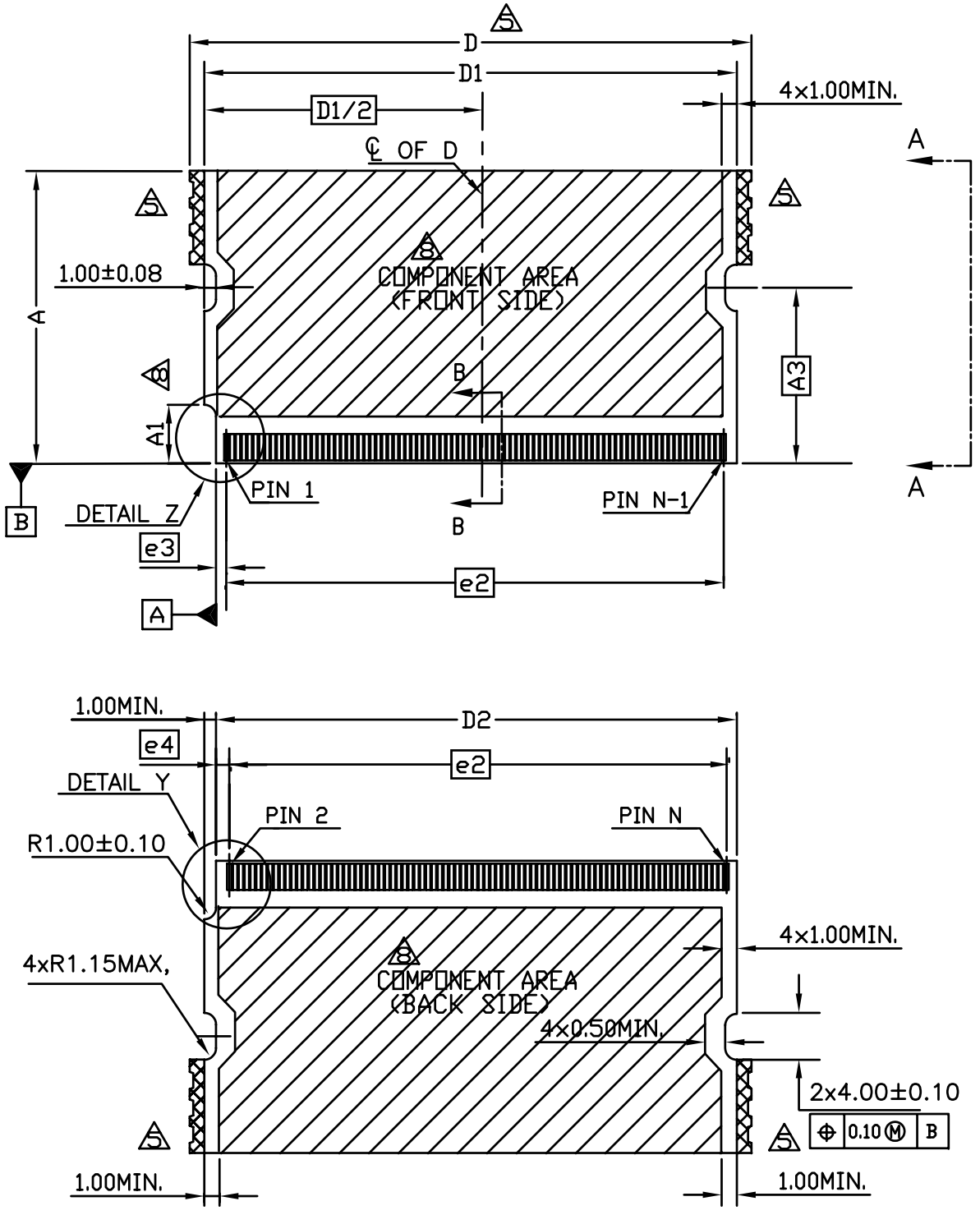
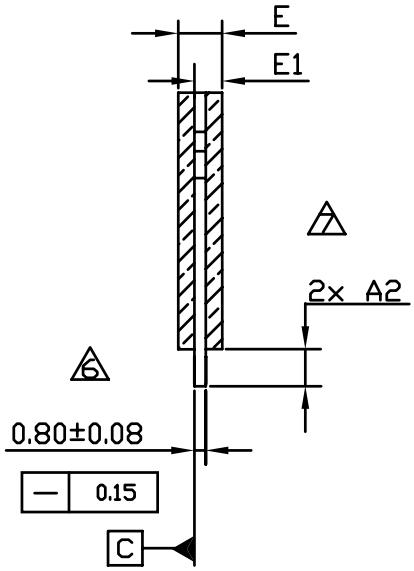


