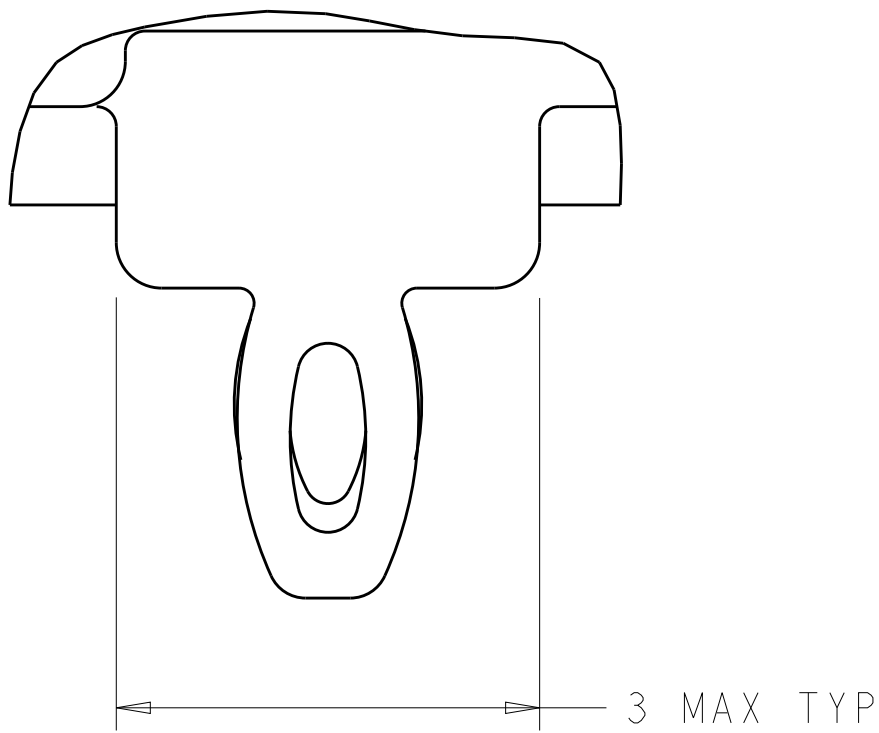


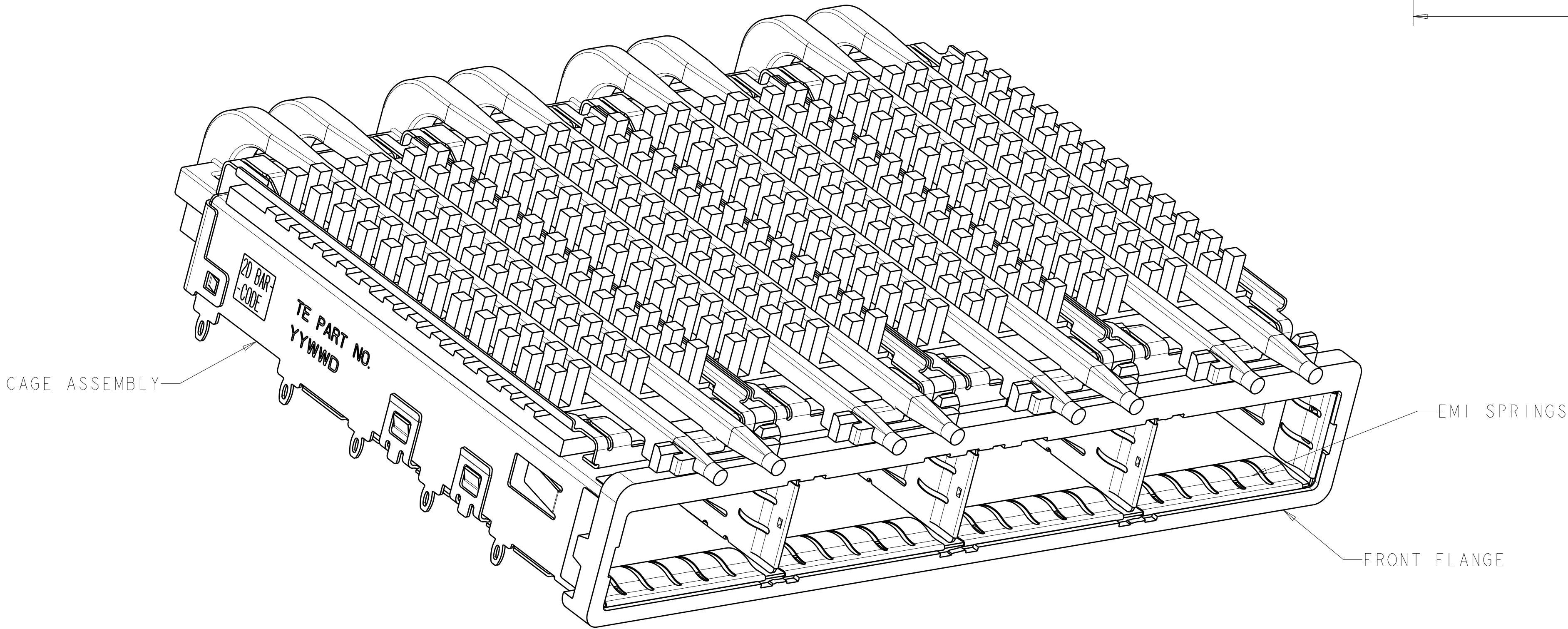
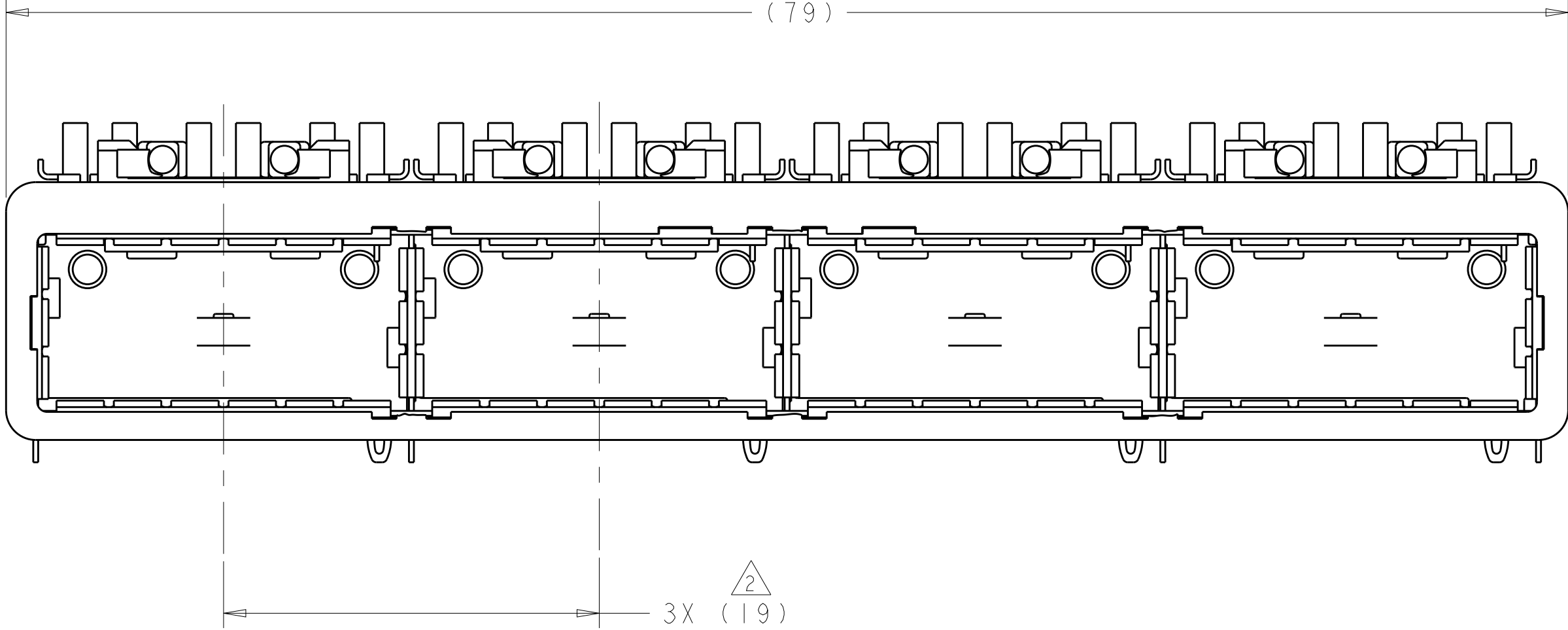
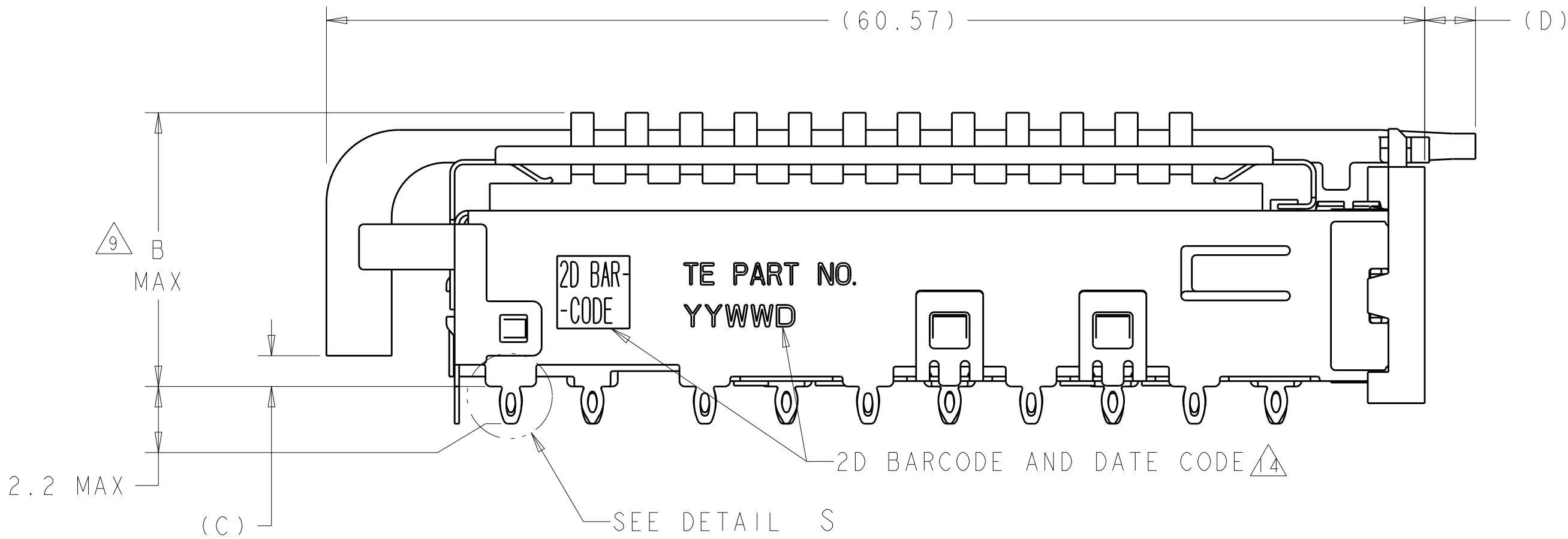
LOC	DIST	REVISIONS						
		P	LTR	DESCRIPTION	DATE	DWN	APVD	
GP	00		C	REVISED PER ECO-10-018054	04NOV2010	CJV	EJB	
			D	REVISED PER ECO-12-003481	15MAR2012	KS	AC	
			E	REVISED PER ECO-12-005533	31MAR2012	JY	AC	
			F	REVISED PER ECO-14-017735	30EC2014	RG	MC	



