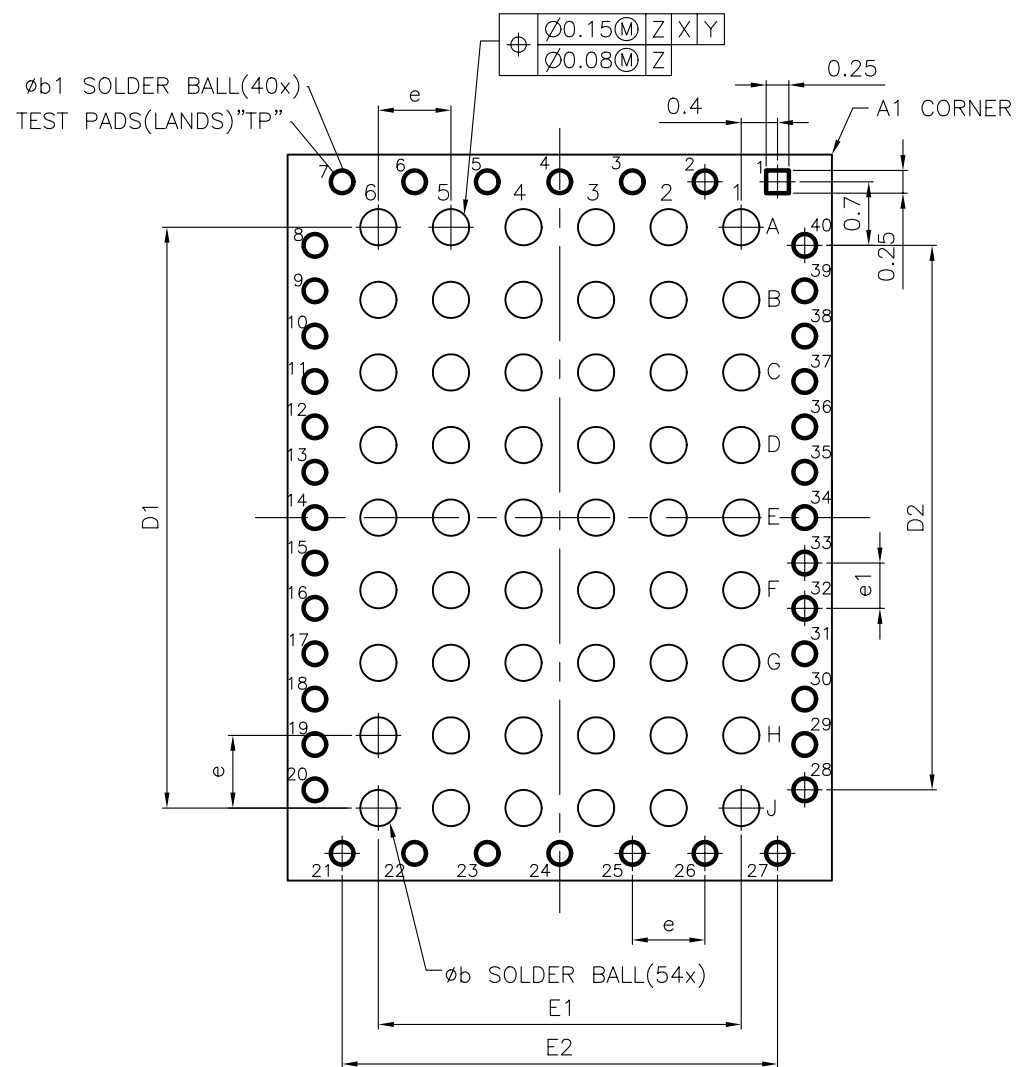
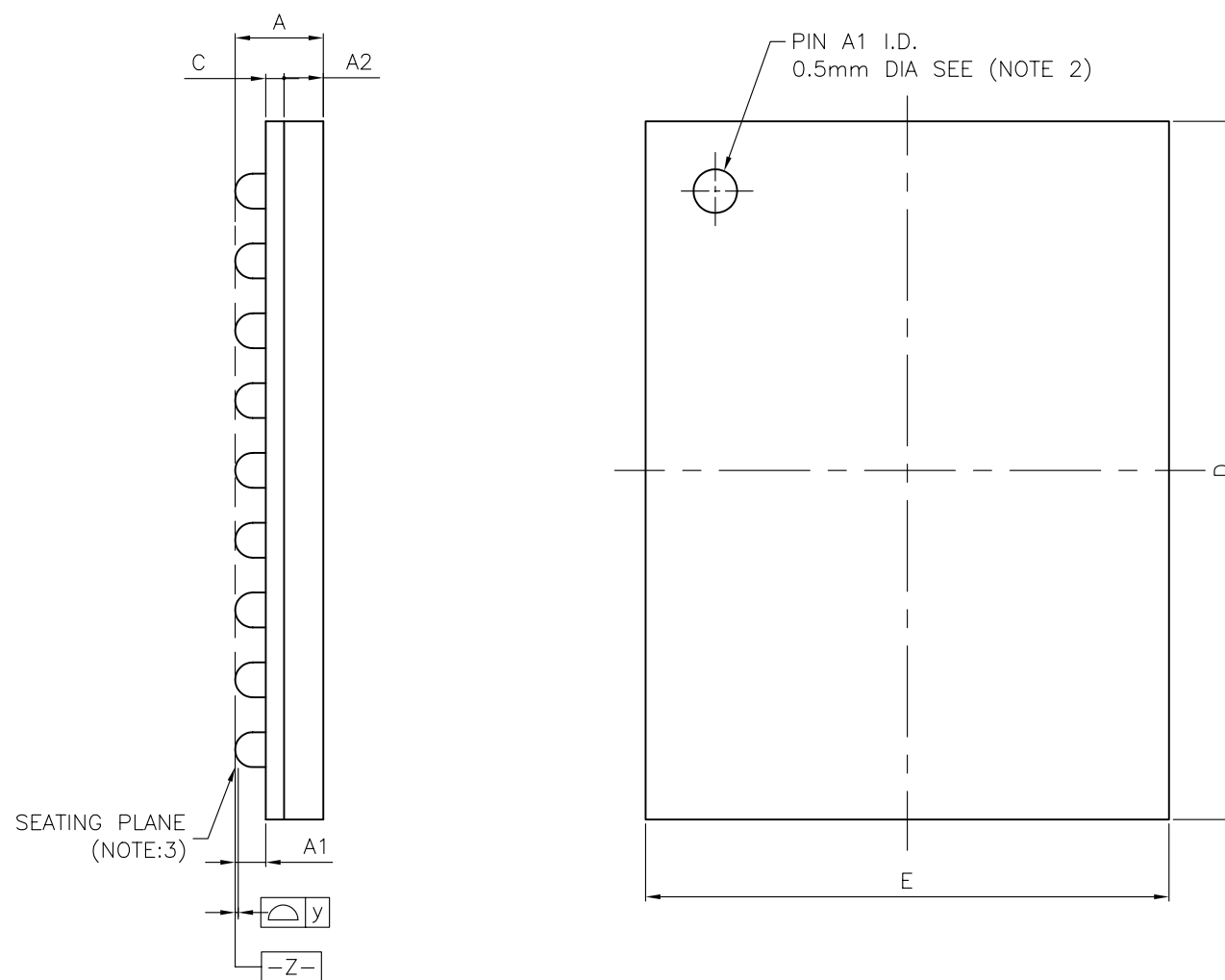


