

1

2

3

4

5

6

7

8

10091777-X0E-XXLF

8-COLUMN DIFFERENTIAL SIGNAL

LEAD-FREE DESIGNATION ONLY WITH APPLICABLE PLATING CODES

LETTER

PERFORMANCE-BASED PLATING (SEE NOTE 2)

TARGET APPLICATION

LEAD-FREE (LF)

B

TELCORDIA CO

NO

C

TELCORDIA UE

NO

D

TELCORDIA CO

YES

E

TELCORDIA UE

YES

NUMBER

PIN STYLE, HEIGHT

0

STANDARD GUIDE PIN MACHINED, 31.6mm

4

STANDARD GUIDE PIN MACHINED, 25.7mm

MODULE DESCRIPTION

LETTER DESIGNATION REPRESENTED IN DASH NUMBER

BASE MODULE

LEFT POLARIZING GUIDANCE MODULE (SEE SHEET 3)

J

A

B

C

D

E

F

G

H

RIGHT POLARIZING GUIDANCE MODULE (SEE SHEET 4)

Y

P

Q

R

S

T

U

V

W

OPEN MODULE (TWO WALL) (SEE SHEET 2)

O (ZERO)

LEFT WALL MODULE (SEE SHEET 5)

L

RIGHT WALL MODULE (SEE SHEET 6)

M

FOUR WALL MODULE (SEE SHEET 7)

1

TABLE 1: OPTIONAL PCB HOLE SIZE (SEE NOTE 11)

GROUND

UNGROUND

FINISHED

Ø2.35-2.55

Ø2.35-2.55

PAD

Ø5.50

N/A

PLATED

YES

NO

DRILL (mm/in)

2.58 /.1015

2.44 /.096

TABLE 2: OPTIONAL SCREW TYPE (SEE NOTE 10)

SCREW P/N

DESCRIPTION

BOARD THICKNESS

10091790-002LF

#2-56 X .375" PHILLIPS PANHEAD W/SQ CONICAL WASHER

1.60 - 5.00

10091790-003LF

#2-56 X .500" PHILLIPS PANHEAD W/SQ CONICAL WASHER

5.00 - 10.00

spec ref

SEE NOTES

tolerance std

TOLERANCES UNLESS OTHERWISE SPECIFIED

ASME Y14.5

surface

linear

0.X

±0.2

0.XX

±0.10

0.XXX

±0.050

angular

0°

±°

dr

Jim Swain

2009/07/07

eng

Sandar Soe

2014/10/02

chr

-

appr

Chen-Hong Tan

2014/12/10

projection

MM

size

A2

scale

4:1

ecn no

ELX-S-18843-1

rel level

Released

product family

XCode

title

MODULE ASSEMBLY

VERTICAL HEADER, 8-COLUMN, 4-PAIR

cat. no.

SEE P/N TREE

Product - Customer Drw

sheet 1 of 8

FCI

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rev

E

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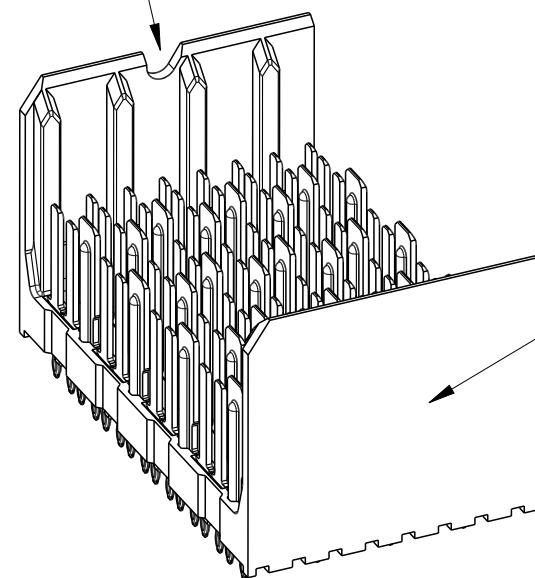
PDS: Rev :E

STATUS:Released

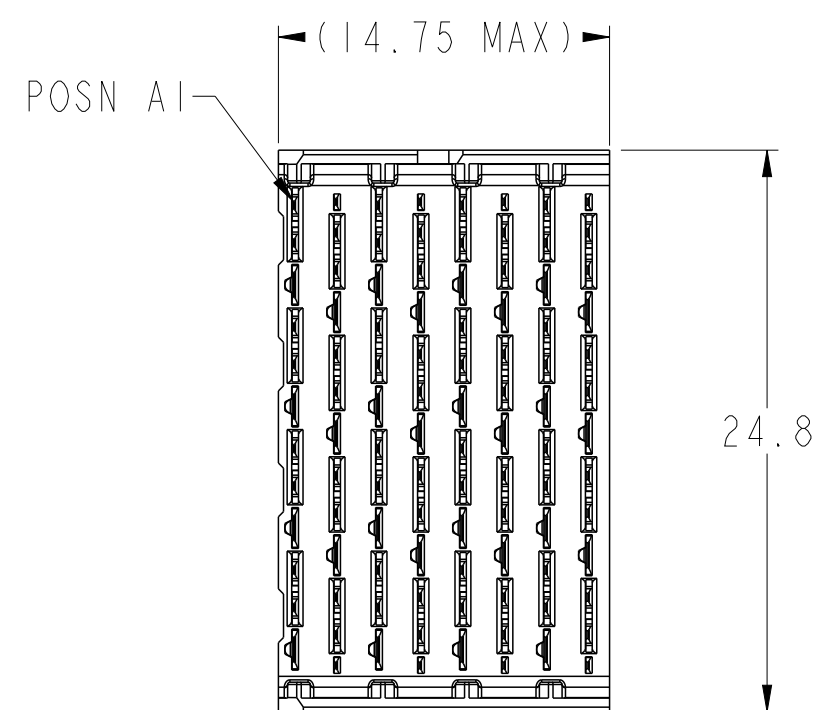
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OPEN (2-WALL) MODULE

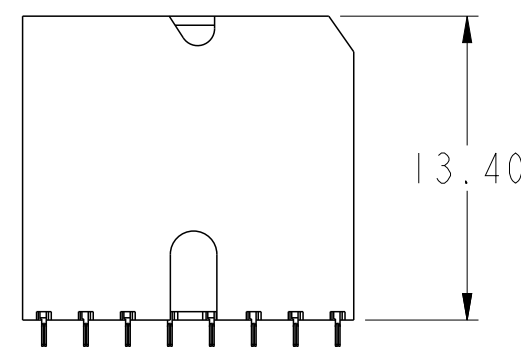
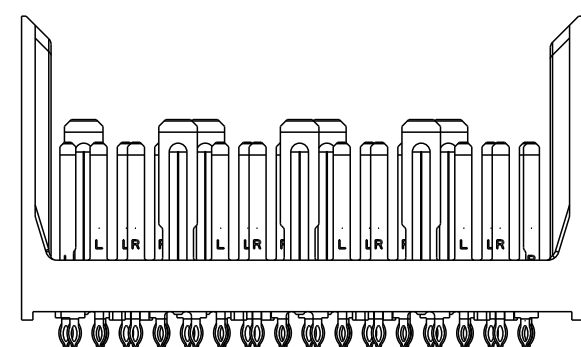
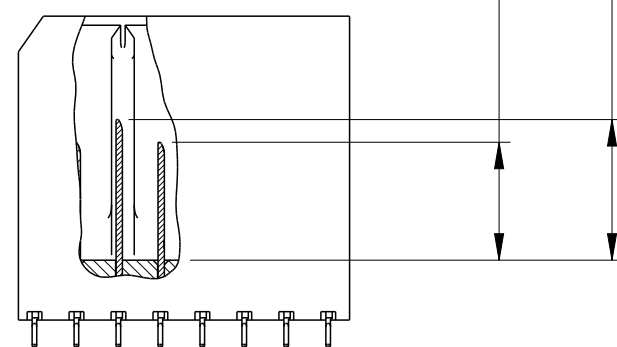
SEE NOTE 8