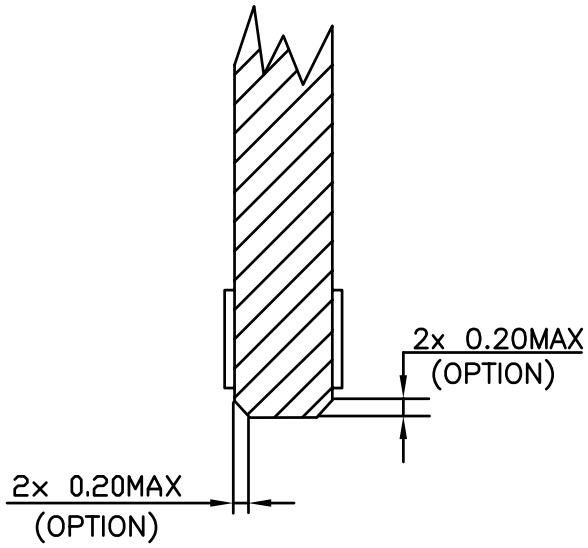
PATENT NOTES

JEDEC SOLID STATE PRODUCT OUTLINE	THIS **REGISTERED OUTLINE** HAS BEEN PREPARED BY THE JEDEC JC-11 COMMITTEE AND REFLECTS A PRODUCT WITH ANTICIPATED USAGE IN THE ELECTRONICS INDUSTRY; CHANGES ARE LIKELY TO OCCUR.

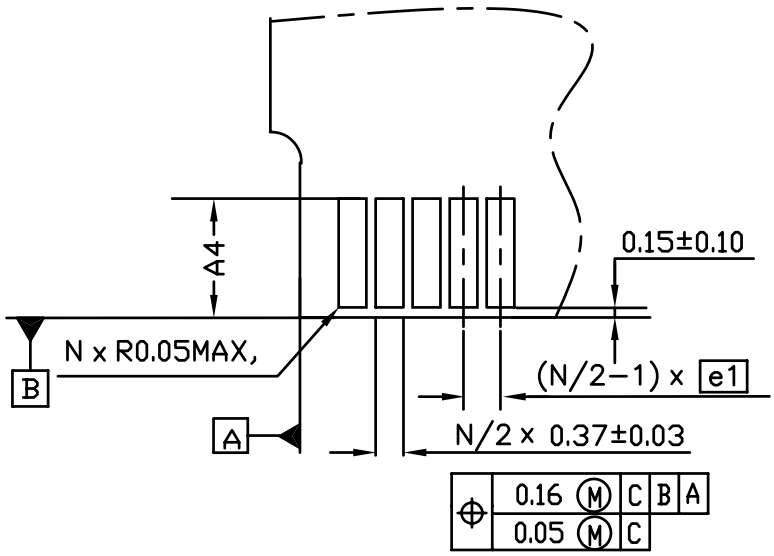
TITLE	DESIGNATOR	ISSUE	DATE		SHEET
MICRO DUAL INLINE MEMORY MODULE FAMILY 0.50mm LEAD CENTERS		B	09/02	MO-214	1 OF 6



VIEW A–A



VIEW B–B 10



DETAIL Z

JEDEC SOLID STATE PRODUCT OUTLINE	TITLE MICRO DUAL INLINE MEMORY MODULE FAMILY 0.50mm LEAD CENTERS	ISSUE B	DATE 09/02	MO–214	SHEET 2 OF 6

	COMMON DIMMENSIONS			NOTES
SYMBOL	MIN	NOM	MAX	
A3		15.00 BSC		
E	—	—	3.80	
E1	—	—	2.35	
e1		0.50 BSC		
e3		0.625 BSC		
e4		0.875 BSC		
NOTES		1,2,3,4		
ISSUE		B		
REF		14–049		

