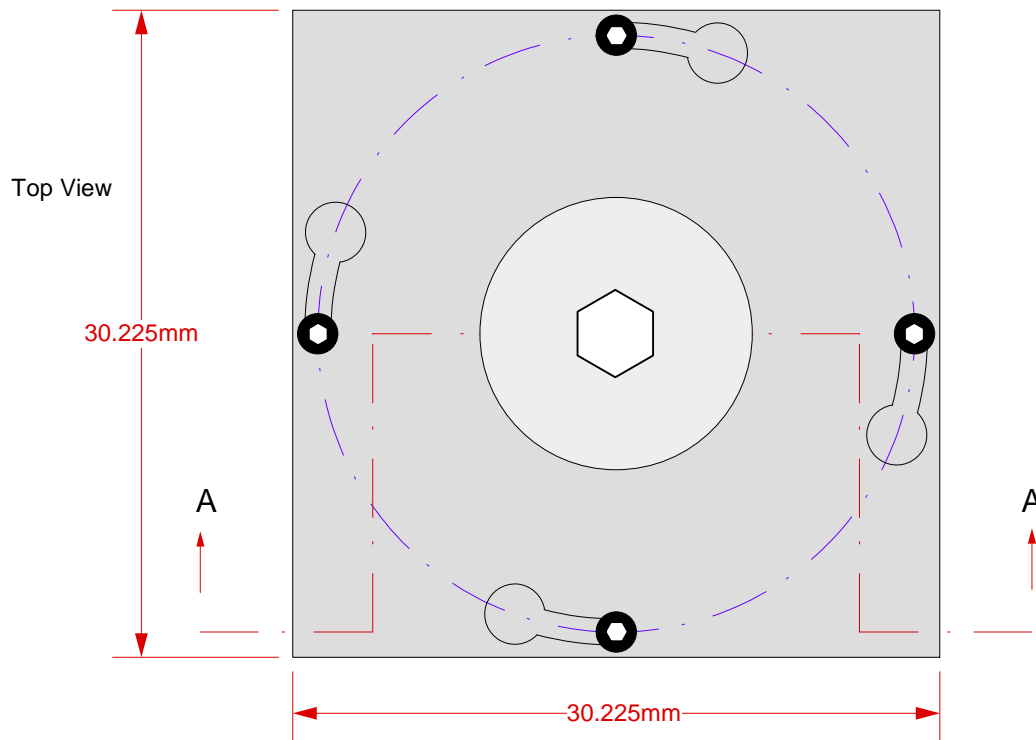


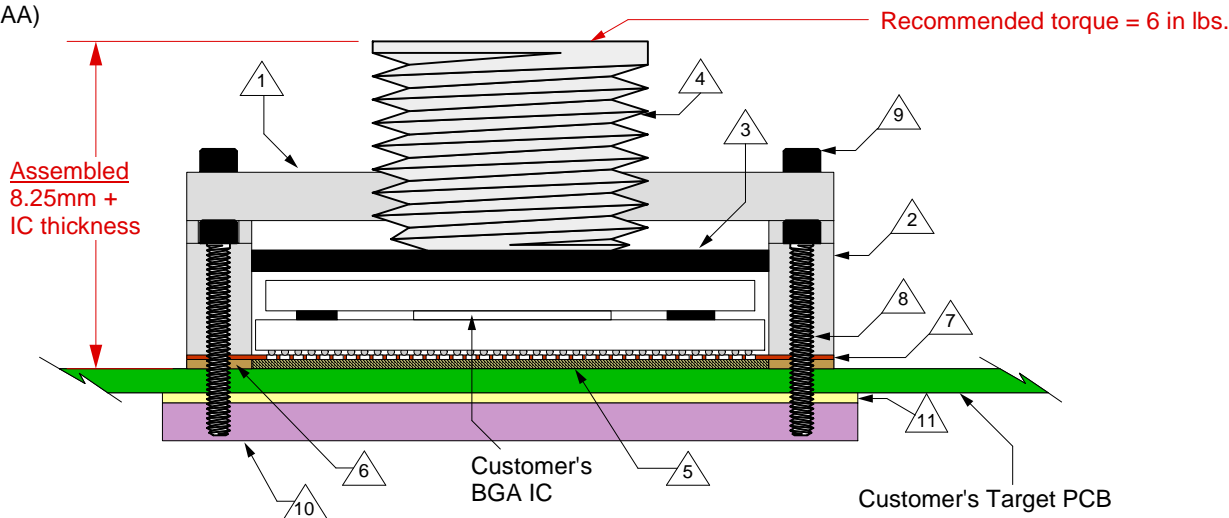
GHz BGA Socket - Direct mount, solderless