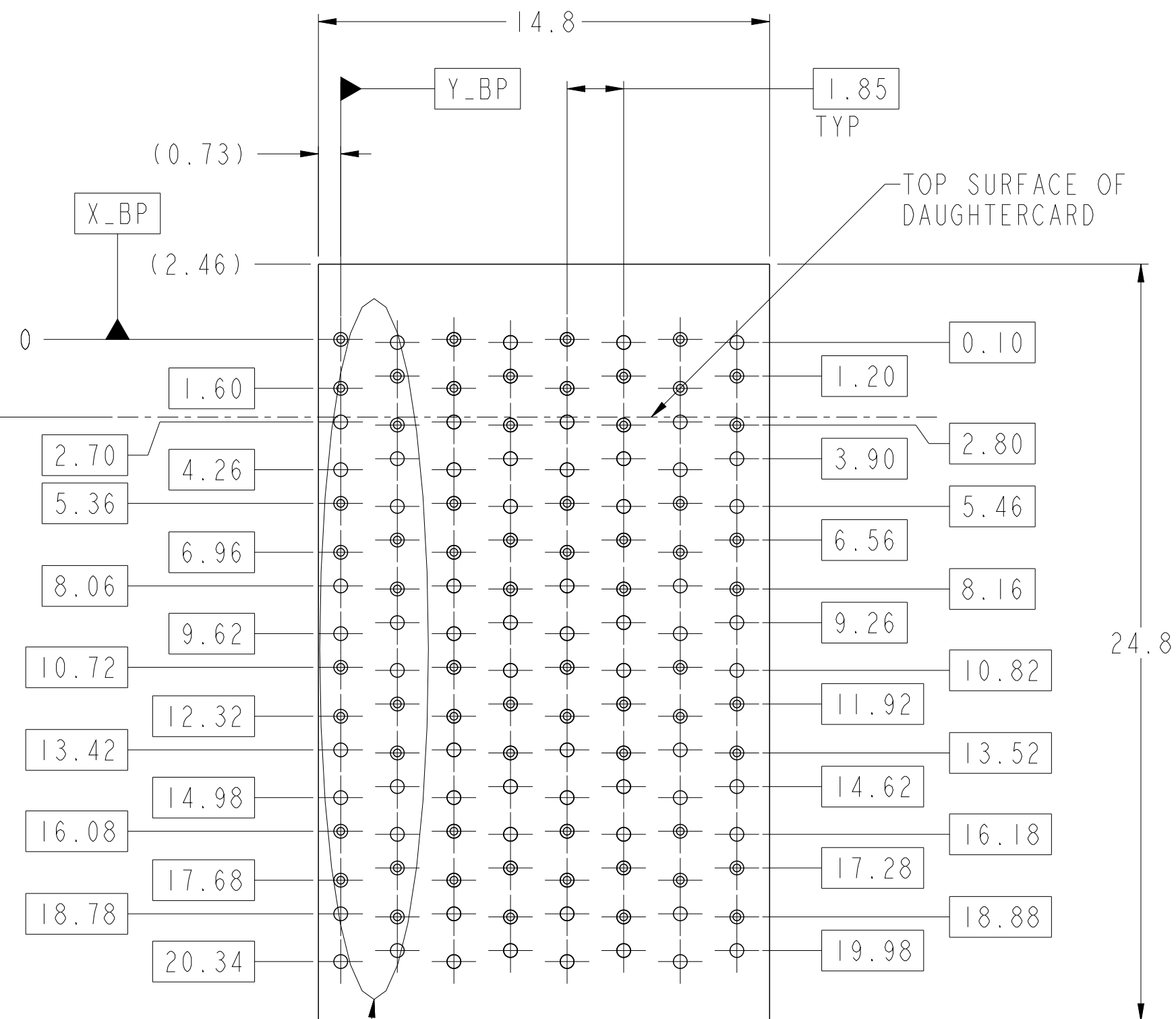
SEE NOTE 5



6.2 (4MM WIPE WIDE GROUNDS)
5.2 (3MM WIPE WIDE GROUNDS)
5.2 (3MM SMALL END GROUNDS)
5.2 (3MM WIPE SIGNALS)
4.2 (2MM WIPE SIGNALS)
SEE P/N TREE



TAIL LENGTH
SEE NOTE 12



SEE DETAIL A
(SHEET 8)

PCB HOLE PATTERN
COMPONENT SIDE
SCALE 6:1

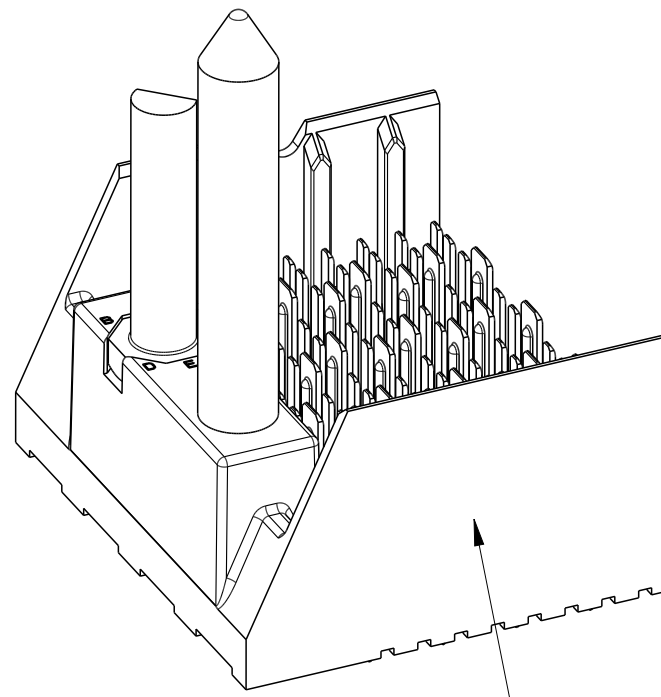
spec ref	SEE NOTES	dr	Jim Swain	2009/07/07	projection	MM	size	A2	scale	4:1
tolerance std	TOLERANCES UNLESS OTHERWISE SPECIFIED	eng	Sandar Soe	2014/10/02	chr	-	ecn no	ELX-S-18843-1	rel level	Released
ASME Y14.5		appr	Chen-Hong Tan	2014/12/10	product family	XCede	rel level	Released	rev	E
surface	linear	0.X	±0.2	0.XX	±0.10	0.XXX	±0.050	angular	0°	±°
ASME Y14.5		www.fci.com	cat. no.	SEE P/N TREE	Product - Customer Drw	sheet 2 of 8	rev	E		

PDS: Rev :E

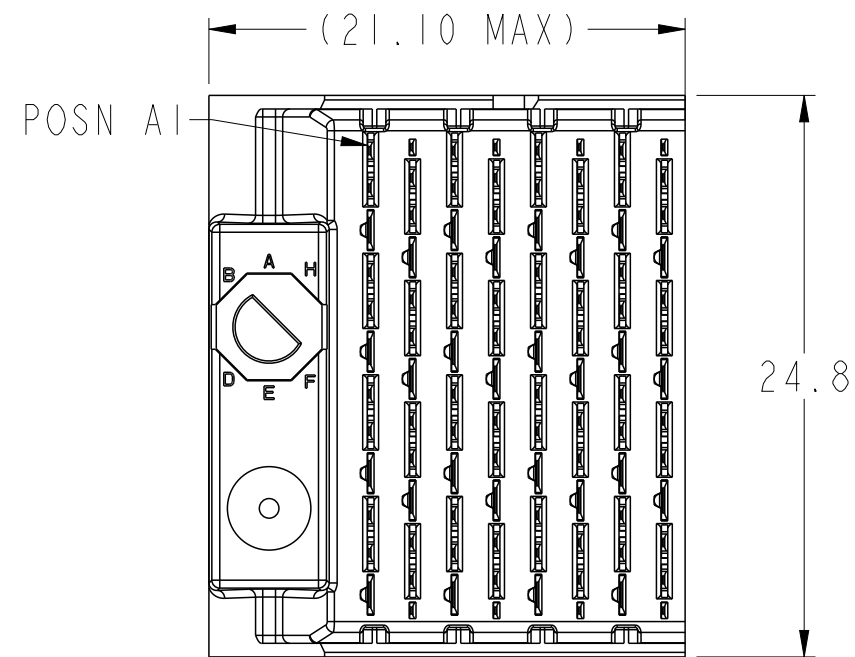
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LEFT POLARIZING/GUIDE MODULE