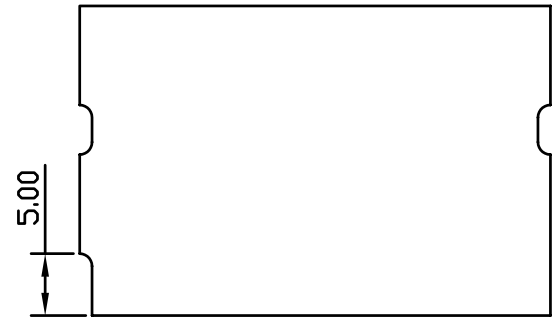
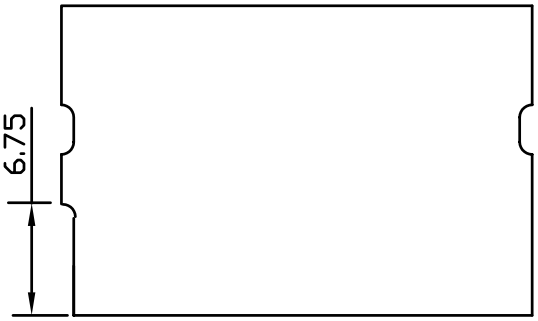
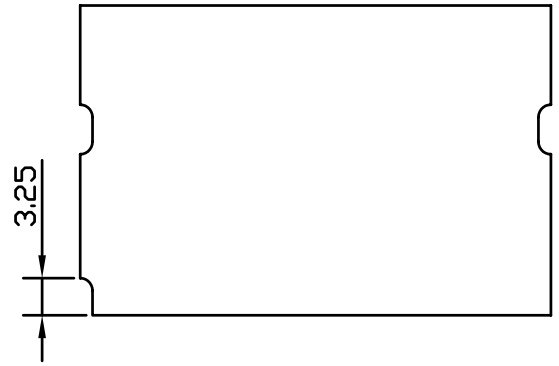
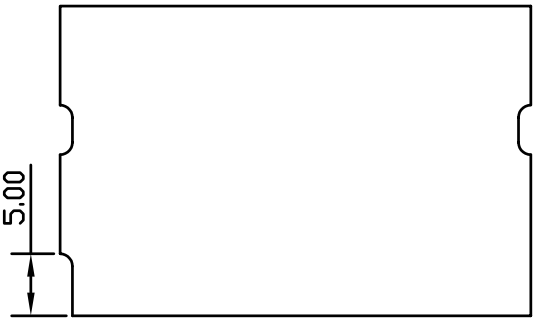
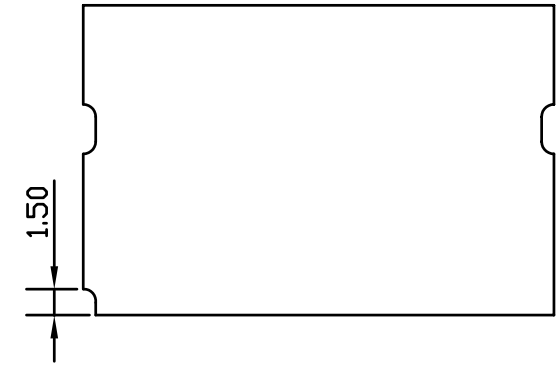
	AA			AB			AC			NOTE
SYMBOL	MIN	NOM	MAX	MIN	NOM	MAX	MIN	NOM	MAX	
A	24.85	25.00	25.15	24.85	25.00	25.15	24.85	25.00	25.15	
A1	4.90	5.00	5.10	3.15	3.25	3.35	1.40	1.50	1.60	8
A2	3.50	—	—	3.50	—	—	3.50	—	—	7
A4	2.00	—	—	2.00	—	—	2.00	—	—	
D	—	—	42.50	—	—	42.50	—	—	42.50	5
D1	37.92	38.00	38.08	37.92	38.00	38.08	37.92	38.00	38.08	
D2	36.92	37.00	37.08	36.92	37.00	37.08	36.92	37.00	37.08	
e2		35.50 BSC			35.50 BSC			35.50 BSC		
N		144			144			144		
ISSUE		B			B			B		
REF		14–049			14–049			14–049		

	BA			BB			BC			NOTE
SYMBOL	MIN	NOM	MAX	MIN	NOM	MAX	MIN	NOM	MAX	
A	29.85	30.00	30.15	29.85	30.00	30.15	29.85	30.00	30.15	
A1	4.90	5.00	5.10	3.15	3.25	3.35	1.40	1.50	1.60	8
A2	3.50	—	—	3.50	—	—	3.50	—	—	7
A4	2.00	—	—	2.00	—	—	2.00	—	—	
D	—	—	42.50	—	—	42.50	—	—	42.50	5
D1	37.92	38.00	38.08	37.92	38.00	38.08	37.92	38.00	38.08	
D2	36.92	37.00	37.08	36.92	37.00	37.08	36.92	37.00	37.08	
e2		35.50 BSC			35.50 BSC			35.50 BSC		
N		144			144			144		
ISSUE		B			B			B		
REF		14–049			14–049			14–049		

