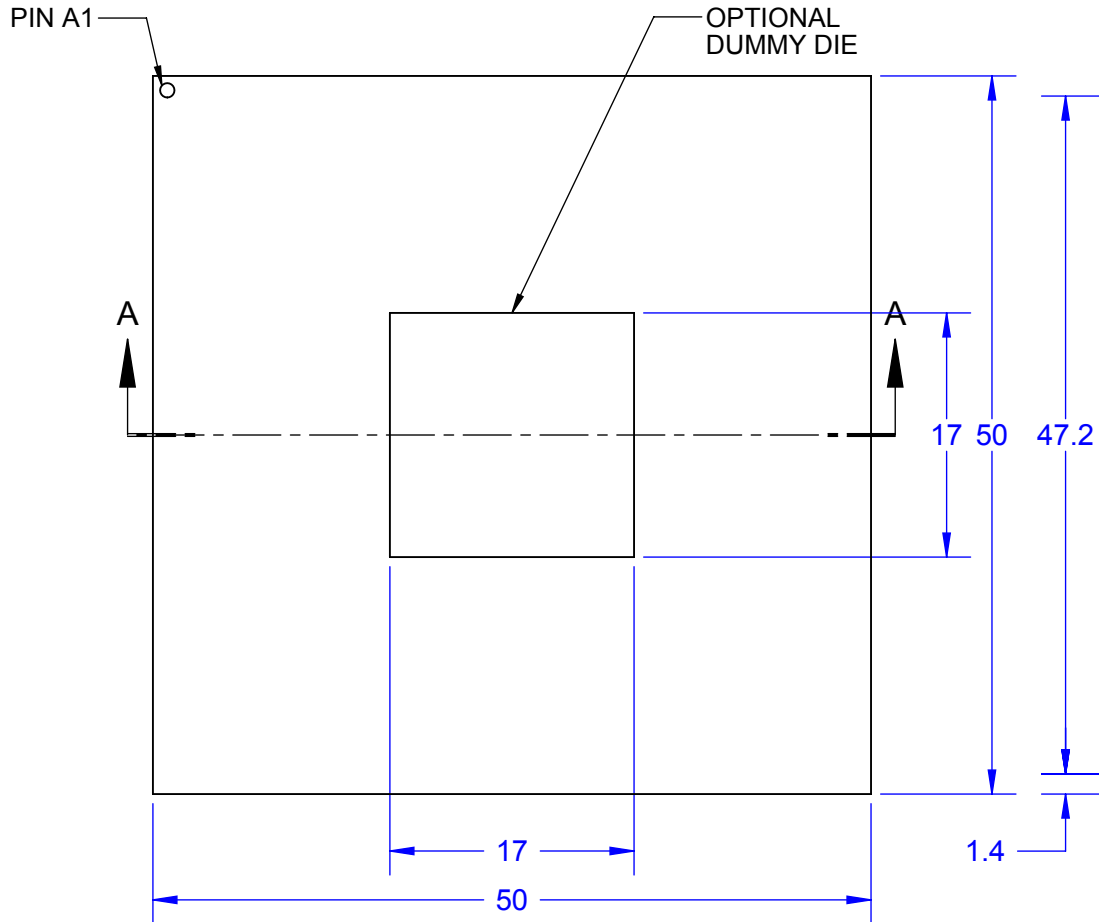
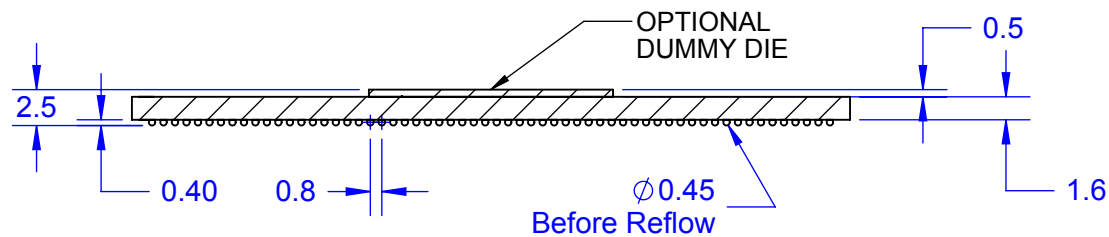
