Copper Thin Film

Intrinsiq Materials Inc. manufactures patent-protected, novel, environmentally friendly nano-inks for the Printed Electronics Industry that allow the Company's partners to realize significant production cost reductions and superior performance over existing technologies on the market today. Intrinsiq's technology is ushering in a new era of previously unattainable products in the high-growth areas of printed circuit boards and packaging.

Printed Copper Thin Film for Rigid and Flexible Laminates

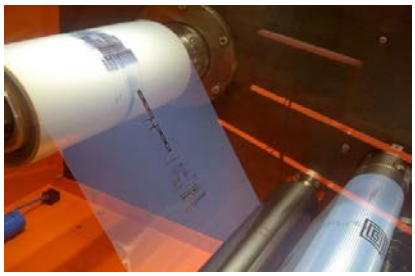
Copper Thin Film Ink and Laminates utilize Intrinsiq's patented nano ink and conventional printing/coating techniques to provide ultrathin copper layers (less than 1 μm) for subsequent metallization.

Applications for PCB Industry

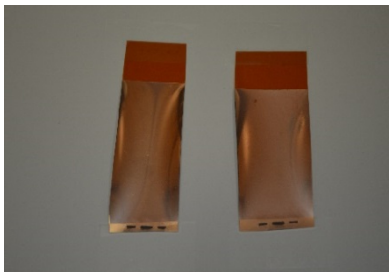
Foil 1 micron on Kapton

Thin Copper on Alumina

Thin Copper on FR4



Roll Processing



E'less and Electro-platable

Metallize Flexible Substrates

Intrinsiq Materials, Inc.
1200 Ridgeway Avenue
Rochester, NY 14615
Phone: (585) 301-4432

www.intrinsiq.com

Photonic Sintering – Copper Thin Film

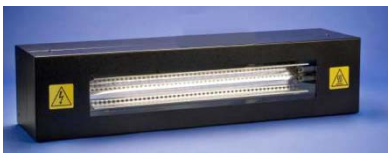
Putting you in Charge

XENON's high energy S-2200 Pulsed Light system has been proven to rapidly sinter ***Intrinsiq Materials*** patented nano ink to provide ultrathin copper layers for applications for rigid and flexible laminates.

Key Specifications – Model S-2200

- Max radiant pulse energy 11.8 J/cm^2 at wavelengths of 190 nm to 1100 nm
- Delivers high average pulse power up to 7 kW/cm^2 with peak power up to 2.5MW
- Achieve resistivity 0.375 Ω/☐
- Programming energy delivery made easy through operator touch screen interface.
- Visual display of programmed pulse sequences.
- Storage and fast recall of over 10,000 pulse recipes developed by operator.
- Uninterruptible power supply for operator computer to insure no loss of data in the event of mains power failure.

XENON's S-2200 Pulsed Light sintering system provides the researcher with the flexibility to easily program pulse energy delivered to a target. An operator can program long duration pulses at high energy or select high pulse rates with precision control for sensitive materials. A range of optical lamp housings provide unique exposure areas. Shown below is model LH-840.



Results that count

Test Conditions	
Intrinsiq Ink	Cu Thin Film
After Sintering	0.375 Ω/☐
Pulse Voltage	1,800 v
Pulse Duration	400 µs
Height	1.3-inch
Pulse Rate	7 Hz
2.25-ft./min	

XENON Corporation, 37 Upton Drive, Wilmington, MA, USA 01887
www.xenoncorp.com