DETAIL S
SCALE 20:1

- 1 CAGE ASSEMBLY MATERIAL: NICKEL SILVER, 0.25 THICK
HEAT SINK MATERIAL: ALUMINUM
HEAT SINK CLIP MATERIAL: STAINLESS STEEL
EMI SPRING MATERIAL: COPPER ALLOY
FRONT FLANGE MATERIAL: ZINC ALLOY
LIGHT PIPE MATERIAL: CLEAR POLYCARBONATE
- 2 PITCH BETWEEN PORTS OF ONE 1X4 CAGE ASSEMBLY.
- 3 SPACING BETWEEN CAGES ON THE SAME PC BOARD, TO BE SPECIFIED BY CUSTOMER, MUST COMPLY WITH MINIMUM DIMENSIONS SHOWN.
- 4 REFERENCE APPLICATION SPEC 114-13218 FOR RECOMMENDED DRILL HOLE DIAMETER AND PLATING THICKNESS.
- 5 DATUMS AND BASIC DIMENSIONS ESTABLISHED BY CUSTOMER.
- 6 DIMENSION F IS THE NOMINAL THICKNESS OF CUSTOMER SUPPLIED PC BOARD, SINGLE SIDED PC BOARD MINIMUM THICKNESS = 1.45mm
DOUBLE SIDED PC BOARD MINIMUM THICKNESS = 2.2mm PER QSFP.
- 7 HEAT SINKS, LIGHT PIPES, AND HEAT SINK CLIPS SHIPPED ASSEMBLED TO CAGE ASSEMBLY. CAGE ASSEMBLY MAY BE PRESSED INTO THE PCB AS SHIPPED.
- 8 DATUM -A- IS TOP SURFACE OF PC BOARD.
- 9 DIMENSION APPLIES WITH MODULE INSERTED IN CAGE.
- 10 UNPLATED THRU HOLE.
- 11 MATES WITH QSFP MSA COMPATIBLE TRANSCEIVER.
- 12 SURFACE TRACES PERMITTED WITHIN THIS AREA EXCEPT WHERE CAGE STANDOFFS, SHOWN IN DETAIL S, CONTACT PC BOARD.
- 13 BASELINE FOR THESE DIMENSIONS IS THE CENTER OF COMPLIANT PIN HOLE.
- 14 2D BARCODE AND DATE CODE (YYWWDD) MARKED ON SIDE OF CAGE ASSEMBLY.

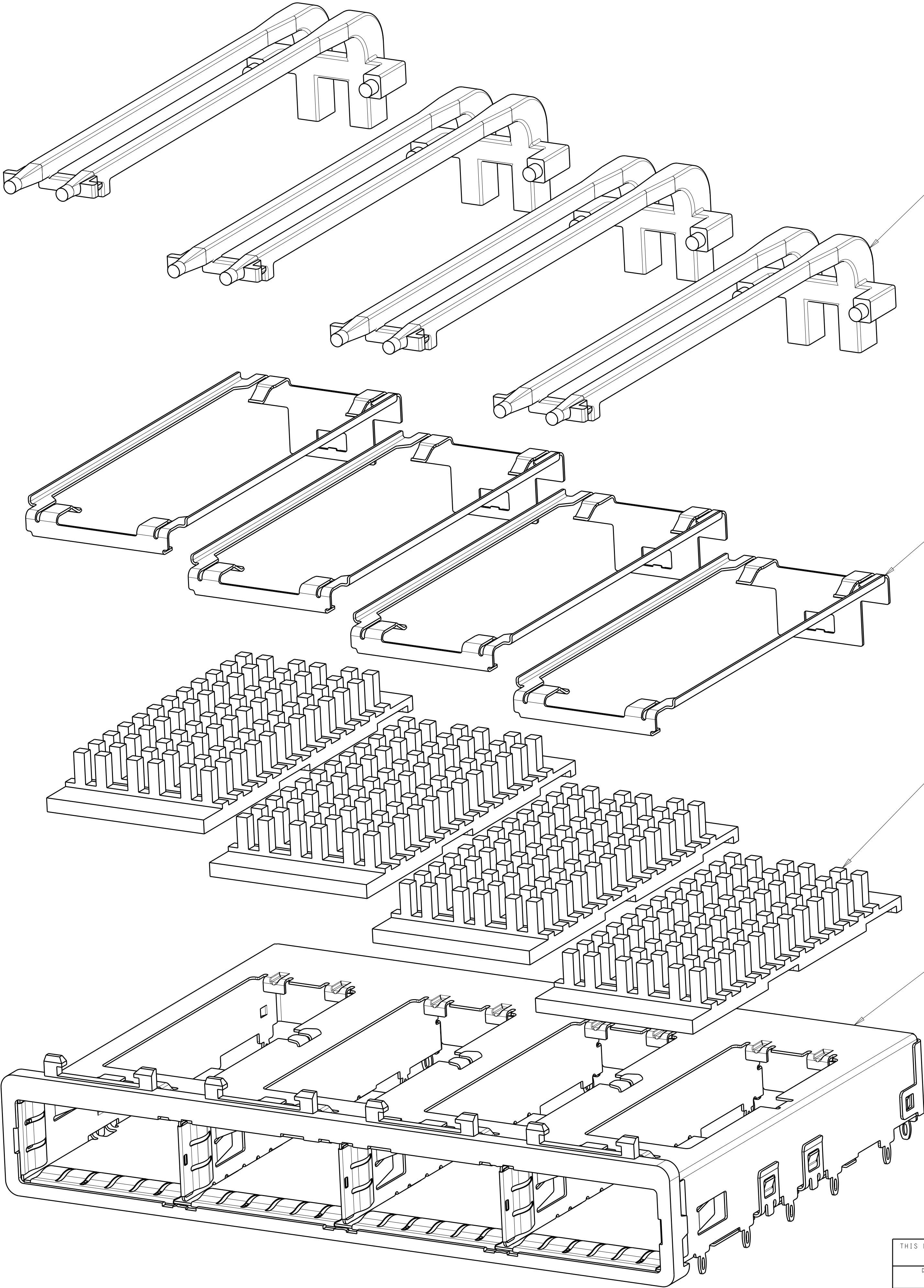
- 15 REFERENCE APP SPEC 114-13218 FOR GASKET THICKNESS CALCULATION.
- 16 EMI SPRING FINISH: 2µm MINIMUM TIN
FRONT FLANGE FINISH: 3µm MINIMUM TIN OVER 1.27µm MINIMUM NICKEL
OVER 5.08µm MINIMUM COPPER.
HEAT SINK FINISH: NICKEL
- 17 HEAT SINKS AND CLIPS SHIPPED ASSEMBLED TO CAGE ASSEMBLY. CAGE ASSEMBLY MAY BE PRESSED INTO THE PCB AS SHIPPED. LIGHT PIPES, SHIPPED UNATTACHED, MUST BE ASSEMBLED BY CUSTOMER AFTER THE CASE IS SEATED IN THE PCB.