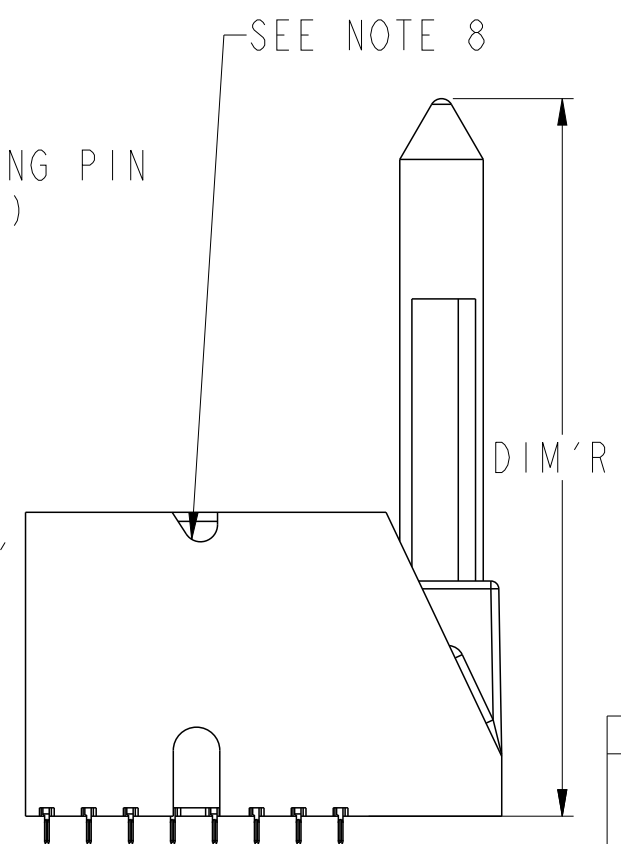
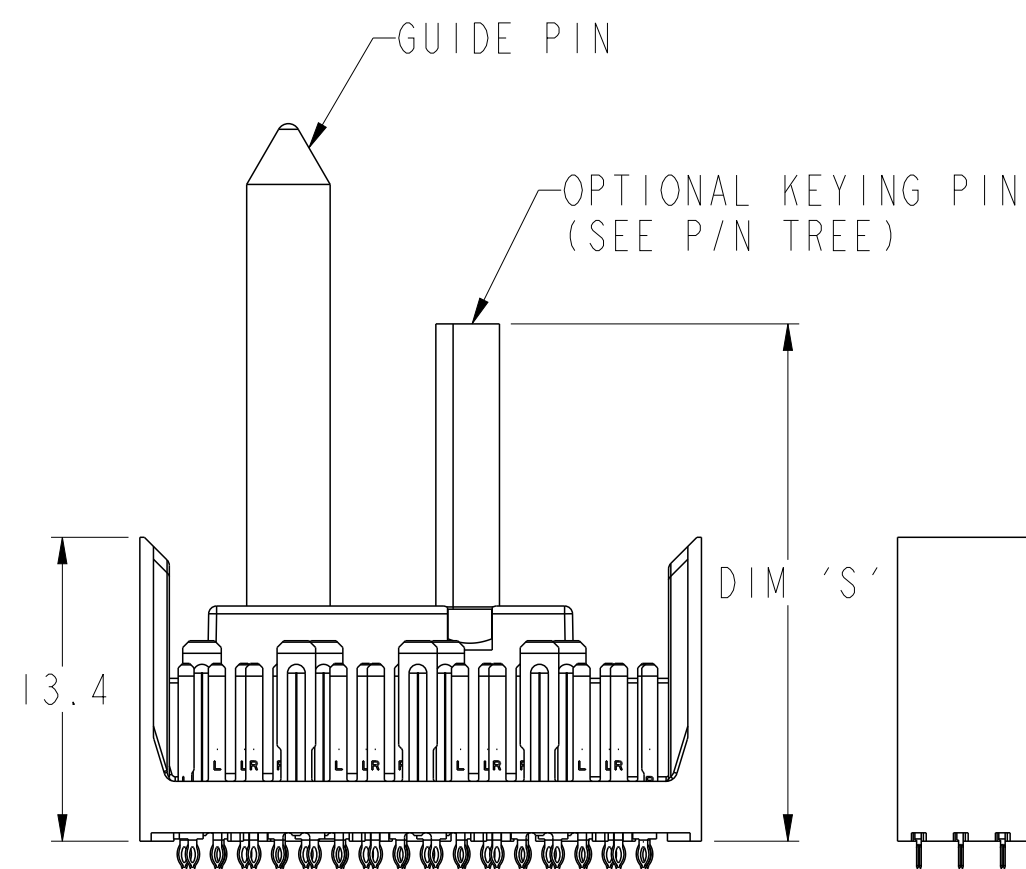
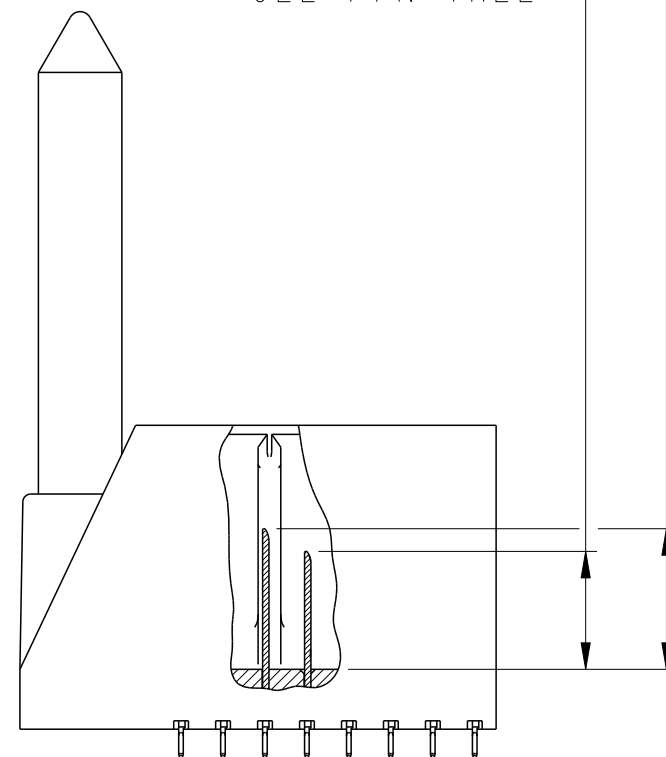
SEE NOTE 5



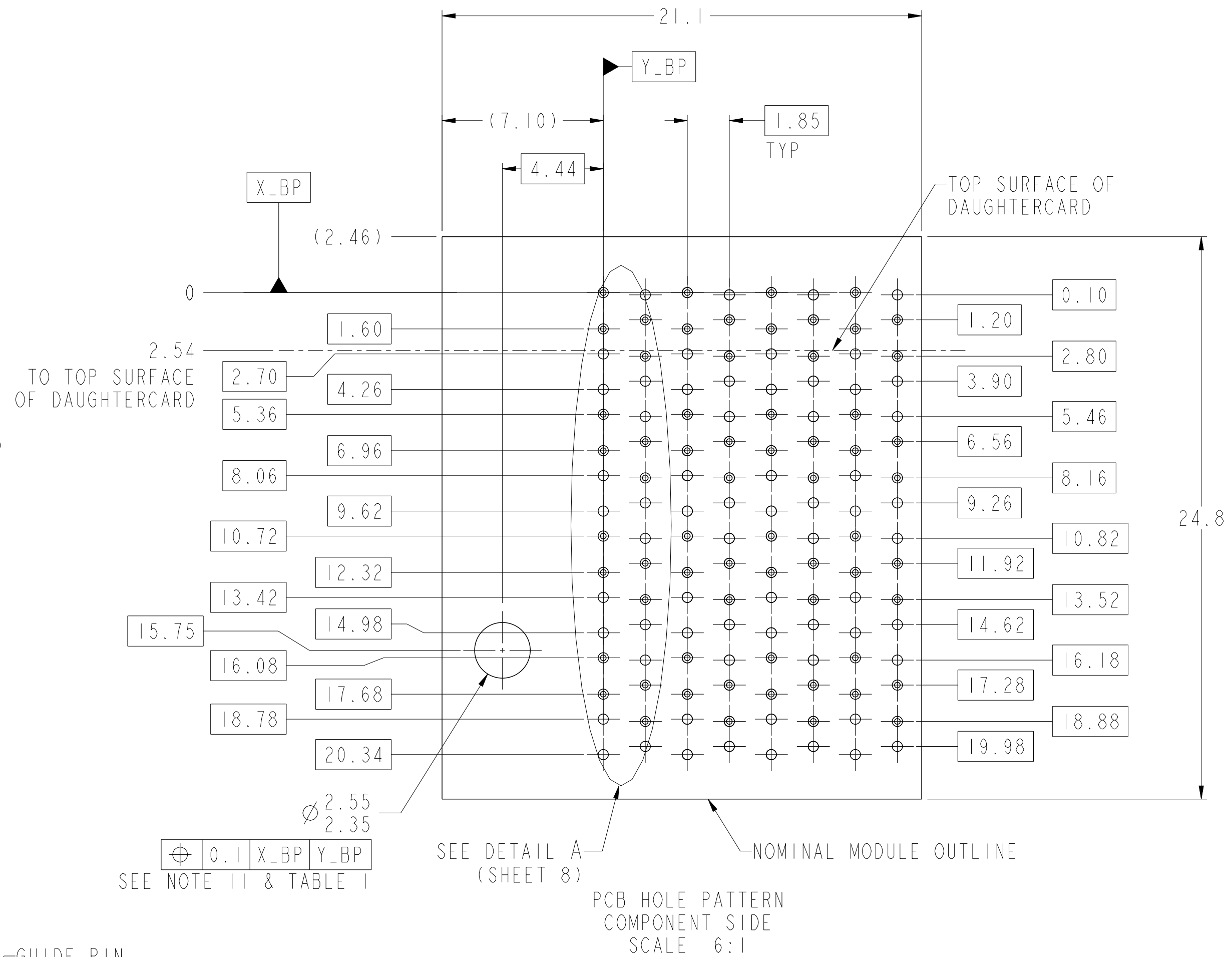
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6.2 (4MM WIPE WIDE GROUNDS)
5.2 (3MM WIPE WIDE GROUNDS)
5.2 (3MM SMALL END GROUNDS)
    5.2 (3MM WIPE SIGNALS)
    4.2 (2MM WIPE SIGNALS)
        SEE P/N TREE

