

## Metal to plastic bonding of beer kegs

Objective Bond an aluminium mesh to a plastic beer keg

**Material** • Aluminium mesh

Plastic keg 320 mm (12.5") ID

Temperature 250 °C (482 °F)

Frequency 207 kHz

**Equipment** Ambrell 2 kW, induction heating system, equipped with a

remote workhead containing two .33µF capacitors (for a total

of .66  $\mu$ F).

An induction heating coil designed and developed specifically

for this application.

Process/Narrative A single-turn solenoid coil is placed around the assembled

beer keg and heated for 35 seconds as the keg is rotated. Pressure is applied with a press on the top rim whilst the keg is

rotating, forming a seal between the aluminium mesh and the

two halves of the beer keg.

Results/Benefits Induction heating provides:

Quick, reliable, repeatable heat

Localized, precision heat to the mesh area

Download and print our Applications Lab Process Sheet (<a href="http://www.ameritherm.com/PDFs/4110038b.pdf">http://www.ameritherm.com/PDFs/4110038b.pdf</a>). Answer the questions on the form to help us understand your process and performance requirements. Call with the info on the form to see if you should send us your parts for a free evaluation. If you have questions, call or e-mail us (<a href="mailto:info@ameritherm.com">info@ameritherm.com</a>). We'll be in touch!