1	1.3-1.4	5.7	2.15	16.0	SAN	2057183-5
1	1.3-1.4	5.7	2.15	13.7	PCI	2057183-4
1	0.8-1.1	2.8	1.70	23.0	NETWORKING	2057183-3
1	0.8-1.1	2.8	1.70	16.0	SAN	2057183-2
1	0.8-1.1	2.8	1.70	13.7	PCI	2057183-1
	E	D	C	B	HEAT SINK PROFILE	PART NUMBER

THIS DRAWING IS A CONTROLLED DOCUMENT.		DWN C. VALENTINE 01MAY2008	TE Connectivity			
		CHK E. BRIGHT 01MAY2008	NAME 1X4 CAGE ASSEMBLY, BEHIND BEZEL, W/ LIGHT PIPES AND HEAT SINKS, QSFP			
		APVD F. BRIGHT 01MAY2008	SIZE CAGE CODE DRAWING NO RESTRICTED TO			
DIMENSIONS:		TOLERANCES UNLESS OTHERWISE SPECIFIED:		PRODUCT SPEC		
mm		0 PLC ±0.1		108-2286		
		1 PLC ±0.1		APPLICATION SPEC		
		2 PLC ±0.1		114-13218		
		3 PLC ±0.1		WEIGHT		
		4 PLC ±0.1		A100779C=2057183		
MATERIAL		FINISH		CUSTOMER DRAWING		
1		16		SCALE 4:1 SHEET 1 OF 5 REV F		

LOC		DIST		REVISIONS				
GP	00	P	LTR	DESCRIPTION	DATE	DWN	APVD	
		-	-	SEE SHEET 1	-	-	-	



DOUBLE LIGHT PIPES
QUANTITY: 4

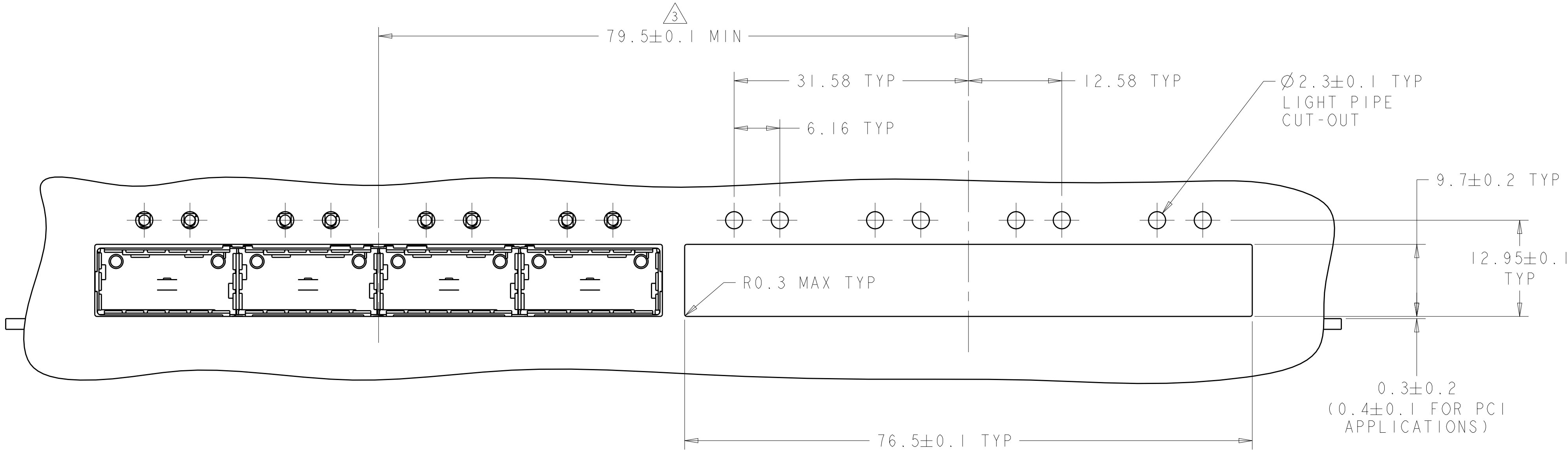
HEAT SINK CLIPS
QUANTITY: 4

72 PIN HEAT SINKS
QUANTITY: 4

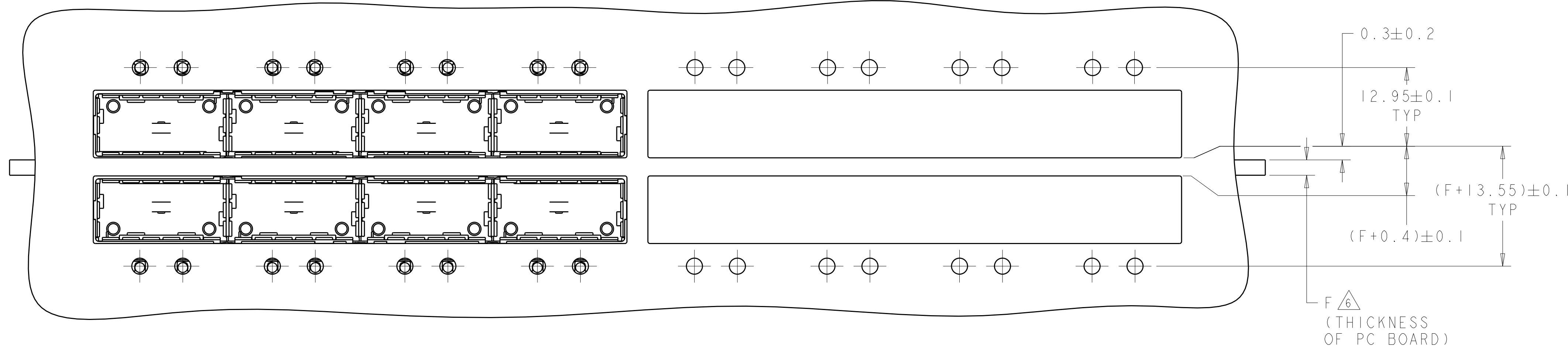
1X4 BEHIND BEZEL QSFP
CAGE ASSEMBLY
QUANTITY: 1