Features


- Directly mounts to target PCB (needs tooling holes) with hardware.
- High speed, reliable Elastomer connection
- Minimum real estate required
- Compression plate distributes forces evenly
- Ball guide prevents over compression of elastomer
- Easily removable swivel socket lid



Side View
(Section AA)

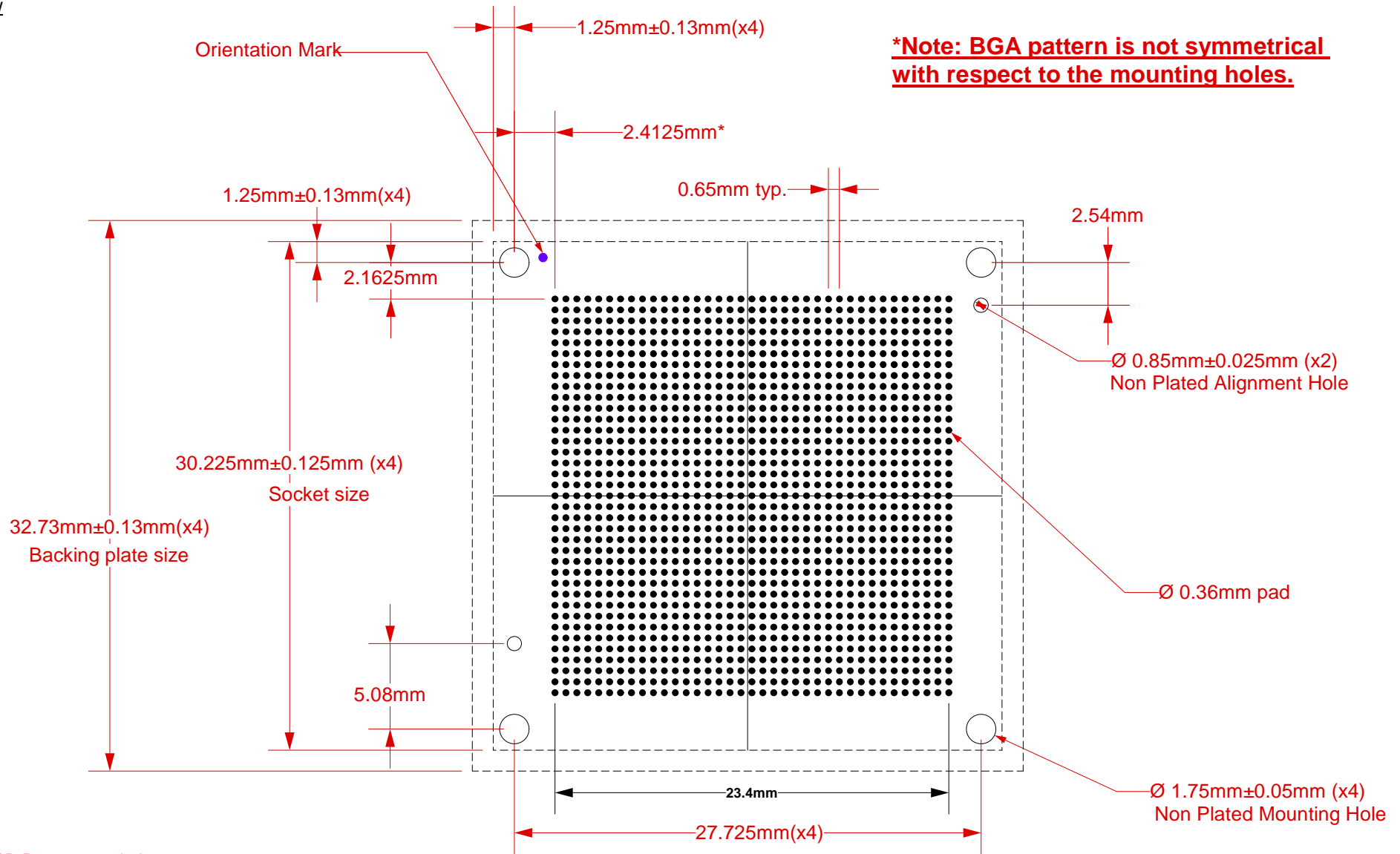


- | | |
|----|---|
| 1 | Socket Lid: Black anodized Aluminum.
Thickness = 2.5mm. |
| 2 | Socket base: Black anodized Aluminum.
Thickness = 6.5mm. |
| 3 | Compression Plate: Black anodized Aluminum.
Thickness = 2.5mm. |
| 4 | Compression screw: Clear anodized Aluminum.
Thickness = 5mm, Hex socket = 5mm. |
| 5 | Elastomer: 40 micron dia gold plated brass
filaments arranged symmetrically in a silicone
rubber (63.5 degree angle).
Thickness = 0.5mm. |
| 6 | Elastomer Guide: Non-clad FR4.
Thickness = 0.475mm. |
| 7 | Ball Guide: Kapton polyimide. |
| 8 | Socket base screw: Socket head cap, Alloy steel with
black oxide finish, 0-80 fine thread , 15.875mm long. |
| 9 | Socket lid screw: Shoulder screw, 18-8 SS, 0-80 fine
thread. |
| 10 | Backing Plate: Anodized Aluminum 6.35mm thick. |
| 11 | Insulation Plate: FR4/G10, 1.59mm thick. |

	SG-BGA-7185 Drawing	Status: Released	Scale: -	Rev: A
	© 2010 IRONWOOD ELECTRONICS, INC. 11351 Rupp Drive, Suite 400, Burnsville, MN 55337 Tele: (952) 229-8200 www.ironwoodelectronics.com	Drawing: E Smolentseva		Date: 4/5/10
		File: SG-BGA-7185 Dwg	Modified:	

All tolerances: ± 0.125 mm (unless stated otherwise). Materials and specifications are subject to change without notice.

