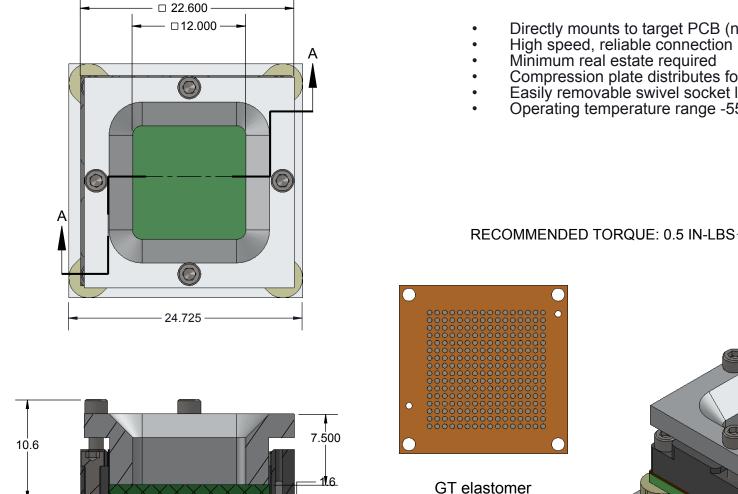
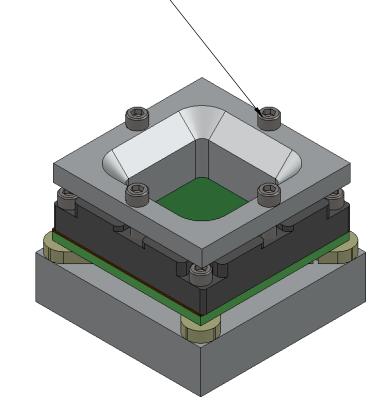
# GT BGA Socket - Direct mount, solderless



## Features

- Directly mounts to target PCB (needs tooling holes) with hardware

- High speed, reliable connection Minimum real estate required Compression plate distributes forces evenly Easily removable swivel socket lid Operating temperature range -55C to +160C



## Description: GT Open top Socket for 17x17mm 1mm pitch BGA256

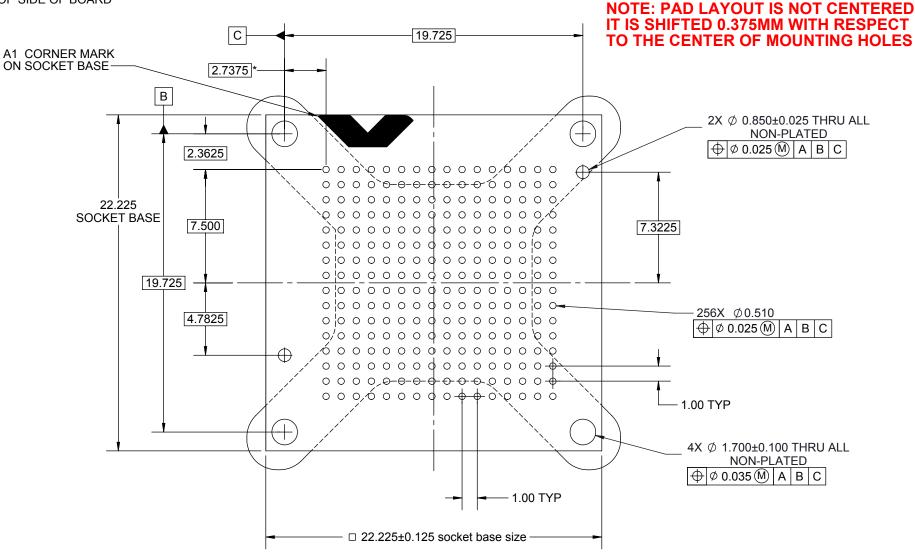
**SECTION A-A** 

Primary dimension units are millimeters, Secondary dimension units are [inches], Weight is in grams.