THIS DRAWING IS A CONTROLLED DOCUMENT.		DWN C. VALENTINE	01MAY2008	TE Connectivity	
		CHK E. BRIGHT	01MAY2008		
DIMENSIONS:		APVD F. BRIGHT	01MAY2008	NAME 1X4 CAGE ASSEMBLY, BEHIND BEZEL, W/ LIGHT PIPES AND HEAT SINKS, QSFP	
mm		TOLERANCES UNLESS OTHERWISE SPECIFIED:		PRODUCT SPEC	
		0 PLC		108-2286	
		1 PLC		APPLICATION SPEC	
		2 PLC		114-13218	
		3 PLC		WEIGHT	
MATERIAL		FINISH		CUSTOMER DRAWING	
				SCALE 4:1 SHEET 2 OF 5 REV F	

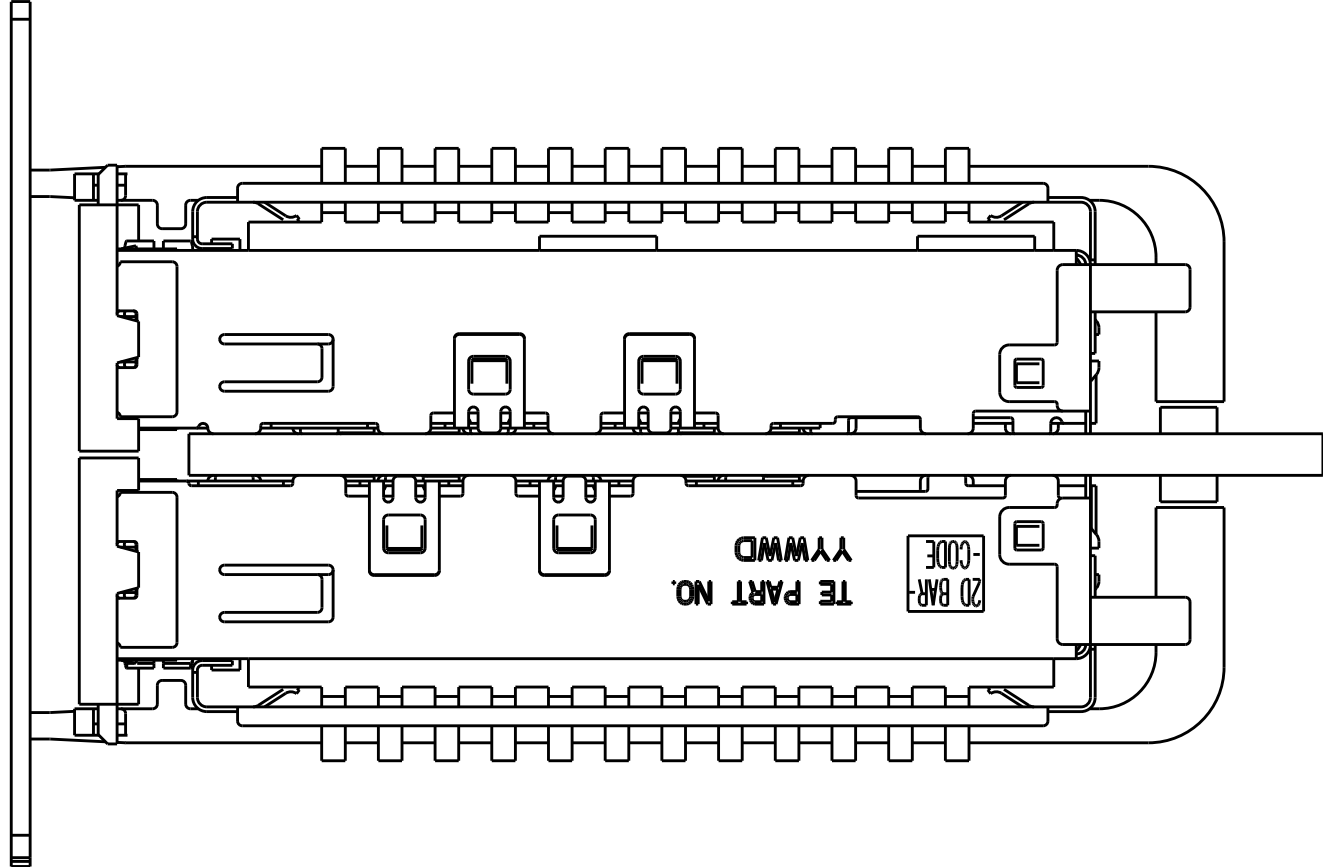
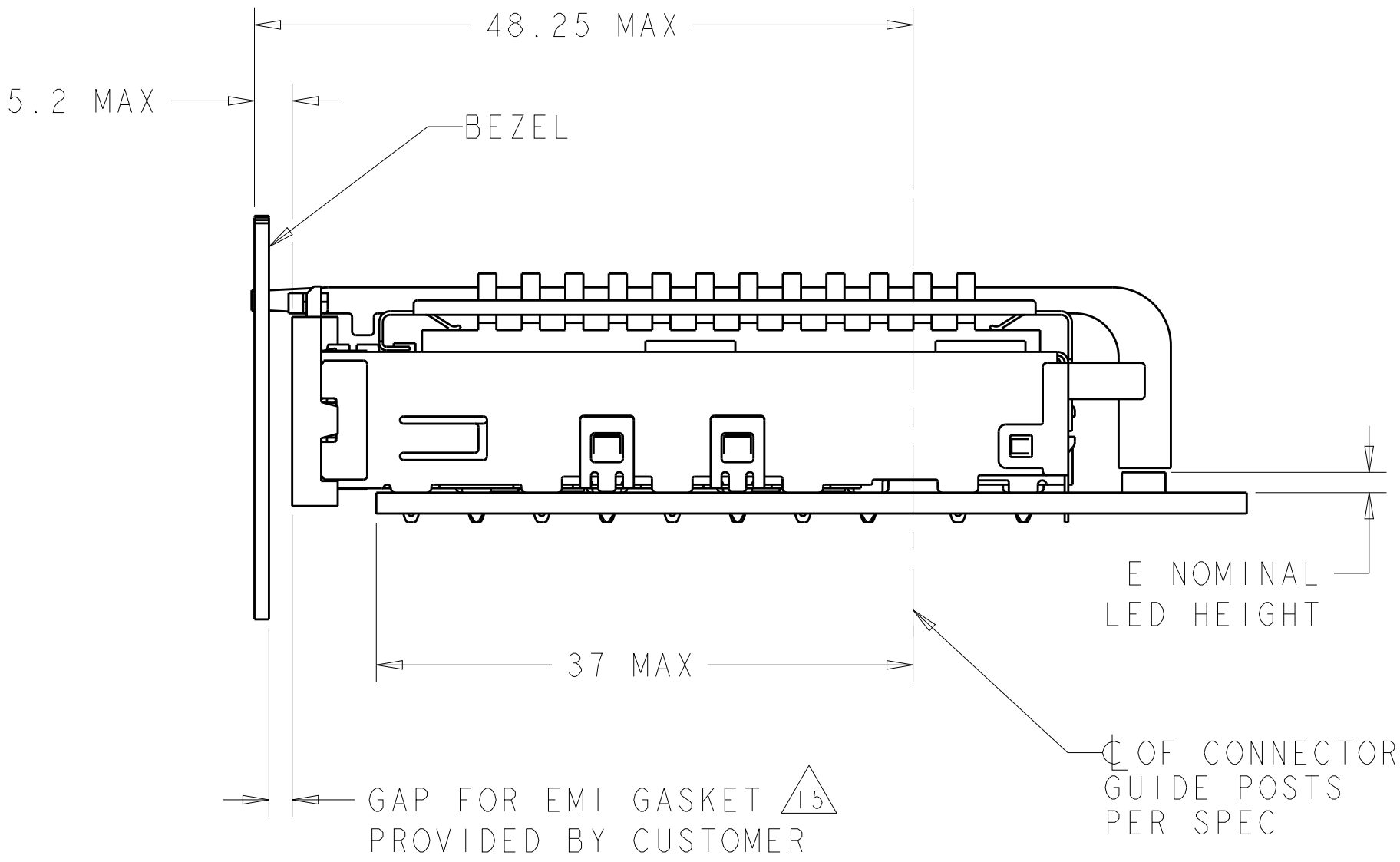
LOC		DIST		REVISIONS			
GP		00		P	LTR	DESCRIPTION	DATE
						SEE SHEET 1	