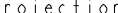
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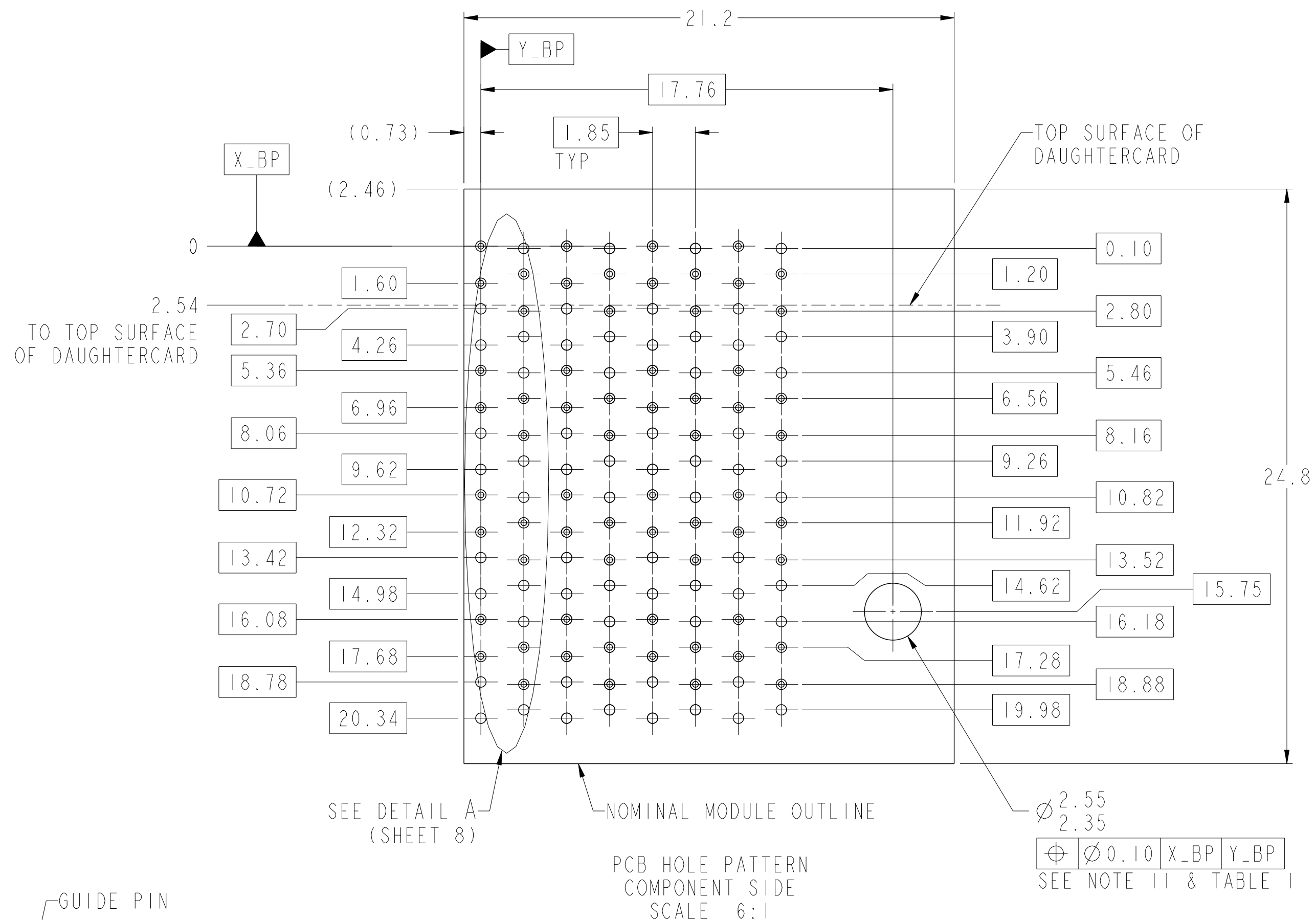
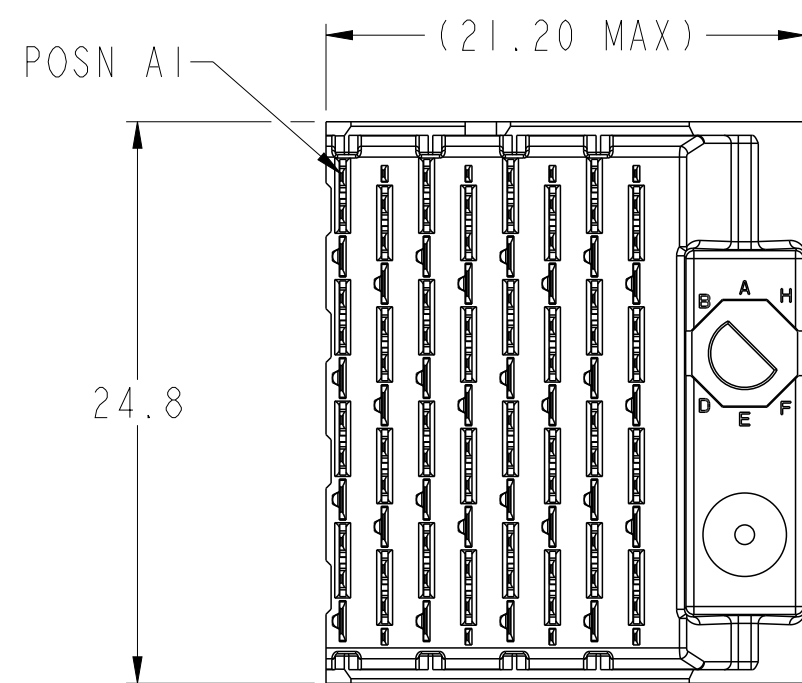
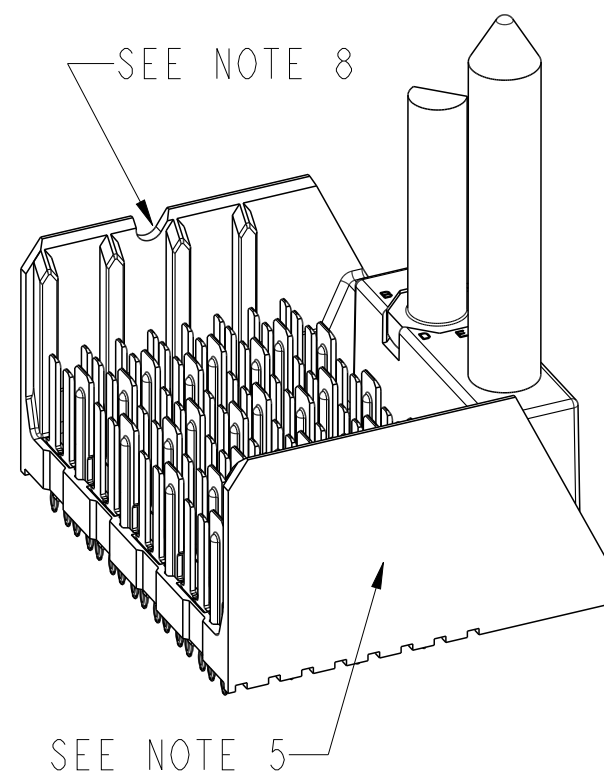
△ TAIL LENGTH
E SEE NOTE 12



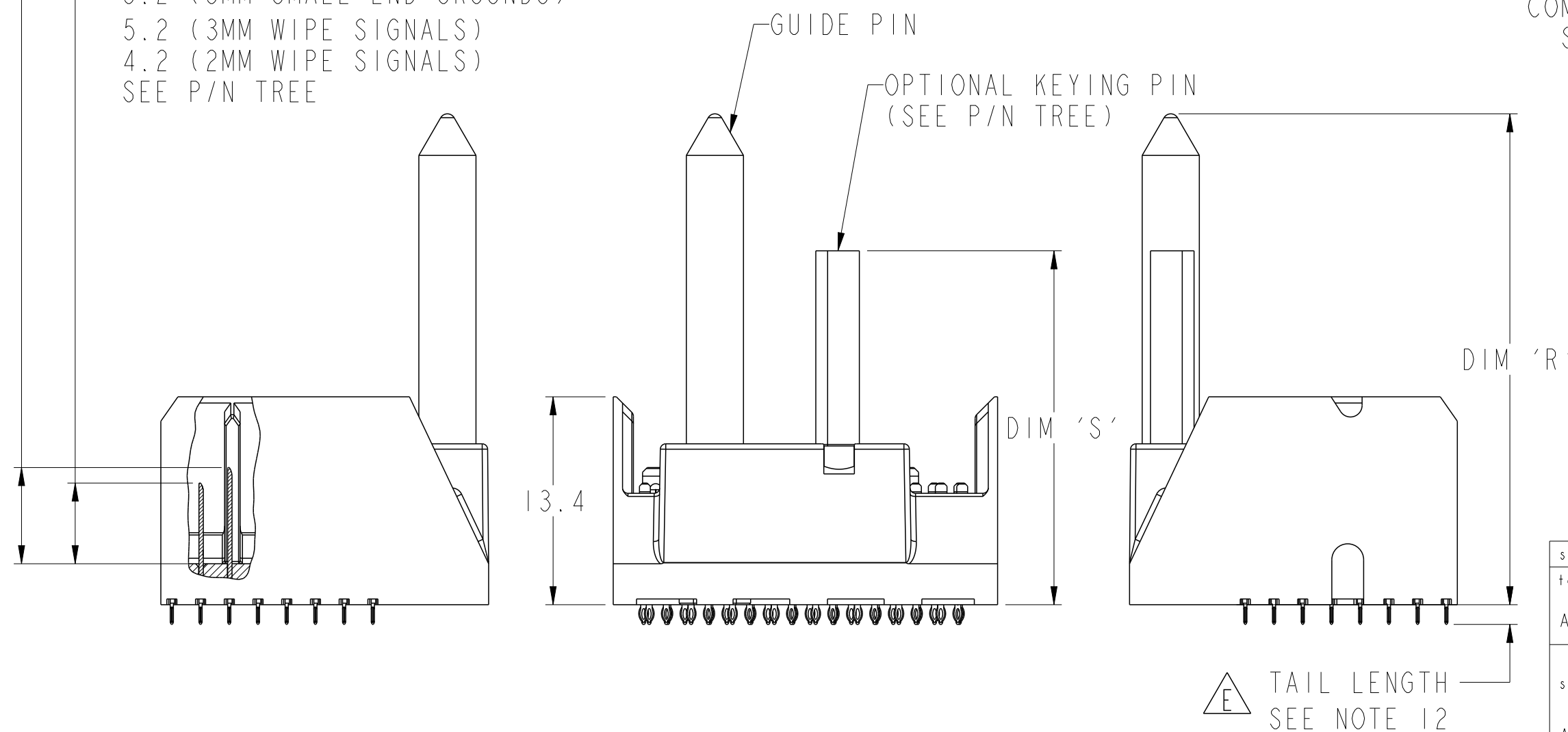
ASSEMBLY BASE CONFIGURATION END DASH NO.	GUIDE PIN	POLARIZING KEY
	DIM 'R'	DIM 'S'
-X0X	31.6mm	22.8mm
-X4X	25.7mm	20.0mm

spec ref		SEE NOTES		dr		Jim Swain		2009/07/07		projection		size		scale			
tolerance std		TOLERANCES UNLESS OTHERWISE SPECIFIED		eng		Sander Soe		2014/01/02				 MM		A2		4:1	
ASME Y14.5				chr		-		-						ecn no		ELX-S-18843-1	
				appr		Chen-Hong Tan		2014/12/10		product family		XCede		rel level		Released	
surface				linear				title		MODULE ASSEMBLY VERTICAL HEADER, 8-COLUMN, 4-PAIR		dwg no		10091777		rev	
				0.X ±0.2													
				0.XX ±0.10													
ASME Y14.5		angular		0° ±		www.fci.com		cat. no.		SEE P/N TREE		Product - Customer Drw		sheet 3 of 8			