7.9

Tolerances: Hole diameters ±0.0254mm [±0.001"], Pitches (from true position) ±0.0762mm [±0.003"], substrate thickness tolerance ±10%, all other tolerances ±0.127mm [±0.005"] unless stated otherwise. Materials and specifications are subject to change without notice.

|   | GT-BGA-2026 Drawing Material: N/A   |                              | STATUS: Released      | SHEET: 1 OF 4      | REV. A     |
|---|---|------------------------------|-----------------------|--------------------|------------|
| • | Ironwood Electronics, Inc.<br>Tele: (800) 404-0204<br>www.ironwoodelectronics.com | Finish: N/A<br>Weight: 20.48 | ENG: V. Panavala      | DRAWN BY: M. Raske | SCALE: 5:2 |
|   |   |                              | FILE: GT-BGA-2026 Dwg | DATE: 06/18/2015   |            |



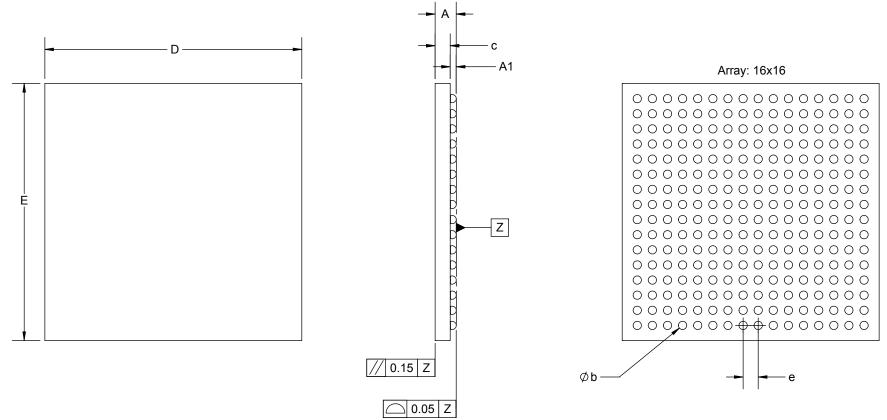
## Description: Recommended PCB Layout

Primary dimension units are millimeters, Secondary dimension units are [inches], Weight is in grams. <u>Tolerances:</u> Hole diameters ±0.03mm [±0.001"], Pitches (from true position) ±0.025mm [±0.001"], substrate thickness tolerance ±10%, all other tolerances ±0.13mm [±0.005"] unless stated otherwise. Materials and specifications are subject to change without notice.

#### Target PCB Recommendations Total Thickness: 1.6mm min. Plating: Gold Immersion, Silver Immersion or Solder PCB Pad Height: same or higher than solder mask

| GT-BGA-2026 Drawing                                | s, Inc. Finish: N/A<br>204 Weight: 20.48 | STATUS: Released      | SHEET: 2 OF 4      | REV. A     |
|--|--|-----------------------|--------------------|------------|
| Ironwood Electronics, Inc.<br>Tele: (800) 404-0204 |  | ENG: V. Panavala      | DRAWN BY: M. Raske | SCALE: 4:1 |
| www.ironwoodelectronics.com                        |  | FILE: GT-BGA-2026 Dwg | DATE: 06/18/2015   |            |

## **IRONWOOD COMPATIBLE PACKAGE CODE: BGA256E**



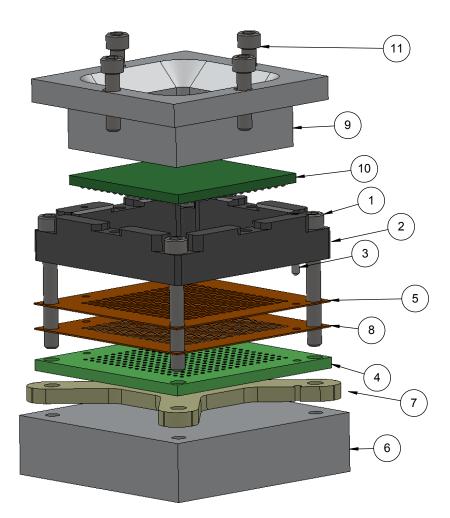
- 1. Dimensions are in millimeters.
- 2. Interpret dimensions and tolerances per ASME Y14.5M-1994.
- 3. Dimension b is measured at the maximum solder ball diameter, parallel to datum plane Z.
- 4. Datum Z (seating plane) is defined by the spherical crowns of the solder balls.
- 5. Parallelism measurement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