Recommended PCB Layout
Top View




***Note: BGA pattern is not symmetrical with respect to the mounting holes.**

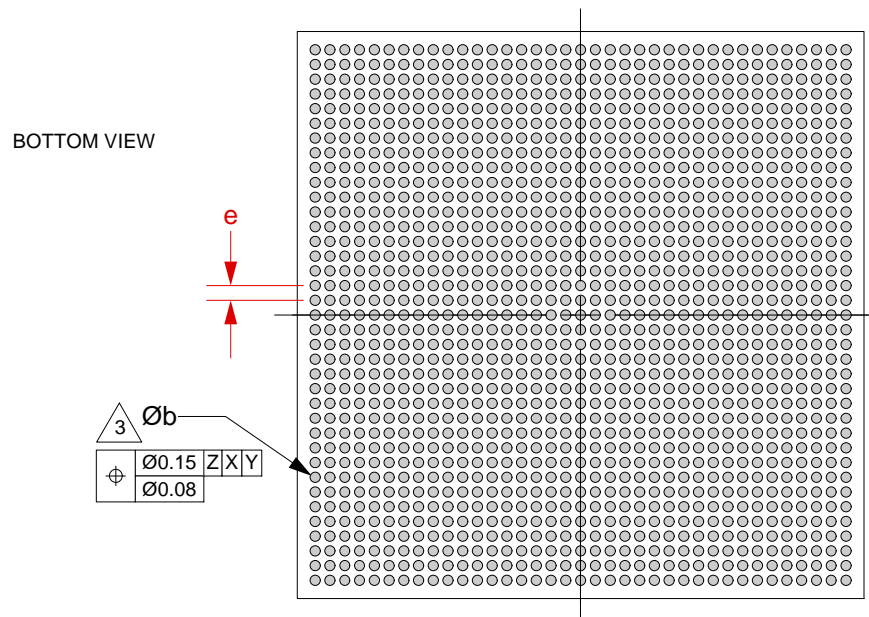
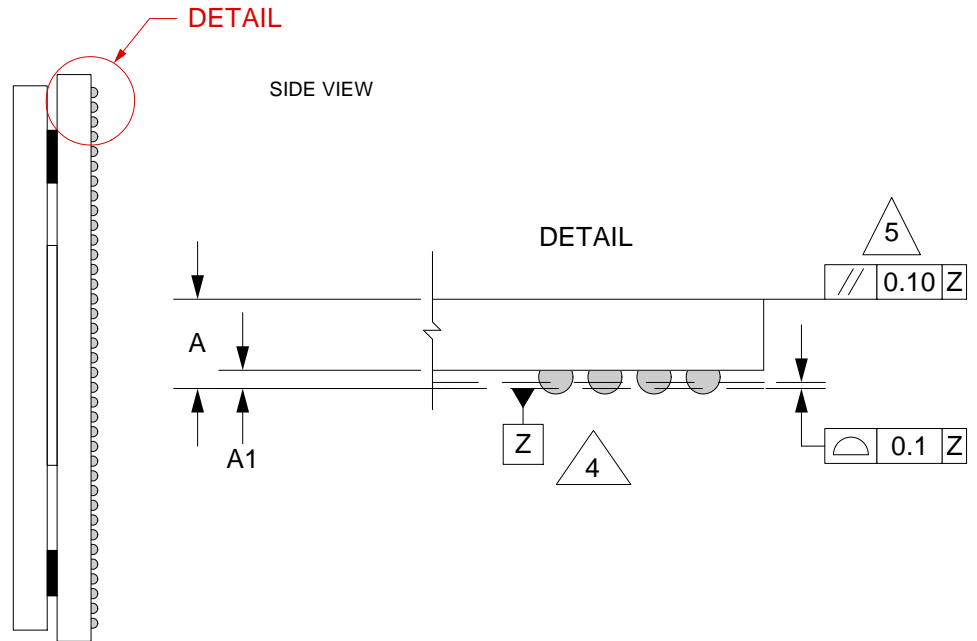
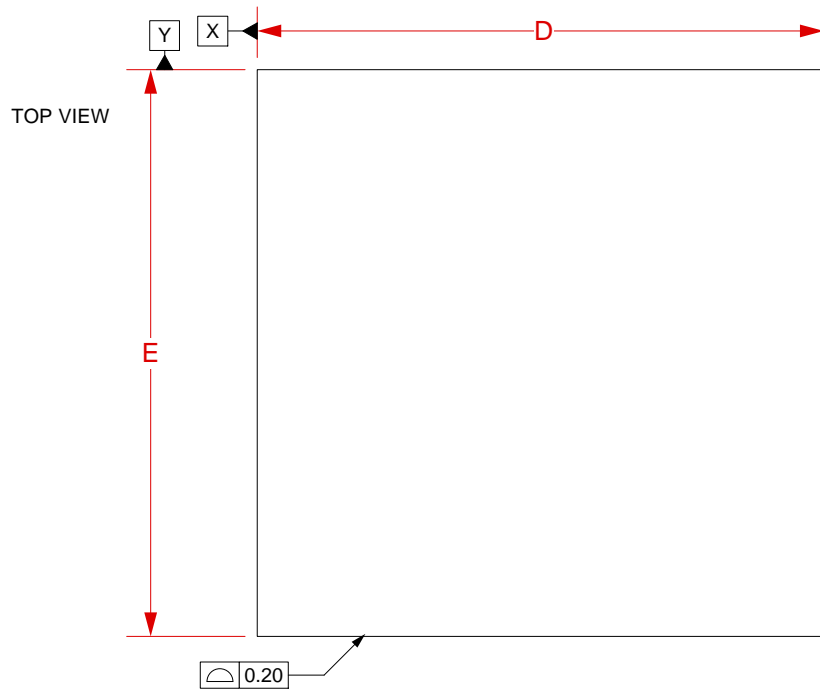
Target PCB Recommendations