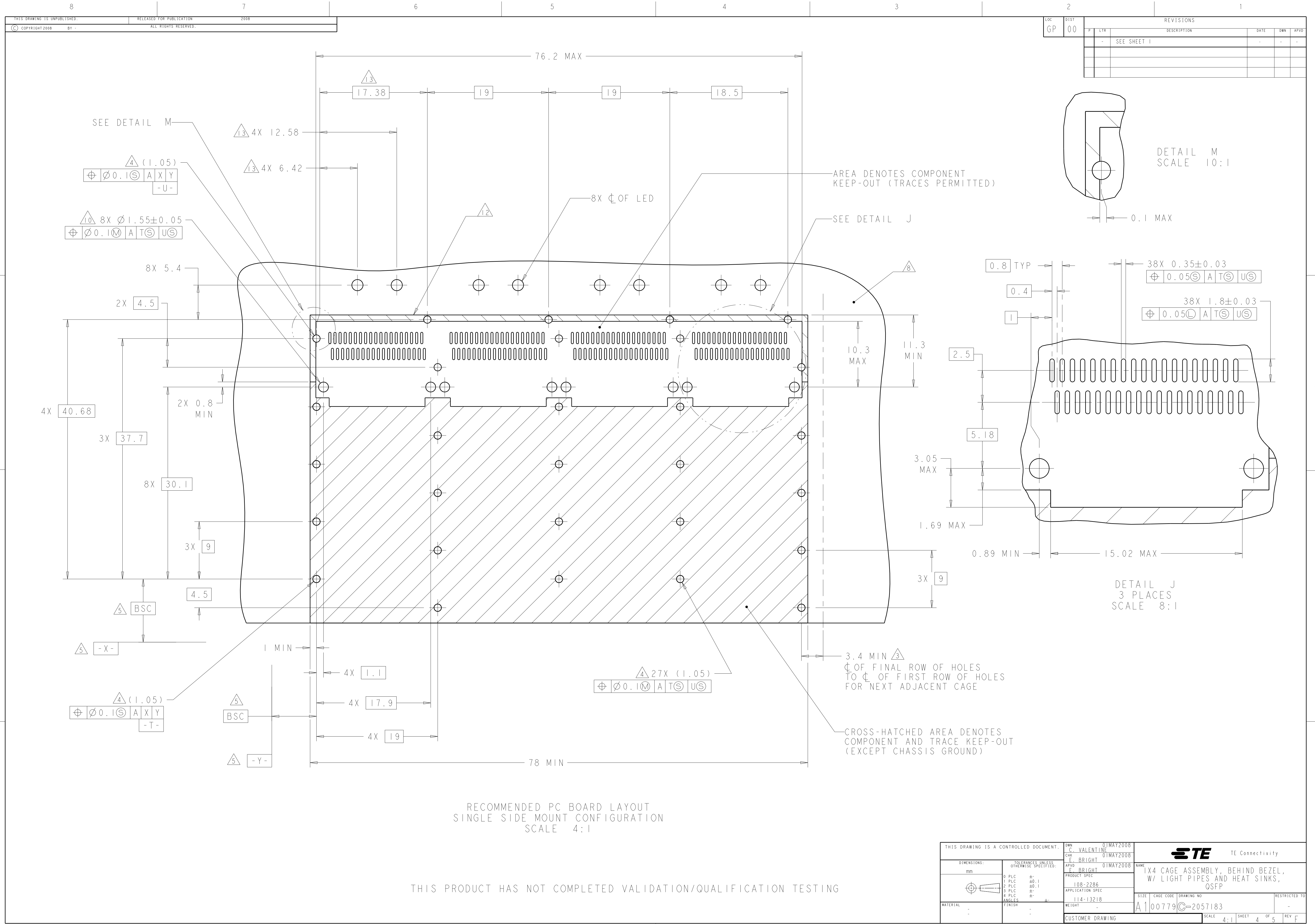
ONE SIDED CONFIGURATION
SCALE 5:2



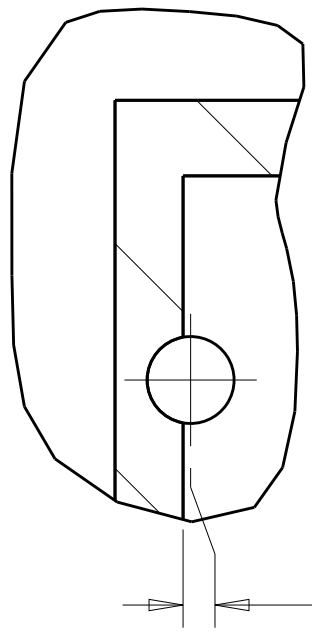
BELLY TO BELLY CONFIGURATION
SIMILAR TO ONE SIDED
EXCEPT WHERE NOTED
SCALE 5:2



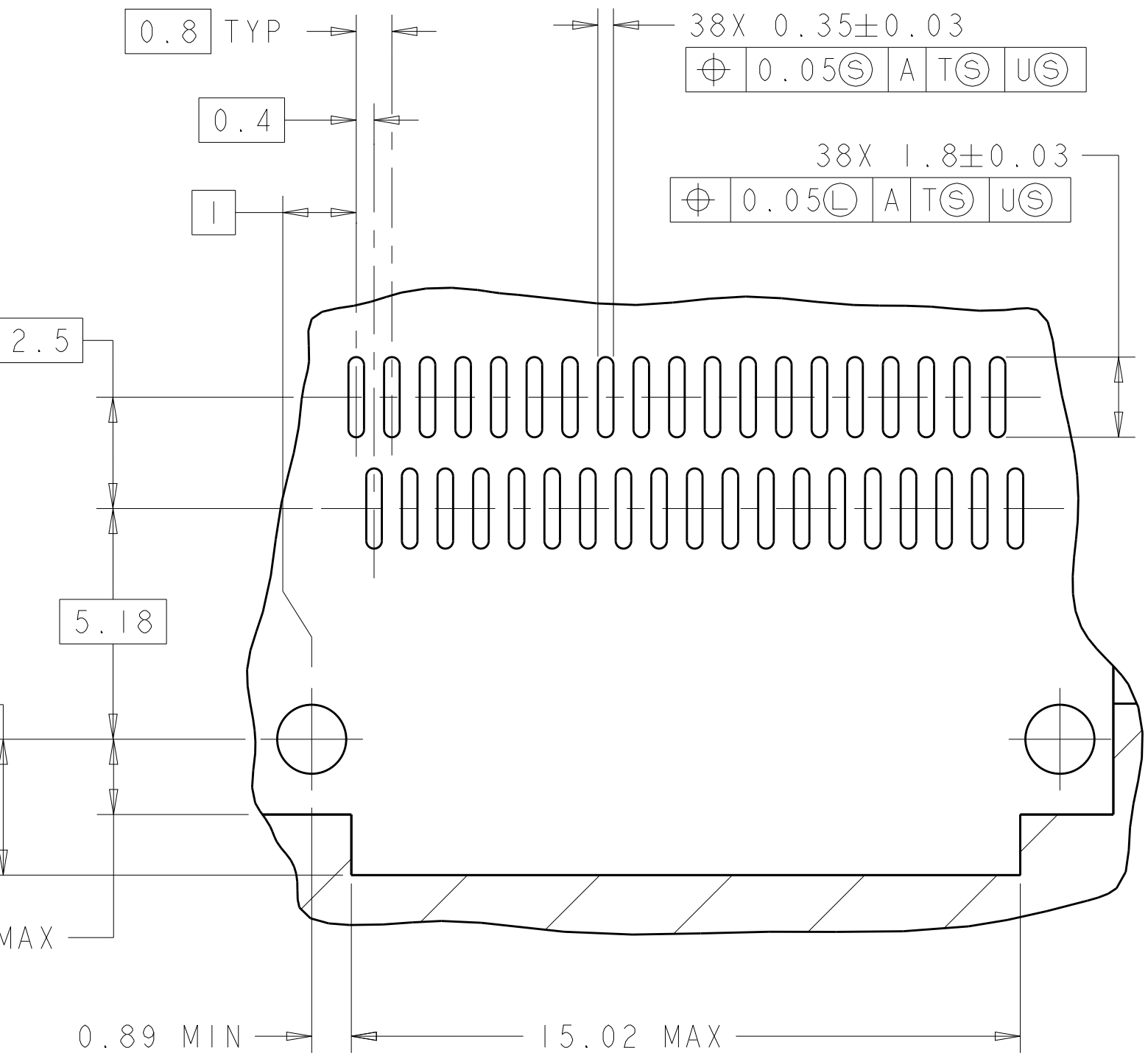
THIS DRAWING IS A CONTROLLED DOCUMENT.		DWN C. VALENTINE CHK E. BRIGHT APVD F. BRIGHT	01MAY2008 01MAY2008 01MAY2008	TE Connectivity	
DIMENSIONS:		TOLERANCES UNLESS OTHERWISE SPECIFIED:		NAME	
mm		0 PLC ±.1 1 PLC ±0.1 2 PLC ±0.1 3 PLC ±.1 4 PLC ±.1 ANGLES ±.1 FINISH		1X4 CAGE ASSEMBLY, BEHIND BEZEL, W/ LIGHT PIPES AND HEAT SINKS, QSFP	
MATERIAL		CUSTOMER DRAWING		SIZE CAGE CODE DRAWING NO	
				A100779C=2057183	
				RESTRICTED TO	
				SCALE 4:1 SHEET 3 OF 5 REV F	