#### **Description: Compatible Device**

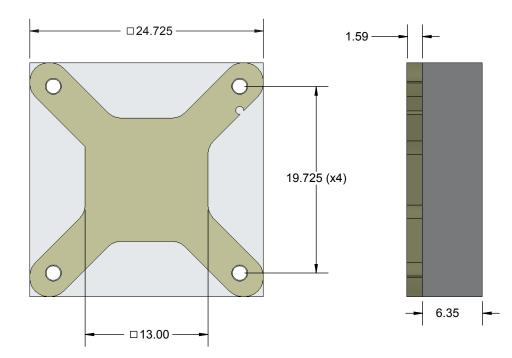
Primary dimension units are millimeters, Secondary dimension units are [inches], Weight is in grams. <u>Tolerances:</u> Hole diameters ±0.03mm [±0.001"], Pitches (from true position) ±0.025mm [±0.001"], substrate thickness tolerance ±10%, all other tolerances ±0.13mm [±0.005"] unless stated otherwise. Materials and specifications are subject to change without notice.

| DIM | MIN  | MAX  |
|-----|------|------|
| Α   | 1.0  | 2.0  |
| A1  | 0.29 | 0.43 |
| b   | 0.5  | 0.6  |
| D   | 16.8 | 17.2 |
| Е   | 16.8 | 17.2 |
| е   | 1.0  |      |

| GT-BGA-2026 Drawing                                | Material: N/A<br>Finish: N/A<br>Weight: 20.48 | STATUS: Released               | SHEET: 3 OF 4      | REV. A     |
|--|---|--------------------------------|--------------------|------------|
| Ironwood Electronics, Inc.<br>Tele: (800) 404-0204 |   | ENG: V. Panavala               | DRAWN BY: M. Raske | SCALE: 4:1 |
| www.ironwoodelectronics.com                        | troight 20.10                                 | FILE: GT-BGA-2026 Dwg DATE: 06 | DATE: 06/18/2015   |            |



| ITEM<br>NO. | DESCRIPTION  | Material                |
|-------------|--|-------------------------|
| 1           | Mounting Screw   | Stainless Steel         |
| 2           | Socket Base  | Aluminum Alloy          |
| 3           | Dowel Pin  | Stainless Steel         |
| 4           | Target PCB   | High Temp FR4           |
| 5           | Ball Guide; BGA256, 16x16 arr<br>1mm pitch 0.375 offset      | Kapton Polyimide/Cirlex |
| 6           | Backing Plate  | Aluminum Alloy          |
| 7           | Insulation Plate for 17x17mm IC                              | FR4 Standard            |
| 8           | GT Elastomer 17x17mm IC 1mm<br>pitch 16x16 array             | Conductive Elastomer    |
| 9           | Socket Lid/Compression Plate                                 | 7075-T6 Aluminum Alloy  |
| 10          | TEST CHIP  | High Temp FR4           |
| 11          | #0-80 X .25 LG, SOC HD CAP<br>SCREW, ALLOY STL, BLK<br>OXIDE | Alloy Steel             |



## Description: Socket, Backing Plate Detail

Primary dimension units are millimeters, Secondary dimension units are [inches], Weight is in grams. <u>Tolerances</u>; Hole diameters ±0.03mm [±0.001"], Pitches (from true position) ±0.025mm [±0.001"], substrate thickness tolerance ±10%, all other tolerances ±0.13mm [±0.005"] unless stated otherwise. Materials and specifications are subject to change without notice.

## INSULATION AND BACKING PLATE DETAIL

|  |               | STATUS: Released      | SHEET: 4 OF 4      | REV. A     |
|--|---------------|-----------------------|--------------------|------------|
| Ironwood Electronics, Inc.<br>Tele: (800) 404-0204 | Weight: 20.48 | ENG: V. Panavala      | DRAWN BY: M. Raske | SCALE: 5:2 |
| www.ironwoodelectronics.com                        |               | FILE: GT-BGA-2026 Dwg | DATE: 06/18/2015   |            |