Total thickness: 1.6mm min.
Plating: Gold or Solder finish
PCB Pad height: Same or higher than solder mask

NOTE: Steel backing plate may be required based on end user's application

Recommended PCB Layout Tolerances: $\pm 0.025\text{mm} [\pm 0.001"]$ unless stated otherwise.


	SG-BGA-7185 Drawing	Status: Released	Scale: -	Rev: A
	© 2010 IRONWOOD ELECTRONICS, INC. 11351 Rupp Drive, Suite 400, Burnsville, MN 55337 Tele: (952) 229-8200 www.ironwoodelectronics.com	Drawing: E Smolentseva		Date: 4/5/10
		File: SG-BGA-7185 Dwg	Modified:	



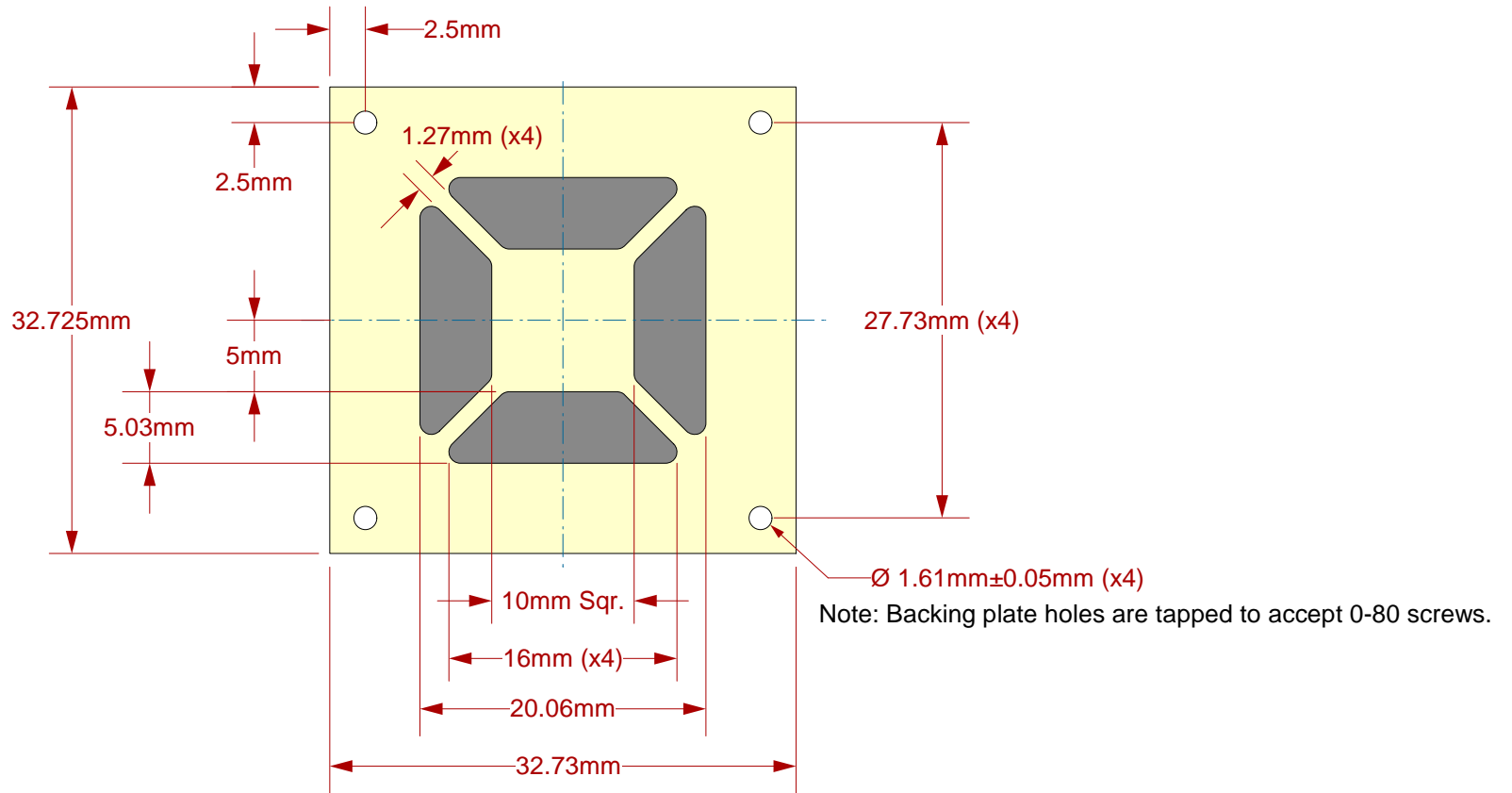
1. Dimensions are in millimeters.
 2. Interpret dimensions and tolerances per ASME Y14.5M-1994.
- 3 Dimension b is measured at the maximum solder ball diameter, parallel to datum plane Z.
 - 4 Datum Z (seating plane) is defined by the spherical crowns of the solder balls.
 - 5 Parallelism measurement shall exclude any effect of mark on top surface of package.