RIGHT POLARIZING/GUIDE MODULE



- 6.2 (4MM WIPE WIDE GROUNDS)
- 5.2 (3MM WIPE WIDE GROUNDS)
- 5.2 (3MM SMALL END GROUNDS)
- 5.2 (3MM WIPE SIGNALS)
- 4.2 (2MM WIPE SIGNALS)
- SEE P/N TREE



ASSEMBLY BASE CONFIGURATION END DASH NO.	GUIDE PIN	POLARIZING KEY
	DIM 'R'	DIM 'S'
-X0X	31.6mm	22.8mm
-X4X	25.7mm	20.0mm

spec ref	SEE NOTES	dr	Jim Swain	2009/07/07	projection	MM	size	A2	scale	4:1
tolerance std	TOLERANCES UNLESS OTHERWISE SPECIFIED	eng	Sandar Soe	2014/10/02	chr	-	ecm no	ELX-S-18843-1	rel level	Released
ASME Y14.5		appr	Chen-Hong Tan	2014/12/10	product family	XCede	rel level	Released	rev	E
surface	linear	0.X	±0.2	0.XX	±0.10	0.XXX	±0.050	angular	0°	±°
ASME Y14.5		www.fci.com	cat. no.	SEE P/N TREE	Product - Customer Drw	sheet 4 of 8	dwg no	10091777	rev	E

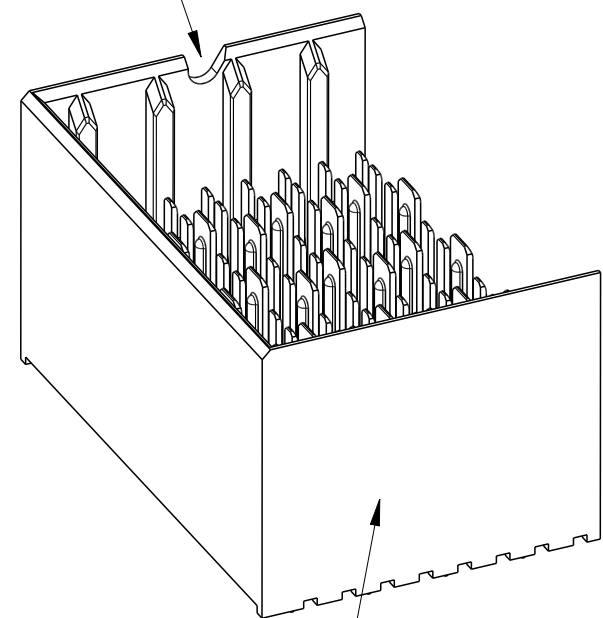
PDS: Rev :E

STATUS:Released

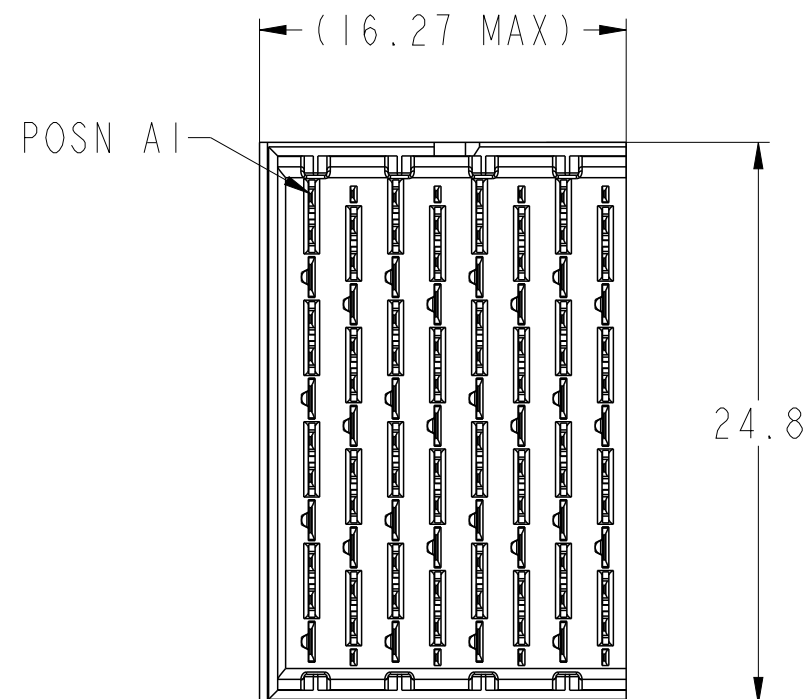
Printed: Dec 10, 2014

LEFT WALL MODULE

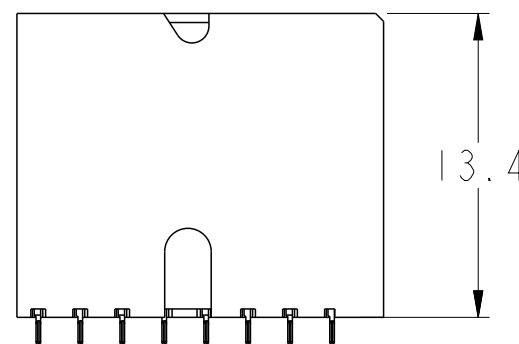
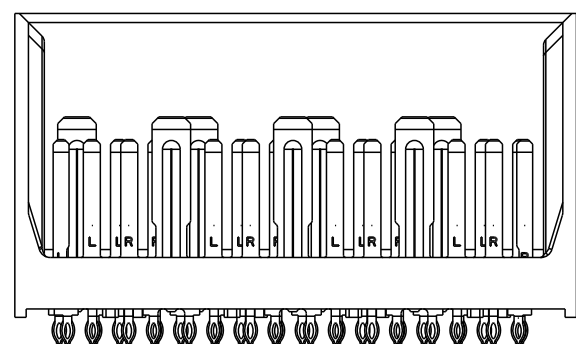
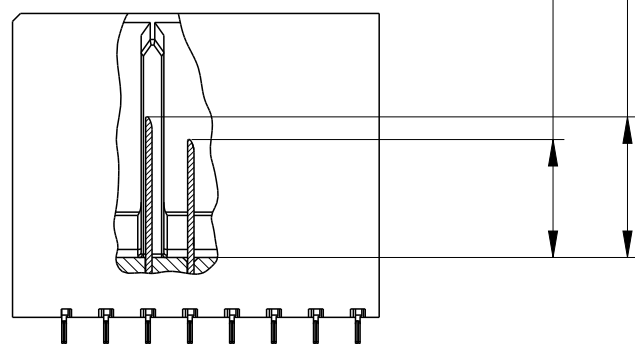
SEE NOTE 8



SEE NOTE 5

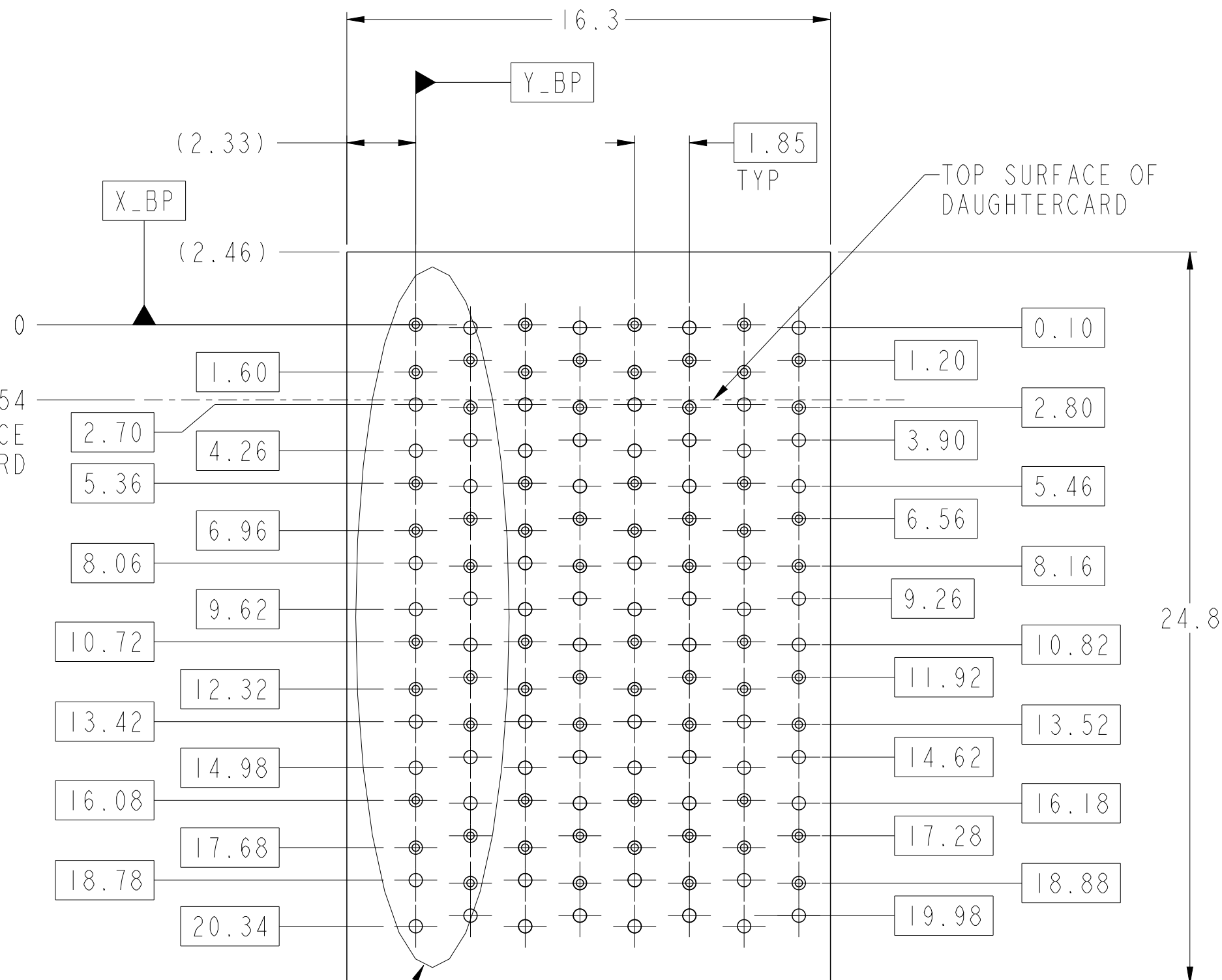


- 6.2 (4MM WIPE WIDE GROUNDS)
- 5.2 (3MM WIPE WIDE GROUNDS)
- 5.2 (3MM SMALL END GROUNDS)
- 5.2 (3MM WIPE SIGNALS)
- 4.2 (2MM WIPE SIGNALS)
- SEE P/N TREE