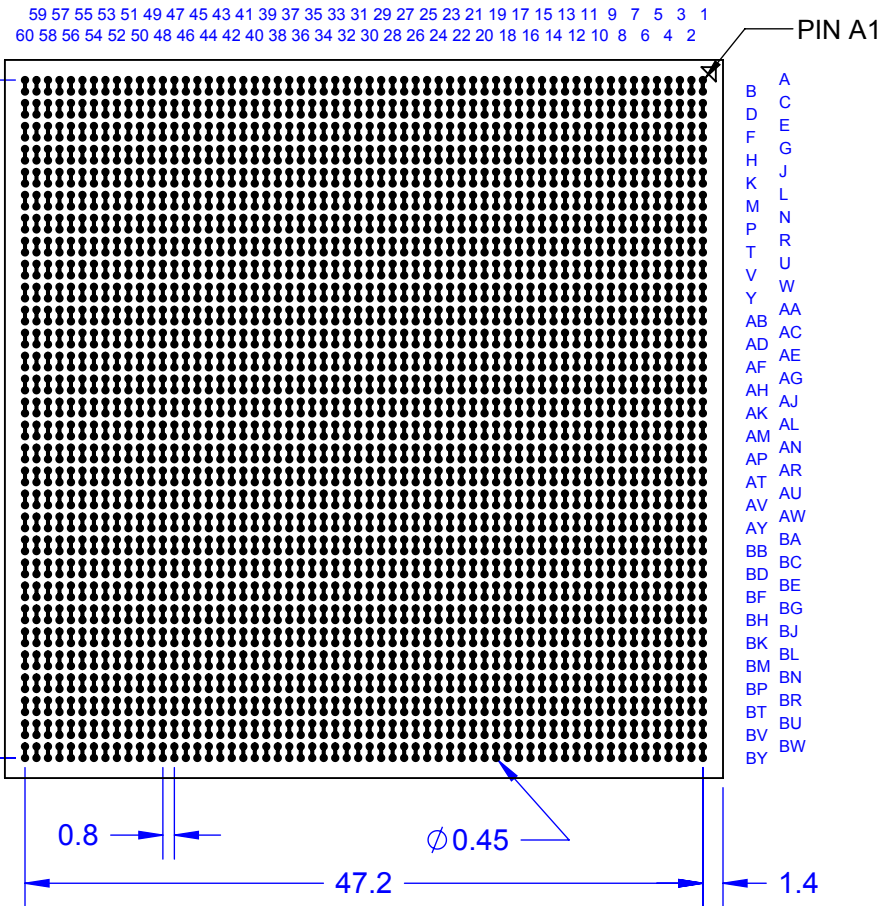


