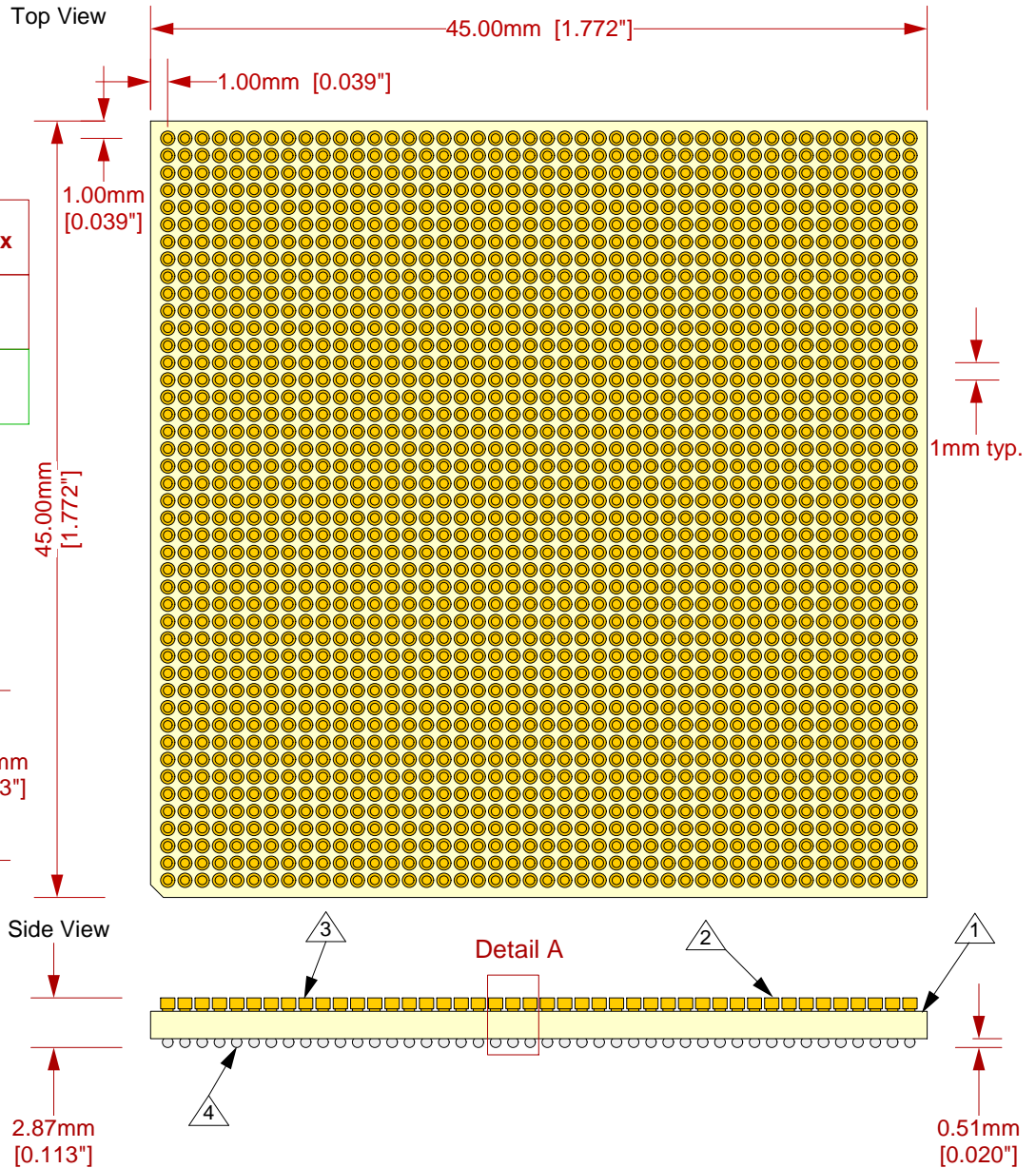


# Patent Pending

Ordering Information:

Solder Ball Alloy	Part Number Suffix
Sn63Pb37	-42
Sn96.5Ag3.0Cu0.5	-42F*

\*RoHS Compliant




**CONTACT DATA**

Accepts 0.20mm - 0.33mm Diameter pins  
 3-finger  
 37 gram, Initial insertion force (with 0.254mm dia. pin)  
 30 gram, normal force (with 0.254mm dia. pin)  
 20 gram, extraction force (with 0.2545mm dia. pin)

**Description:** BGA surface mount emulator foot  
 1936 position (1.0mm pitch) gold plated female receptacle pins to SMT solder balls (BGA type). Pin assignment 1:1.

**Tolerances:** diameters  $\pm 0.03\text{mm}$  [ $\pm 0.001$ "], PCB perimeters  $\pm 0.18\text{mm}$  [ $\pm 0.007$ "], PCB thicknesses  $\pm 0.18\text{mm}$  [ $\pm 0.007$ "], pitches (from true position)  $\pm 0.08\text{mm}$  [ $\pm 0.003$ "], all other tolerances  $\pm 0.13\text{mm}$  [ $\pm 0.005$ "] unless stated otherwise. Materials and specifications are subject to change without notice.

- ① Substrate: 1.59mm  $\pm 0.18\text{mm}$  [ $0.0625$ "  $\pm 0.007$ "] FR4/G10 or equivalent high temp material. (RoHS)
- ② Pins: material- Brass Alloy 360 1/2 hard; finish- 0.25 $\mu\text{m}$  [ $10\mu$ "] Au over 1.27 $\mu\text{m}$  [ $50\mu$ "] Ni (min.).
- ③ Contacts: Beryllium Copper Alloy172, HT; Finish- 0.25 $\mu\text{m}$  [ $10\mu$ "] Au over 1.27 $\mu\text{m}$  [ $50\mu$ "] Ni (min.).
- ④ Solder Balls (See table above)

	<b>SF-BGA1936A-B-42(F) Drawing</b>		Status: Released	Scale: 2.5:1	Rev: C
	© 2004 IRONWOOD ELECTRONICS, INC. PO BOX 21151 ST. PAUL, MN 55121 Tele: (651) 452-8100 www.ironwoodelectronics.com		Drawing: H. Hansen		Date: 12/20/04
			File: SF-BGA1936A-B-42 Dwg		Modified: 1/10/06