TAIL LENGTH
SEE NOTE 12

2.54
TO TOP SURFACE
OF DAUGHTERCARD



SEE DETAIL A
(SHEET 8)

PCB HOLE PATTERN
COMPONENT SIDE
SCALE 6:1

spec ref	SEE NOTES	dr	Jim Swain	2009/07/07	projection	MM	size	A2	scale	4:1
tolerance std	ASME Y14.5	eng	Sandar Soe	2014/10/02	chr	-	ecn no	ELX-S-18843-1	rel level	Released
surface	✓	appr	Chen-Hong Tan	2014/12/10	product family	XCede	dwg no	10091777	rev	E
linear	0.X ±0.2 0.XX ±0.10 0.XXX ±0.050	title	MODULE ASSEMBLY	cat. no.	SEE P/N TREE	Product - Customer Drw	sheet 5 of 8			
angular	0° ±°									

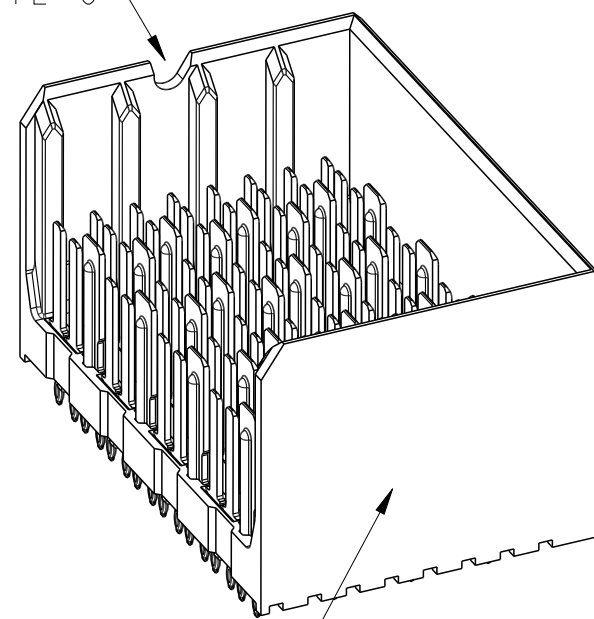
PDS: Rev :E

STATUS:Released

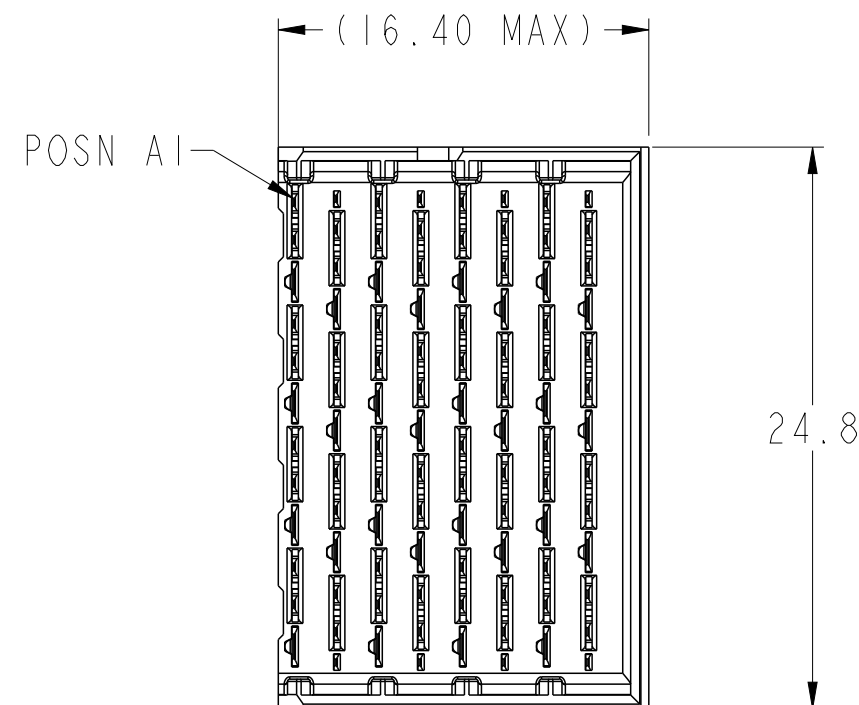
Printed: Dec 10, 2014

RIGHT WALL MODULE

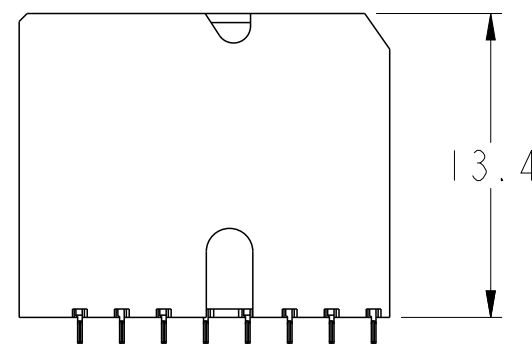
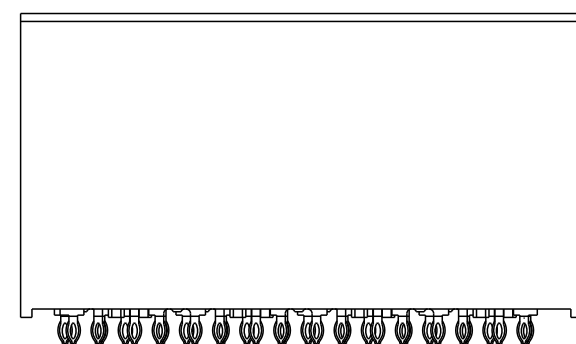
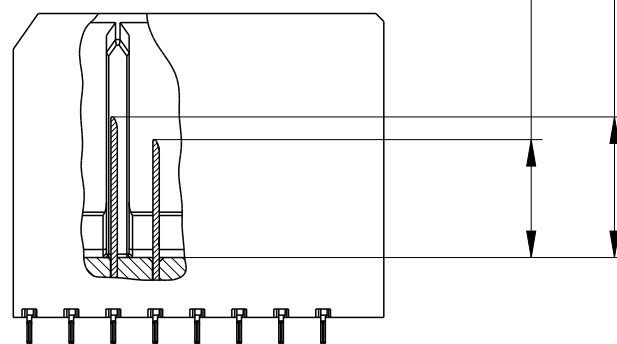
SEE NOTE 8