TOP VIEW



BALL VIEW



SECTION A-A

Notes: (Unless Otherwise Specified).

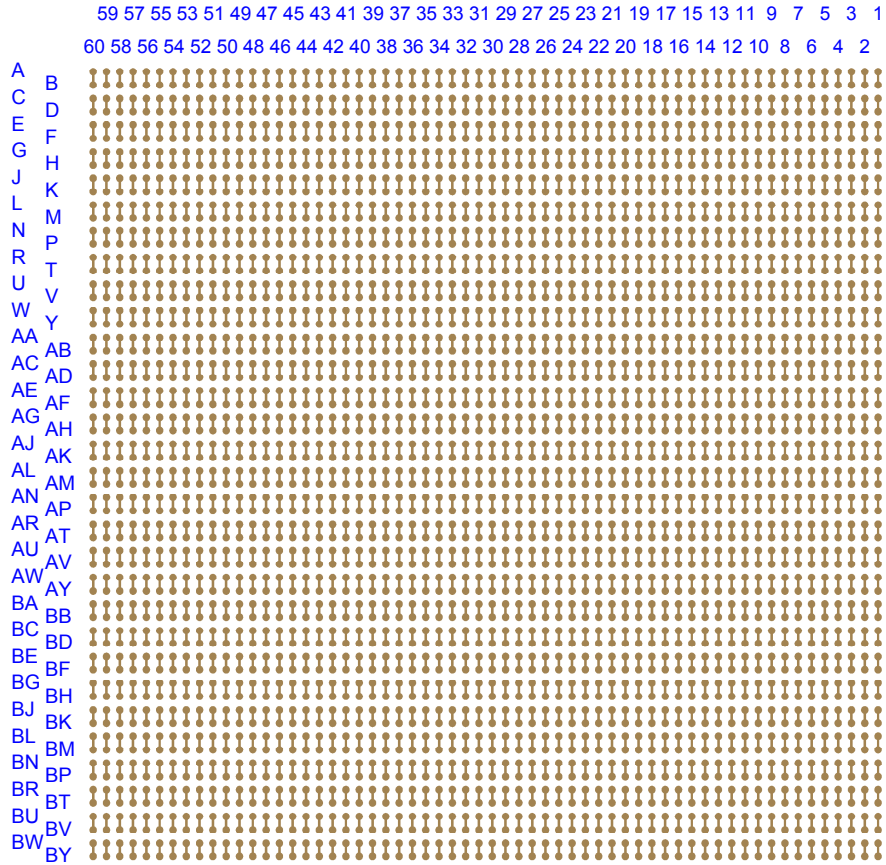
- 1) ALL DIMENSIONS ARE IN MM.
- 2) SOLDER BALL ALLOY: SEE PART NUMBER TABLE.
- 3) BALL DIAMETER (BEFORE REFLOW): 0.45mm (18 MIL).
- 4) SOLDER MASK DEFINED PAD OPENING: 0.356mm (14 MIL).
- 5) PAD Cu DIAMETER: 0.508mm (20 MIL).
- 6) SUBSTRATE MATERIAL: FR4 (ALTERNATE BT or Polyimide).
- 7) DUMMY DIE IS OPTIONAL.
- 8) DAISY CHAIN PATTERN (SEE PAGE 2).
- 9) MSL-3 RECOMMENDED BAKING 24 HOURS @ 125°C TO REMOVE MOISTURE PRIOR SOLDERING TO PC BOARD.

PART NUMBER TABLE

| PART NUMBER         | BALL ALLOY         | Pb-Free | RoHS | Si DIE |
|---------------------|--------------------|---------|------|--------|
| LBGA3600T.8C-DC609  | Sn96.5/Ag3.0/Cu0.5 | YES     | YES  | NO     |
| LBGA3600T.8C-DC609D | Sn96.5/Ag3.0/Cu0.5 | YES     | YES  | YES    |
| LBGA3600T.8-DC609   | Sn63/Pb37          | NO      | NO   | NO     |
| LBGA3600T.8-DC609D  | Sn63/Pb37          | NO      | NO   | YES    |

| APPROVALS   | DATE     |   |        |                    |              |
|-------------|----------|---|--------|--------------------|--------------|
| DRAWN T.Au  | 10/23/13 |   |        |                    |              |
| ENG M. Hart | 10/23/13 | TITLE LBGA3600T.8-DC509 DAISY CHAIN DUMMY |        |                    |              |
| MFG         |          | SCALE 1.8:1                               | SIZE A | DRAWING NO. 586091 | REV A        |
| QA          |          | DO NOT SCALE DRAWING                      |        |                    | SHEET 1 OF 3 |
| CUST        |          |   |        |                    |              |
| REVISED     |          |   |        |                    |              |

