of Sale, as amended from time to time and available at www.ferro.com. In the event this document conflicts with Ferro’s Terms and Conditions of Sale, Ferro’s Terms and Conditions of Sale shall control.