DIM	MIN	MAX
A		3.216
A1	0.23	0.33
b		0.45
D	25.00 BSC	
E	25.00 BSC	
e	0.65mm BSC	

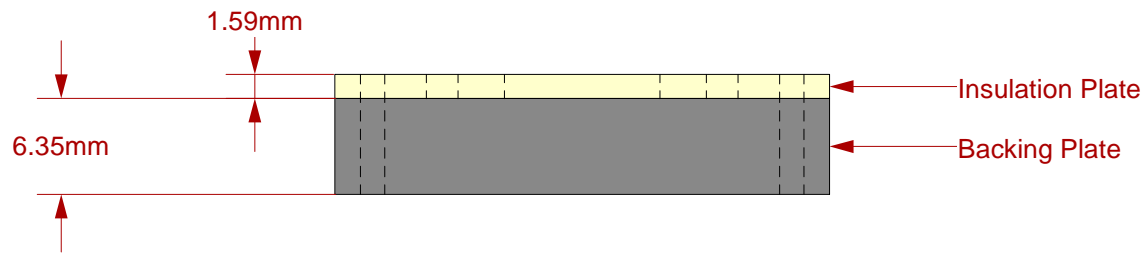
Array 37x37

 <p>© 2010 IRONWOOD ELECTRONICS, INC. 11351 Rupp Drive, Suite 400, Burnsville, MN 55337 Tele: (952) 229-8200 www.ironwoodelectronics.com</p>	SG-BGA-7185 Drawing	Status: Released	Scale: -	Rev: A
	Drawing: E Smolentseva		Date: 4/5/10	
	File: SG-BGA-7185 Dwg		Modified:	


Top View



Side View



Description: Backing Plate

 <p>© 2010 IRONWOOD ELECTRONICS, INC. 11351 Rupp Drive, Suite 400, Burnsville, MN 55337 Tele: (952) 229-8200 www.ironwoodelectronics.com</p>	<p>SG-BGA-7185 Drawing</p>	<p>Status: Released</p>	<p>Scale: -</p>	<p>Rev: A</p>
	<p>Drawing: E Smolentseva</p>	<p>Date: 4/5/10</p>		<p>Modified:</p>
	<p>File: SG-BGA-7185 Dwg</p>			

All dimensions are in mm.
All tolerances are +/- 0.125mm.
(Unless stated otherwise)