## BALL VIEW



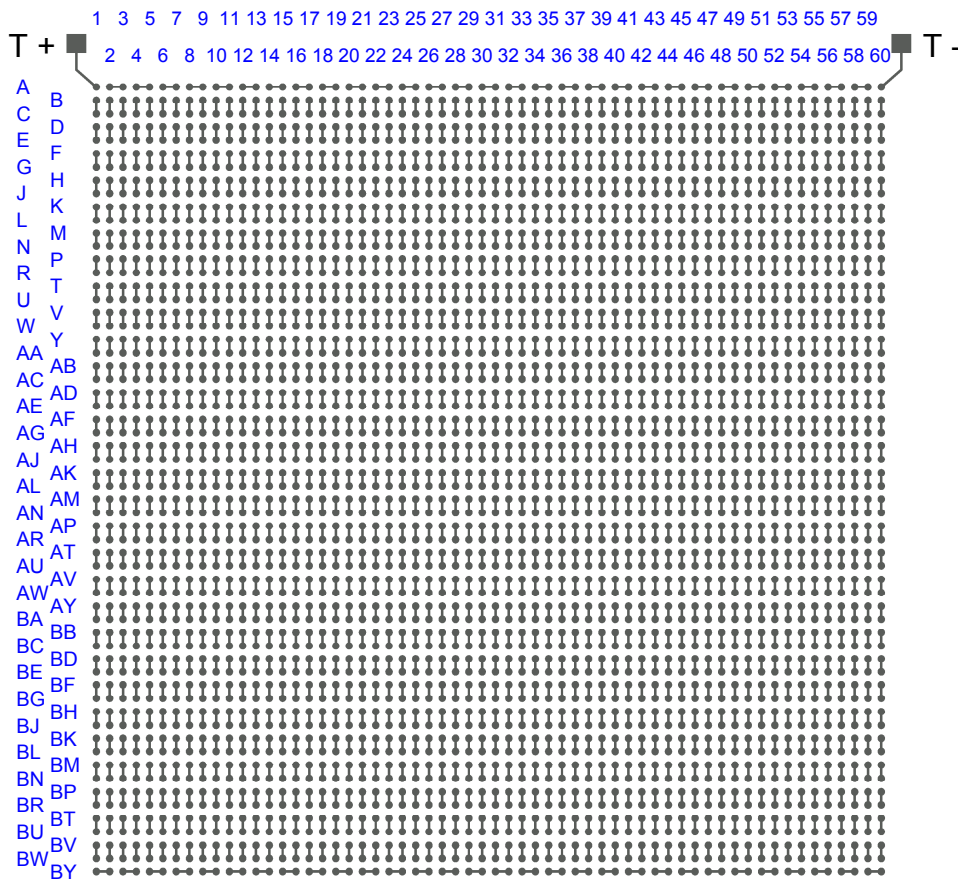
## BOTTOM SIDE (TOP X-RAY VIEW)