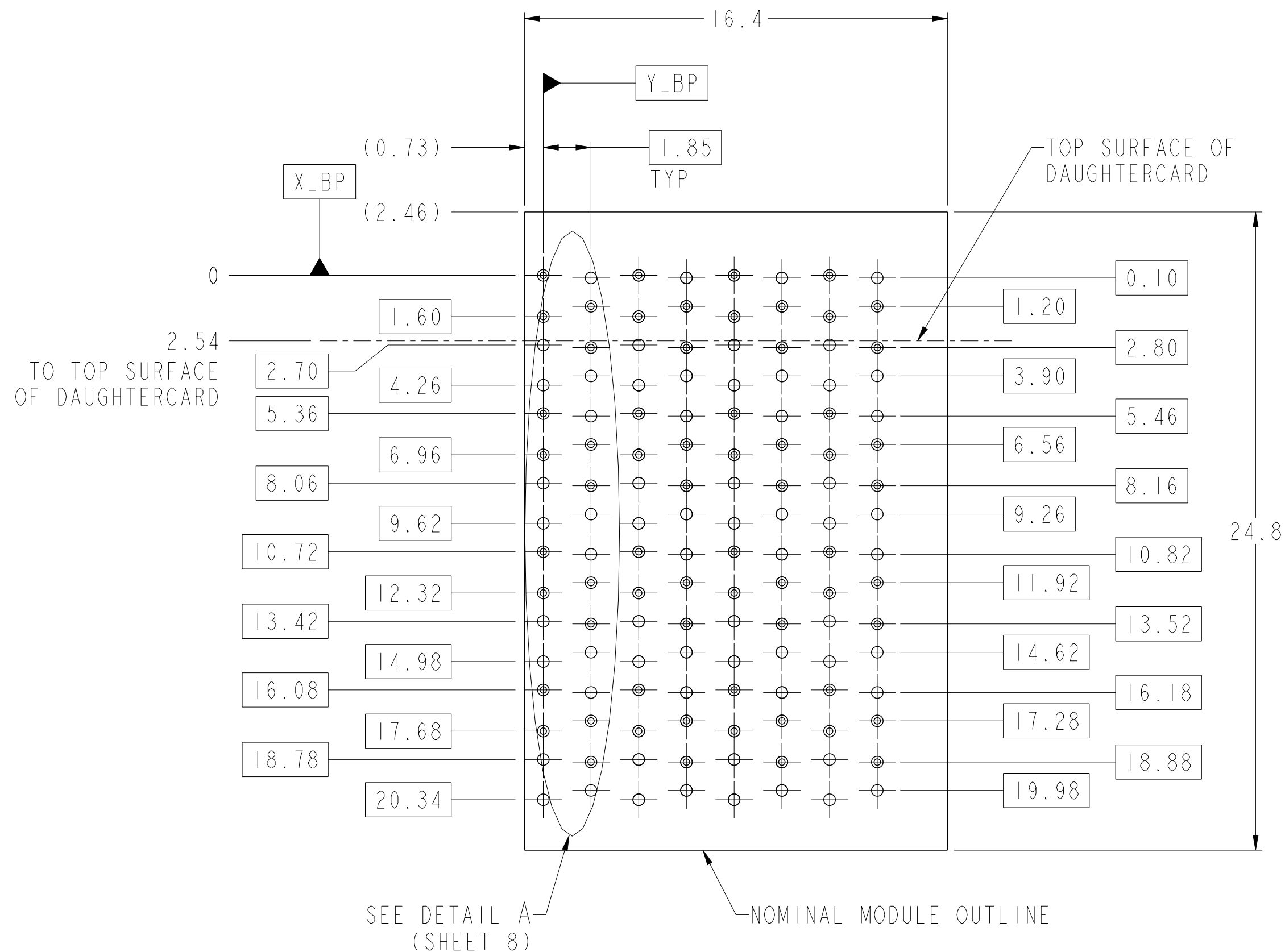
SEE NOTE 5



6.2 (4MM WIPE WIDE GROUNDS)
5.2 (3MM WIPE WIDE GROUNDS)
5.2 (3MM SMALL END GROUNDS)
5.2 (3MM WIPE SIGNALS)
4.2 (2MM WIPE SIGNALS)
SEE P/N TREE



TAIL LENGTH
SEE NOTE 12



PCB HOLE PATTERN
COMPONENT SIDE
SCALE 6:1

spec ref	SEE NOTES	dr	Jim Swain	2009/07/07	projection	MM	size	A2	scale	4:1
tolerance std	TOLERANCES UNLESS OTHERWISE SPECIFIED	eng	Sandar Soe	2014/10/02	chr	-	ecm no	ELX-S-18843-1	rel level	Released
ASME Y14.5		appr	Chen-Hong Tan	2014/12/10	product family	XCede	rel level	Released	rev	E
surface	linear	0.X	±0.2	0.XX	±0.10	0.XXX	±0.050	angular	0°	±°
ASME Y14.5		www.fci.com	cat. no.	SEE P/N TREE	Product - Customer Drw	sheet 6 of 8	rev	E		

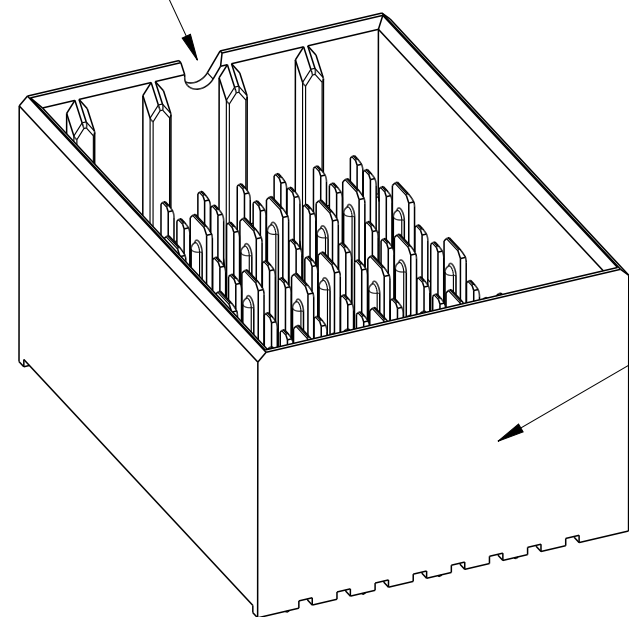
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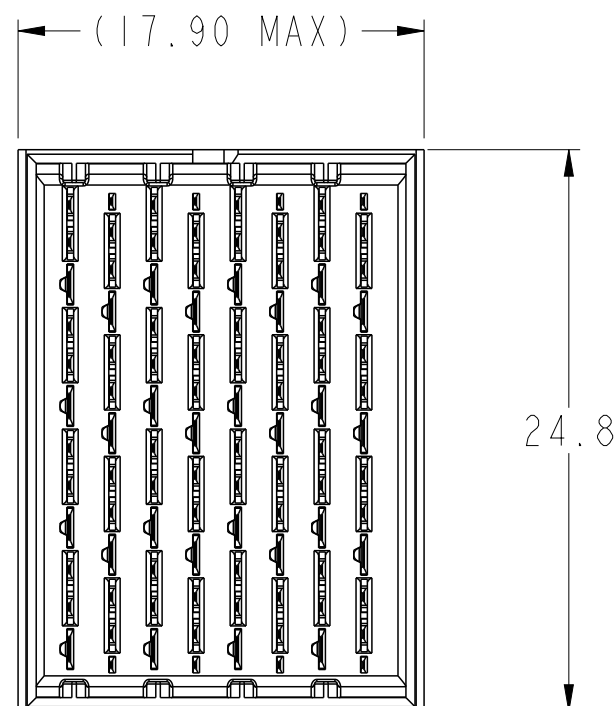
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FOUR WALL MODULE

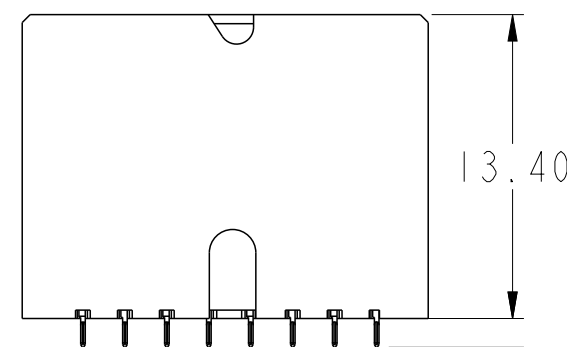
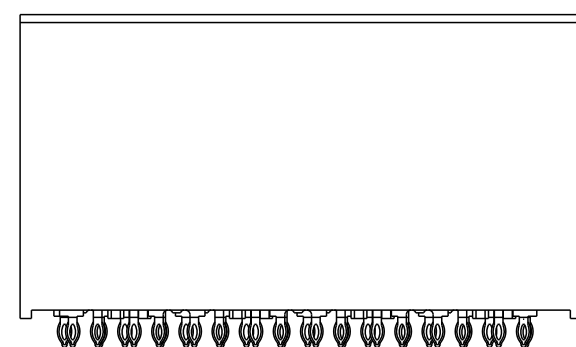
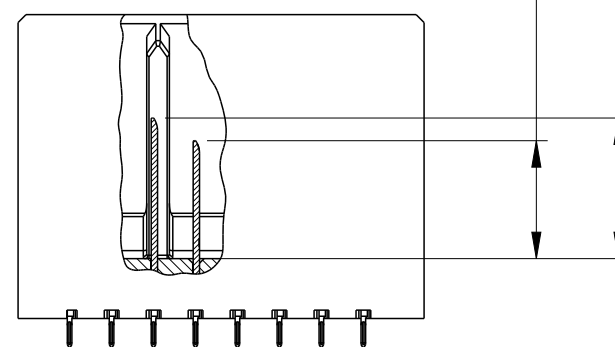
SEE NOTE 8