	CA			CB			CC			NOTE
SYMBOL	MIN	NOM	MAX	MIN	NOM	MAX	MIN	NOM	MAX	
A	24.85	25.00	25.15	24.85	25.00	25.15	24.85	25.00	25.15	
A1	6.65	6.75	6.85	4.90	5.00	5.10	3.15	3.25	3.35	8
A2	4.00	—	—	4.00	—	—	4.00	—	—	7
A4	2.50	—	—	2.50	—	—	2.50	—	—	
D	—	—	48.50	—	—	48.50	—	—	48.50	5
D1	45.42	45.50	45.58	45.42	45.50	45.58	45.42	45.50	45.58	
D2	44.42	44.50	44.58	44.42	44.50	44.58	44.42	44.50	44.58	
e2	42.50 BSC			42.50 BSC			42.50 BSC			
N	172			172			172			
ISSUE	B			B			B			
REF	14–049			14–049			14–049			

	DA			DB			DC			NOTE
SYMBOL	MIN	NOM	MAX	MIN	NOM	MAX	MIN	NOM	MAX	
A	29.85	30.00	30.15	29.85	30.00	30.15	29.85	30.00	30.15	
A1	6.65	6.75	6.85	4.90	5.00	5.10	3.15	3.25	3.35	8
A2	4.00	—	—	4.00	—	—	4.00	—	—	7
A4	2.50	—	—	2.50	—	—	2.50	—	—	
D	—	—	48.50	—	—	48.50	—	—	48.50	
D1	45.42	45.50	45.58	45.42	45.50	45.58	45.42	45.50	45.58	
D2	44.42	44.50	44.58	44.42	44.50	44.58	44.42	44.50	44.58	5
e2	42.50 BSC			42.50 BSC			42.50 BSC			
N	172			172			172			
ISSUE	B			B			B			
REF	14–049			14–049			14–049			

MECHANICAL KEYING
(FRONT VIEWS) 8

POWER SUPPLY	144 PIN	172 PIN
3.3V		
2.5V		
T.B.D		

JEDEC SOLID STATE PRODUCT OUTLINE	TITLE MICRO DUAL INLINE MEMORY MODULE FAMILY 0.50mm LEAD CENTERS	ISSUE B	DATE 09/02	MO-214	SHEET 5 OF 6

NOTES:

1. DIMENSIONING AND TOLERANCING CONFORM TO ASME Y14.5M–1994.
2. TOLERANCES ON ALL DIMENSIONS ±0.15 UNLESS OTHERWISE SPECIFIED.
3. ALL DIMENSIONS ARE mm.
4. APPLICATION NOTE:

   RECOMMENDED PLATING FOR CONTACT PADS ARE ;

   1) PREFERABLE PLATING : ELECTROLYTIC GOLD PLATING 0.76 MICROMETERS MINIMUM OVER ELECTROLYTIC NI 2.00 MICROMETERS MINIMUM.

   2) ALTERNATIVE PLATING : GOLD PLATING 0.05–0.75 MICROMETERS OVER NI 2.00 MICROMETERS MINIMUM MUST USE AN ELECTRONIC CONTACT GRADE CORROSIVE BARRIER LUBRICANT.

△5 WHEN OPTIONAL EARS EXIST "D" IS CONTROLING AND WHEN OPTIONAL EARS DO NOT EXIST "D" DOES NOT APPLY.

△6 CARD THICKNESS APPLIES ACROSS TABS AND INCLUDES PLATING AND/OR METALIZATION.

△7 APPLICATION NOTE:
BORDER OF COMPONENT AREA.

△8 THE JC–42.5 COMMITTEE CONTROLS THE INFORMATION IN THIS COLUMN. IT IS SHOWN HERE FOR REFERENCE ONLY, AND IS SUBJECT TO CHANGE.

9 BIAS SOCKET REQUIRED.

△10 THE ADDITION OF THIS BEVEL IS A FABRICATION OPTION AND IS NOT REQUIRED THE BEVEL AIDS THE INSERTION OF THE MODULE INTO THE CONNECTOR. THE BEVEL IS NOT TO HIT THE GOLD CONTACTS.

PATENT NOTES:

△11 IT HAS BEEN STATED THAT U.S. PATENT NO. 5,227,664 (HELD BY HITACHI) MAY RELATE TO CERTAIN IMPLEMENTATIONS OF THIS PACKAGE OUTLINE.
IT HAS BEEN STATED THAT JAPAN PATENT NO. 356105/2000, US(NOT ISSUED YET) (HELD BY QUASAR SYSTEM) MAY RELATE TO CERTAIN CONNECTOR STRUCTURE FOR THIS PACKAGE OUTLINE.