LOC		DIST		REVISONS			
GP	00	P	LTR	DESCRIPTION	DATE	DWN	APVD
				SEE SHEET 1	-	-	-



DETAIL M
SCALE 10:1



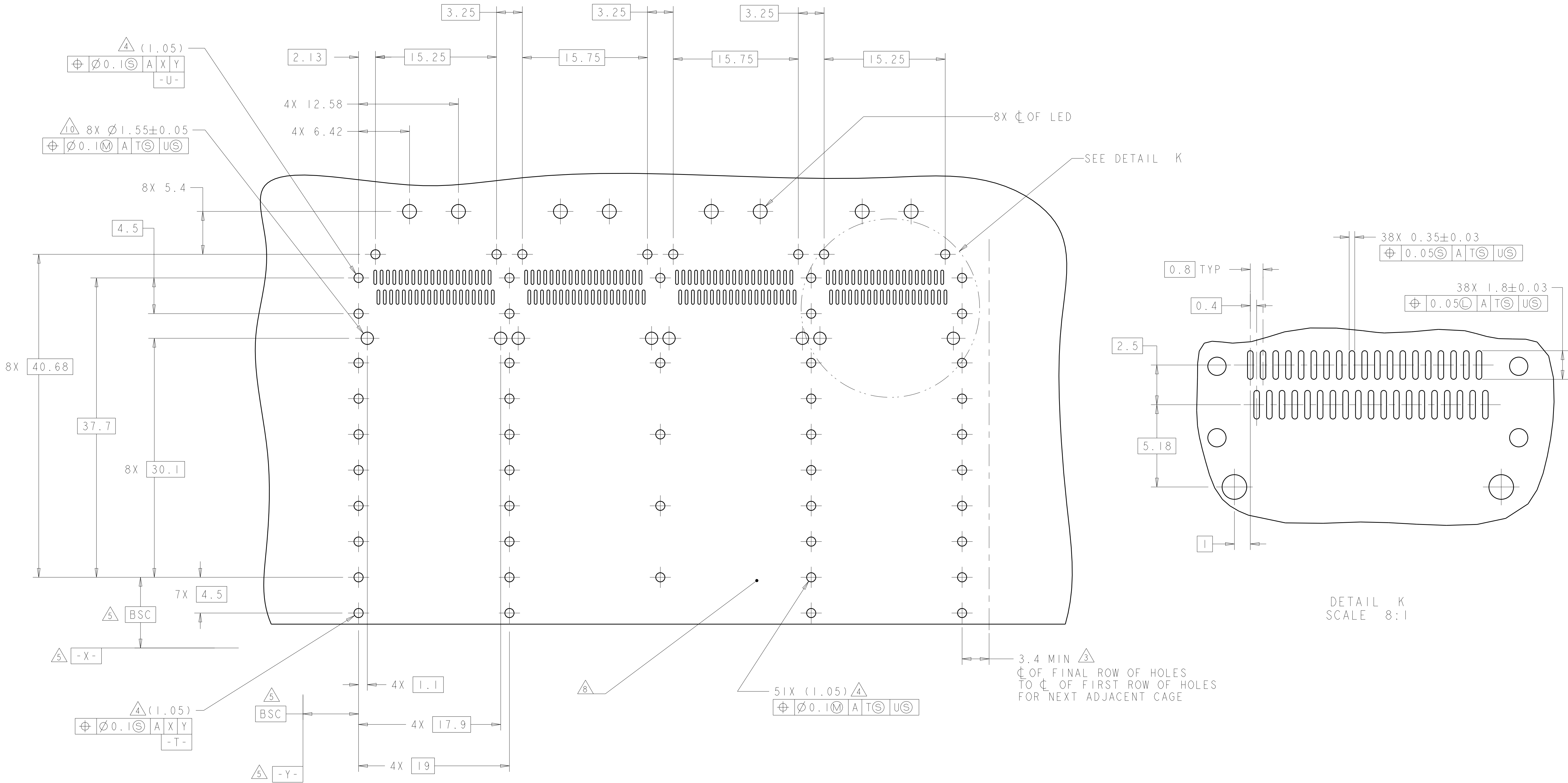
DETAIL J
3 PLACES
SCALE 8:1

RECOMMENDED PC BOARD LAYOUT
SINGLE SIDE MOUNT CONFIGURATION
SCALE 4:1

THIS PRODUCT HAS NOT COMPLETED VALIDATION/QUALIFICATION TESTING

THIS DRAWING IS A CONTROLLED DOCUMENT.		DWN C. VALENTINE CHK E. BRIGHT APVD F. BRIGHT	01MAY2008 01MAY2008 01MAY2008	NAME 1X4 CAGE ASSEMBLY, BEHIND BEZEL, W/ LIGHT PIPES AND HEAT SINKS, QSFP	
DIMENSIONS: mm	TOLERANCES UNLESS OTHERWISE SPECIFIED:	0 PLC 1 PLC 2 PLC 3 PLC 4 PLC ANGLES FINISH	± ±0.1 ±0.1 ± ± ±	PRODUCT SPEC 108-2286 APPLICATION SPEC 114-13218	SIZE CAGE CODE DRAWING NO A100779
MATERIAL				WEIGHT	RESTRICTED TO
CUSTOMER DRAWING				SCALE 4:1	SHEET 4 OF 5 REV F

LOC	DIST	REVISIONS				
		P	LTR	DESCRIPTION	DATE	DWN
GP	00	-	-	SEE SHEET 1	-	-



RECOMMENDED PC BOARD LAYOUT
BELLY TO BELLY CONFIGURATION
SEE SHEET 4 FOR COMPONENT AND TRACE KEEP-OUTS
SCALE 4:1

THIS DRAWING IS A CONTROLLED DOCUMENT.		DWN C. VALENTINE CHK E. BRIGHT APVD F. BRIGHT	01MAY2008 01MAY2008 01MAY2008	TE Connectivity	
DIMENSIONS:	TOLERANCES UNLESS OTHERWISE SPECIFIED:	PRODUCT SPEC	NAME		
mm	0 PLC ±.1 1 PLC ±0.1 2 PLC ±0.1 3 PLC ±. 4 PLC ±. ANGLES FINISH	108-2286 APPLICATION SPEC	1X4 CAGE ASSEMBLY, BEHIND BEZEL, W/ LIGHT PIPES AND HEAT SINKS, QSFP	SIZE	RESTRICTED TO
MATERIAL	-	114-13218 WEIGHT	A100779C=2057183	CAGE CODE	5 OF 5
CUSTOMER DRAWING		SCALE	4:1	SHEET	REV F