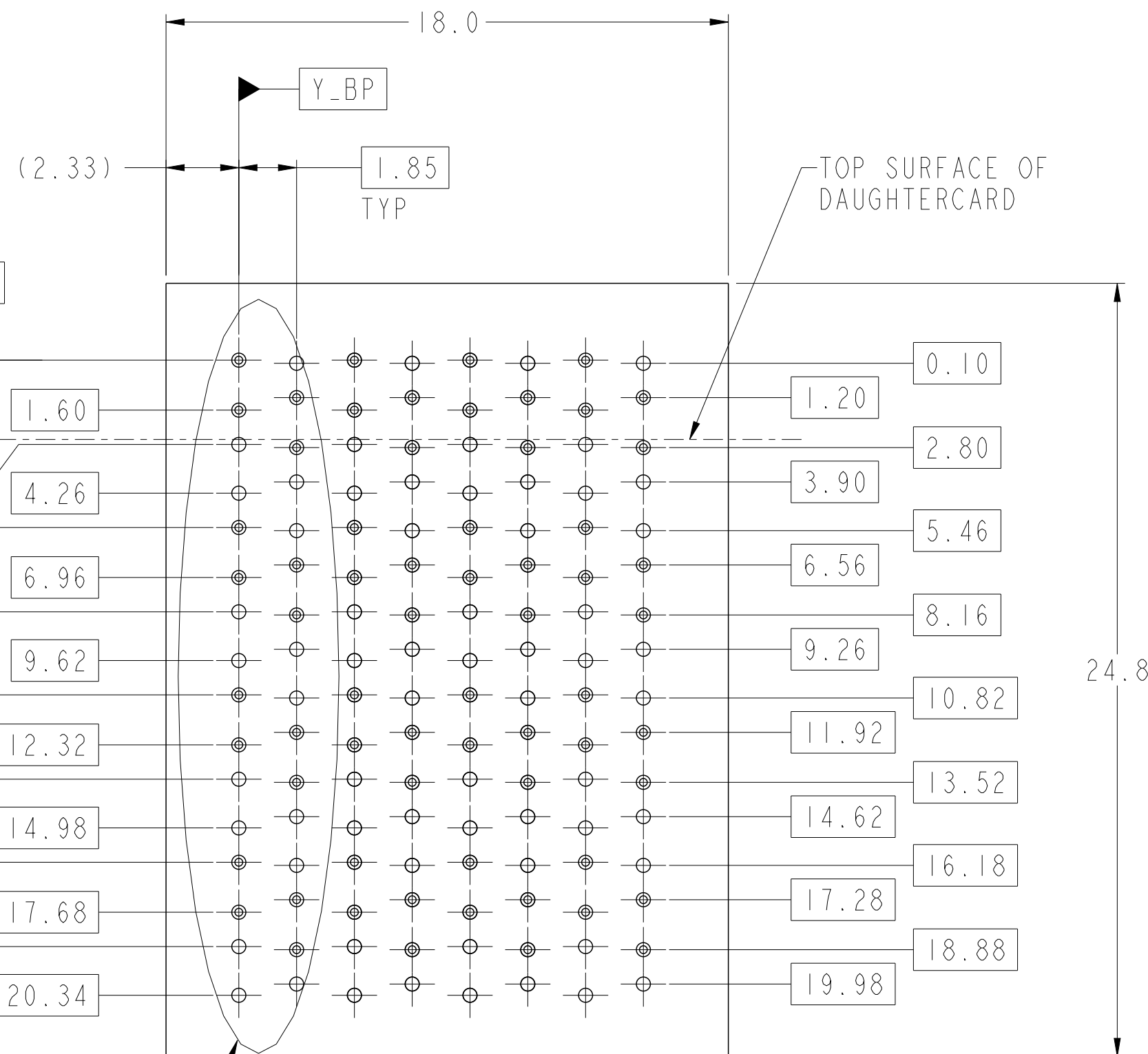
SEE NOTE 5



6.2 (4MM WIPE WIDE GROUNDS)
5.2 (3MM WIPE WIDE GROUNDS)
5.2 (3MM SMALL END GROUNDS)
5.2 (3MM WIPE SIGNALS)
4.2 (2MM WIPE SIGNALS)
SEE P/N TREE



TAIL LENGTH
SEE NOTE 12



SEE DETAIL A (SHEET 8)
NOMINAL MODULE OUTLINE

PCB HOLE PATTERN
COMPONENT SIDE
SCALE 6:1

spec ref	SEE NOTES	dr	Jim Swain	2009/07/07	projection	MM	size	A2	scale	3:1
tolerance std	TOLERANCES UNLESS OTHERWISE SPECIFIED	eng	Sandar Soe	2014/10/02	chr	-	ecn no	ELX-S-18843-1	rel level	Released
ASME Y14.5		appr	Chen-Hong Tan	2014/12/10	product family	XCede	rel level	Released	rev	E
surface	linear	0.X	±0.2	0.XX	±0.10	0.XXX	±0.050	angular	0°	±°
ASME Y14.5		www.fci.com	cat. no.	SEE P/N TREE	Product - Customer Drw	sheet 7 of 8	rev	E		

PDS: Rev :E

STATUS:Released

Printed: Dec 10, 2014

NOTES:

- I. CONNECTOR MATERIALS
SHROUD: HIGH-TEMP THERMOPLASTIC, GRAY, UL94V-0
CONTACTS: HIGH PERFORMANCE COPPER ALLOY

- (2.) CONTACT PLATING:

SEPARABLE INTERFACE: PERFORMANCE-BASED PLATING, QUALIFIED TO MEET THE REQUIREMENTS OF FCI PRODUCT SPECIFICATION GS-12-588, INCLUDING THE TELCORDIA GR-1217-CORE (NOVEMBER 1995) CENTRAL OFFICE (CO) OR UNCONTROLLED ENVIRONMENT (UE) TEST SEQUENCE AS NOTED IN P/N TREE.

PRESS-FIT TAILS: TIN OVER NICKEL (LF), OR TIN-LEAD ALLOY OVER NICKEL (NON-LF). SEE P/N TREE.

3. PRODUCT SPECIFICATION: GS-12-588

4. APPLICATION SPECIFICATION: GS-20-121

- (5.) PRODUCT MARKING (PART NUMBER AND LOT CODE) ON THESE SURFACES.

6. HOUSING MUST WITHSTAND EXPOSURE TO 260°C PEAK TEMPERATURE FOR 40 SECONDS IN A CONVECTION, INFRA-RED, OR VAPOR-PHASE REFLOW OVEN.

7. PACKAGING MEETS GS-14-920 LEAD-FREE LABELING SPECIFICATION.

- (8.) NOTCH INDICATES "ROW A" SIDE OF CONNECTOR.

9. SEE APPLICATION SPECIFICATION FOR ROUTING GUIDELINES, ADDITIONAL PTH GUIDELINES, MATED DIMENSIONS, GUIDE PN SELECTION, ETC.

10. SCREW IS OPTIONAL AND ENGAGES WITH BOTTOM OF GUIDE-PIN FROM BENEATH THE PCB FOR ADDITIONAL GUIDE-PIN SUPPORT.

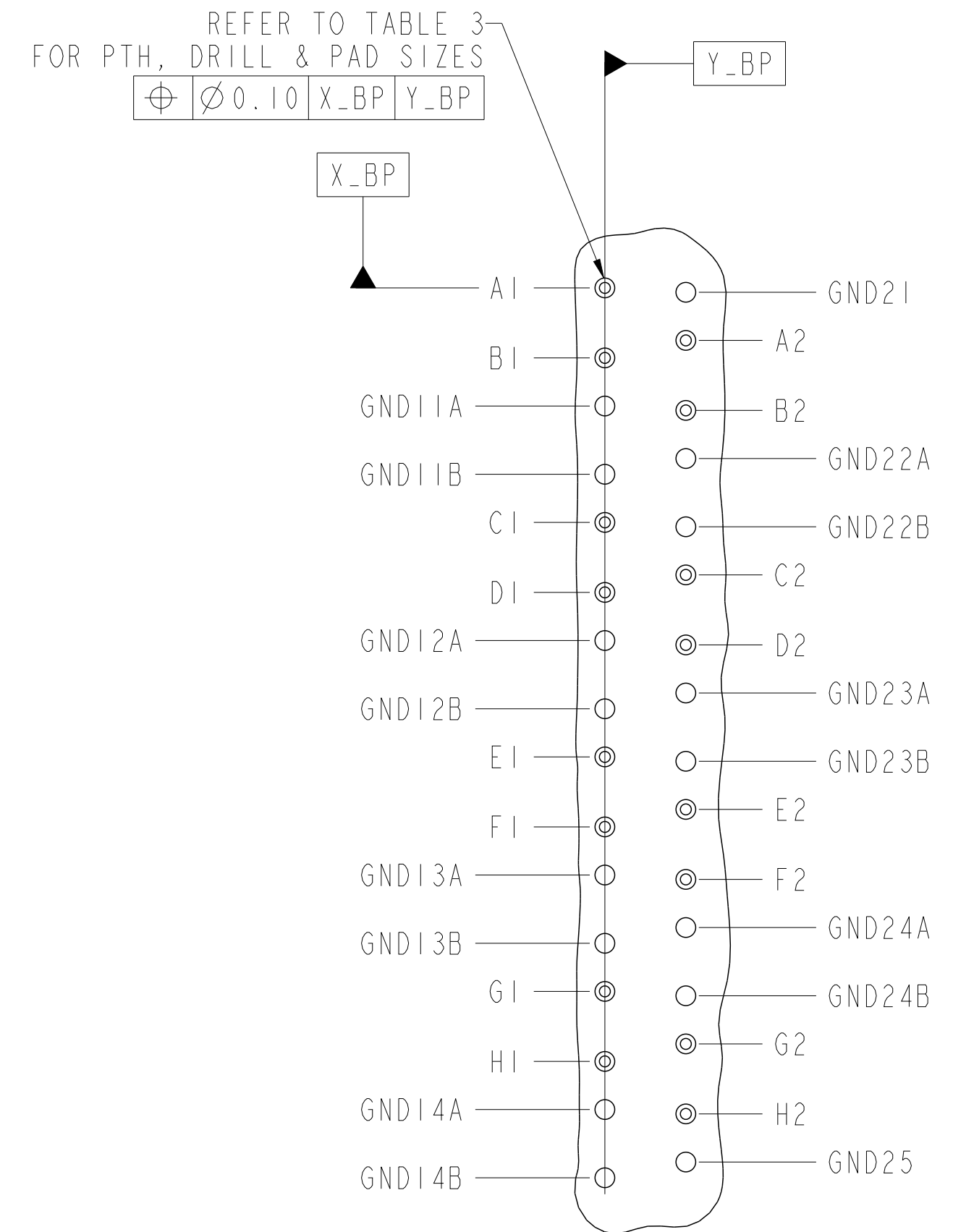
11. OPTIONAL HOLE LOCATION FOR GROUNDED PIN OR ADDITIONAL GUIDE-PIN SUPPORT.
SEE TABLE 1 ON SHEET 1 FOR ADDITIONAL DETAILS.

- 

 TAIL LENGTH=1.3mm FOR $\varnothing 0.55[0.0217"]$ COMPLIANT PIN DRILL
 TAIL LENGTH=1.5mm FOR $\varnothing 0.45[0.0177"]$ COMPLIANT PIN DRILL

13. A  SYMBOL WILL BE NEXT TO ANY DIMENSION, VIEW OR NOTE THAT HAS BEEN MODIFIED WITH THE CURRENT DRAWING REVISION.

TABLE 3: PTH AND PAD SIZES WITH REFERENCE TO COMPLIANT PIN DRILL		
COMPLIANT PIN DRILL	PTH	PAD
$\varnothing 0.55$ [0.0217"]	$\varnothing 0.45 \pm 0.05$	$\varnothing 0.85$
$\varnothing 0.45$ [0.0177"]	$\varnothing 0.36 \pm 0.05$	$\varnothing 0.75$



DETAIL A
SCALE 8:1