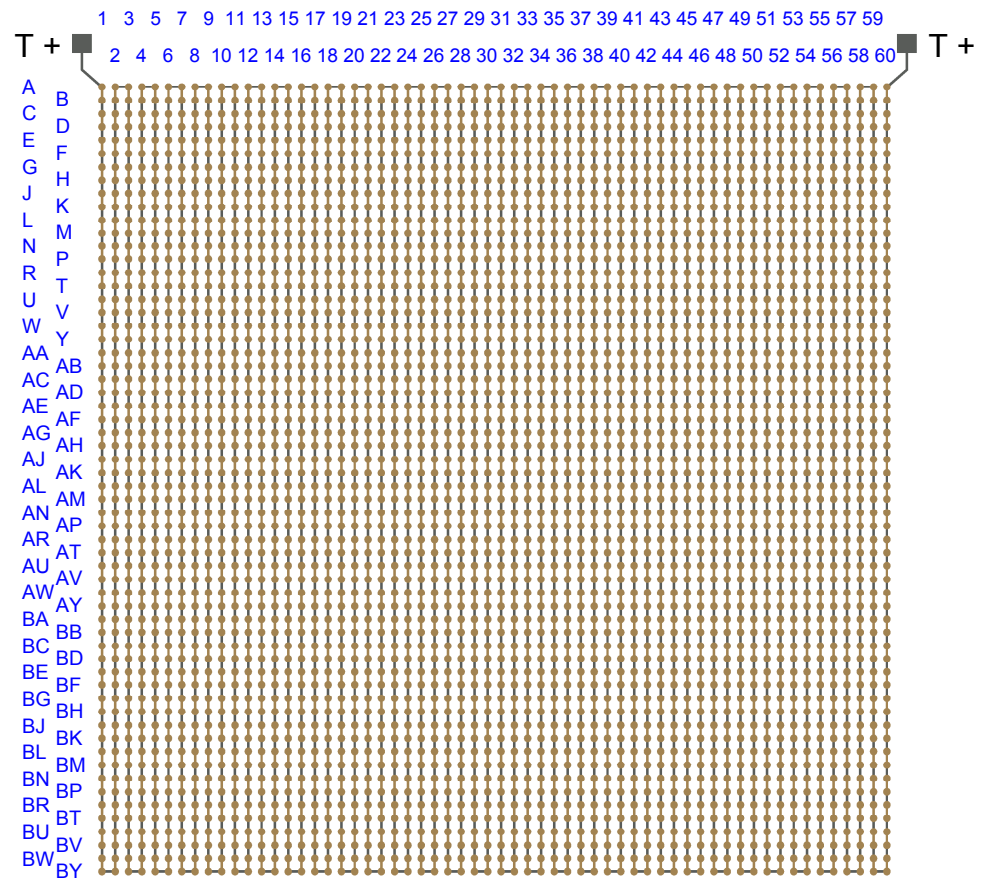
**Notes:**

- 1) PCB BOARD DIMENSIONS ARE PRESENTED ONLY AS A GUIDELINE. DESIGNERS SHOULD USE THEIR OWN EXPERIENCE WHEN DESIGNING PCB.
- 2) PCB Cu BALL PAD DIAMETER 0.508mm (20 MIL).
- 3) PCB DAISY CHAIN TRACING LINE WIDTH 0.152mm (6 MIL).
- 4) SMD (SOLDER MASK DEFINED) PAD OPENING: 0.356mm (14 MIL).

|                      |      |  |              |
|----------------------|------|--|--------------|
| <b>TopLine®</b>      |      |  |              |
| TITLE                |      | LBGA3600T.8-DC509<br>DAISY CHAIN DUMMY |              |
| SCALE                | SIZE | DRAWING NO.                            | REV          |
| 1.4:1                | A    | 586091                                 | A            |
| DO NOT SCALE DRAWING |      |  | SHEET 2 OF 3 |



TEST VEHICLE BOARD



AFTER MOUNTING

Notes:

- 1) PCB BOARD DIMENSIONS ARE PRESENTED ONLY AS A GUIDELINE. DESIGNERS SHOULD USE THEIR OWN EXPERIENCE WHEN DESIGNING PCB.
- 2) PCB Cu BALL PAD DIAMETER 0.508mm (20 MIL).
- 3) PCB DAISY CHAIN TRACING LINE WIDTH 0.152mm (6 MIL).
- 4) SMD (SOLDER MASK DEFINED) PAD OPENING: 0.356mm (14 MIL).

|                      |      |  |              |
|----------------------|------|--|--------------|
| <b>TopLine®</b>      |      |  |              |
| TITLE                |      | LBGA3600T.8-DC509<br>DAISY CHAIN DUMMY |              |
| SCALE                | SIZE | DRAWING NO.                            | REV          |
| 1.4:1                | A    | 586091                                 | A            |
| DO NOT SCALE DRAWING |      |  | SHEET 3 OF 3 |