



Soldering three copper spacers to circuit board

Objective Soldering three copper spacers on a circuit board simultaneously

Material Circuit board with 3 copper spacers .5" (12.7mm) diameter and solder preforms

Temperature 464 °F (240 °C)

Frequency 323 kHz

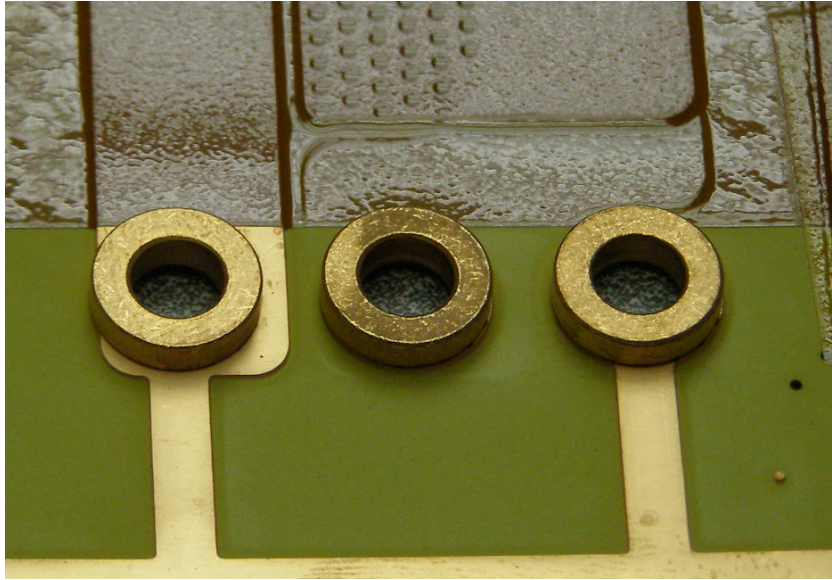
Equipment

- Ambrell 4.2 kW induction heating system, equipped with a remote workhead containing two 1.5 μ F capacitors for a total of 0.75 μ F
- An induction heating coil designed and developed specifically for this application.

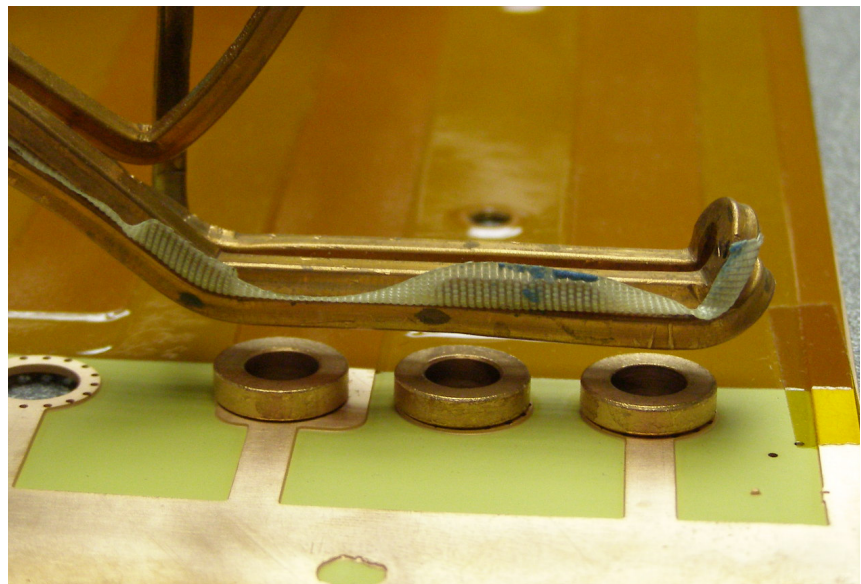
Process A two turn helical coil is used to heat 3 spacers at once. Power is supplied for 30 seconds to melt the solder preforms on the three spacers and create a solder joint without over-heating the board.

Results/Benefits Induction heating provides:

- Precise and controlled application of heat
- Repeatable, non-contact, clean heating process
- Increased production capacity
- Energy efficient



3 copper spacers in place for soldering



Soldering 3 spacers simultaneously