BOTTOM SIDE BOTTOM VIEW



TOP SIDE TOP VIEW



NOTE :

1. ALL DIMENSION ARE IN MILLIMETERS.
2. PIN A1 ID. TO BE MARKED BY LASER.
3. PRIMARY DATUM [-Z-] AND SEATING PLANE ARE DEFINED BY THE SPHERICAL CROWNS OF THE SOLDER BALLS.
4. "e" REPRESENTS THE MAXIMUM SOLDER BALL GRID PITCH.
5. DIMENSION "b" IS MEASURED AT THE MAXIMUM SOLDER BALL PITCH. PARALLEL TO PRIMARY DATUM [-Z-].
6. TP=TEST PADS(LANDS) ON PERIPHERAL OF BALL ARRAY
7. BALLS IN ARRAY ARE NUMBERED A1 TO J6, USED FOR SYSTEM LEVEL CONNECTION.
8. PERIPHERAL TP'S ARE NUMBERED 1 TO 40, USED FOR TEST CONNECTIONS ONLY.
9. MAXIMUM 40 TP'S MAY BE USED. TP COUNT MAY VARY WITH DEVICE.

SYMBOLS	DIMENSIONS IN MILLIMETERS		
	MIN	NOM	MAX
A	0.80	—	1.00
A1	0.22	—	—
A2	0.425	0.45	0.475
øb	0.35	0.40	0.45
øb1	0.25	0.30	0.35
c	—	0.21	—
D	7.90	8.00	8.10
D1	—	6.40	—
D2	—	6.00	—
E	5.90	6.00	6.10
E1	—	4.00	—
E2	—	4.80	—
e	—	0.80	—
e1	—	0.50	—
y	0.00	—	0.10

CUSTOMER :	
APPROVED BY	DATE
DRAW BY: <i>Sandy Sue</i>	08/16/05
CHECK BY: <i>S. S. Lin</i>	08/18/05
APPROVAL: <i>Kevin Liao</i>	08/18/05
APPROVAL: <i>Jack Tu</i>	08/18/05

LINGSEN 5-1 NAN 2ND ROAD T.E.P.Z PRECISION IND., LTD. TAICHUNG., TAIWAN. R. O. C		
TITLE: VFBGA 54L(6x8mm) PACKAGE OUTLINE DRAWING		
DWG. NO. PO-VFBGA-001	REV. 0	
UNIT : mm	SCALE : 15/1	SHEET 1 OF 1