

MOLEX P/N	AWG	IMPEDANCE (OHM)	LENGTH (mm)	TOLERANCE (+-mm)	DESCRIPTION	PINOUT
1002220100	30	85	152	10	CTRL TO BP	1
1002220101	30	85	300	10	CTRL TO BP	1
1002220102	30	85	500	10	CTRL TO BP	1
1002220103	30	85	600	10	CTRL TO BP	1
1002220104	30	85	1000	15	CTRL TO BP	1
1002220200	30	85	152	10	CTRL TO CTRL	2
1002220201	30	85	300	10	CTRL TO CTRL	2
1002220202	30	85	500	10	CTRL TO CTRL	2
1002220203	30	85	600	10	CTRL TO CTRL	2
1002220204	30	85	1000	15	CTRL TO CTRL	2
1002220300	30	85	152	10	PCIE	3
1002220301	30	85	300	10	PCIE	3
1002220302	30	85	500	10	PCIE	3
1002220303	30	85	600	10	PCIE	3
1002220304	30	85	1000	15	PCIE	3

- NOTES:
- MATERIAL:
 - HOUSING - GLASS FILLED NYLON, UL94-V0
 - LATCH - MOLDED INTO HOUSING
 - EXPANDO - PET
 - CABLE - TWIN-AX SHIELD: ALUMINIZED POLYESTER FOIL
SIGNAL AND DRAIN: SOLID COPPER
 - PCB - FR4 (HALOGEN FREE)
 - THIS PRODUCT CONFORMS TO THE MECHANICAL DIMENSIONING OF SFF-8643 AND ELECTRICAL PERFORMANCE REQUIREMENTS OF SAS 3.0
 - RoHS COMPLIANT. NO EXEMPTIONS

SYMBOLS			THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX ELECTRONIC TECHNOLOGIES, LLC AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION		
▽ = 0	DIMENSION UNITS	SCALE	CURRENT REV DESC:		
▽ = 0	mm	5:1	EC NO: 604318		
▽ = 0	GENERAL TOLERANCES (UNLESS SPECIFIED)		DRWN: NHSU01 2018/07/23		
▽ = 0	ANGULAR TOL ± 1.0°		CHK'D: VPENG01 2018/09/12		
▽ = 0	4 PLACES ±		APPR: VPENG01 2018/09/12		
▽ = 0	3 PLACES ±		INITIAL REVISION:		
▽ = 0	2 PLACES ± 0.13		DRWN: CYEH03 2017/12/18		
▽ = 0	1 PLACE ± 0.25		APPR: RHSU01 2018/02/13		
▽ = 0	0 PLACES ±		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		
▽ = 0	THIRD ANGLE PROJECTION		DRAWING SERIES		
▽ = 0	D-SIZE		100222		
MATERIAL NUMBER			CUSTOMER		
1002220100			SEE P/N TABLE GENERAL MARKET		
DOCUMENT NUMBER			DOC TYPE DOC PART REVISION		
1002220100			PSD 000 E		
DOCUMENT STATUS			SHEET NUMBER		
P1 RELEASE DATE 2018/09/12 11:08:12			1 OF 3		

PINOUT 1

	P1		N/C	P2	
		GND		D9	B9
	TX2-	D8	→	B8	RX2-
	TX2+	D7	→	B7	RX2+
	GND	D6	——	B6	GND
	TX0-	D5	→	B5	RX0-
	TX0+	D4	→	B4	RX0+
	GND	D3	——	B3	GND
	SB6	D2	-----	D1	SB6
	SB5	D1	-----	D2	SB5
	SB4	C1	-----	C2	SB4
	SB2	C2	-----	C1	SB2
	GND	C3	——	A3	GND
	TX1+	C4	→	A4	RX1+
	TX1-	C5	→	A5	RX1-
	GND	C6	——	A6	GND
	TX3+	C7	→	A7	RX3+
	TX3-	C8	→	A8	RX3-
	GND	C9	N/C	A9	GND
	GND	B9	N/C	D9	GND
	RX2-	B8	←	D8	TX2-
	RX2+	B7	←	D7	TX2+
	GND	B6	——	D6	GND
	RX0-	B5	←	D5	TX0-
	RX0+	B4	←	D4	TX0+
	GND	B3	——	D3	GND
	SB1	B2	-----	B1	SB1
	SB3	B1	-----	B2	SB3
	SB7	A1	-----	A2	SB7
	SB0	A2	-----	A1	SB0
	GND	A3	——	C3	GND
	RX1+	A4	←	C4	TX1+
	RX1-	A5	←	C5	TX1-
	GND	A6	——	C6	GND
	RX3+	A7	←	C7	TX3+
	RX3-	A8	←	C8	TX3-
	GND	A9	N/C	C9	GND

C O N T R O L L E R

B A C K P L A N E

PINOUT 2

	P1		N/C	P2	
		GND		D9	B9
	TX2-	D8	→	B8	RX2-
	TX2+	D7	→	B7	RX2+
	GND	D6	——	B6	GND
	TX0-	D5	→	B5	RX0-
	TX0+	D4	→	B4	RX0+
	GND	D3	——	B3	GND
	SB6	D2	-----	B2	SB1
	SB5	D1	-----	C2	SB2
	SB4	C1	-----	B1	SB3
	SB2	C2	-----	D1	SB5
	GND	C3	——	A3	GND
	TX1+	C4	→	A4	RX1+
	TX1-	C5	→	A5	RX1-
	GND	C6	——	A6	GND
	TX3+	C7	→	A7	RX3+
	TX3-	C8	→	A8	RX3-
	GND	C9	N/C	A9	GND
	GND	B9	N/C	D9	GND
	RX2-	B8	←	D8	TX2-
	RX2+	B7	←	D7	TX2+
	GND	B6	——	D6	GND
	RX0-	B5	←	D5	TX0-
	RX0+	B4	←	D4	TX0+
	GND	B3	——	D3	GND
	SB1	B2	-----	D2	SB6
	SB3	B1	-----	C1	SB4
	SB7	A1	-----	A2	SB0
	SB0	A2	-----	A1	SB7
	GND	A3	——	C3	GND
	RX1+	A4	←	C4	TX1+
	RX1-	A5	←	C5	TX1-
	GND	A6	——	C6	GND
	RX3+	A7	←	C7	TX3+
	RX3-	A8	←	C8	TX3-
	GND	A9	N/C	C9	GND

C O N T R O L L E R

C O N T R O L L E R

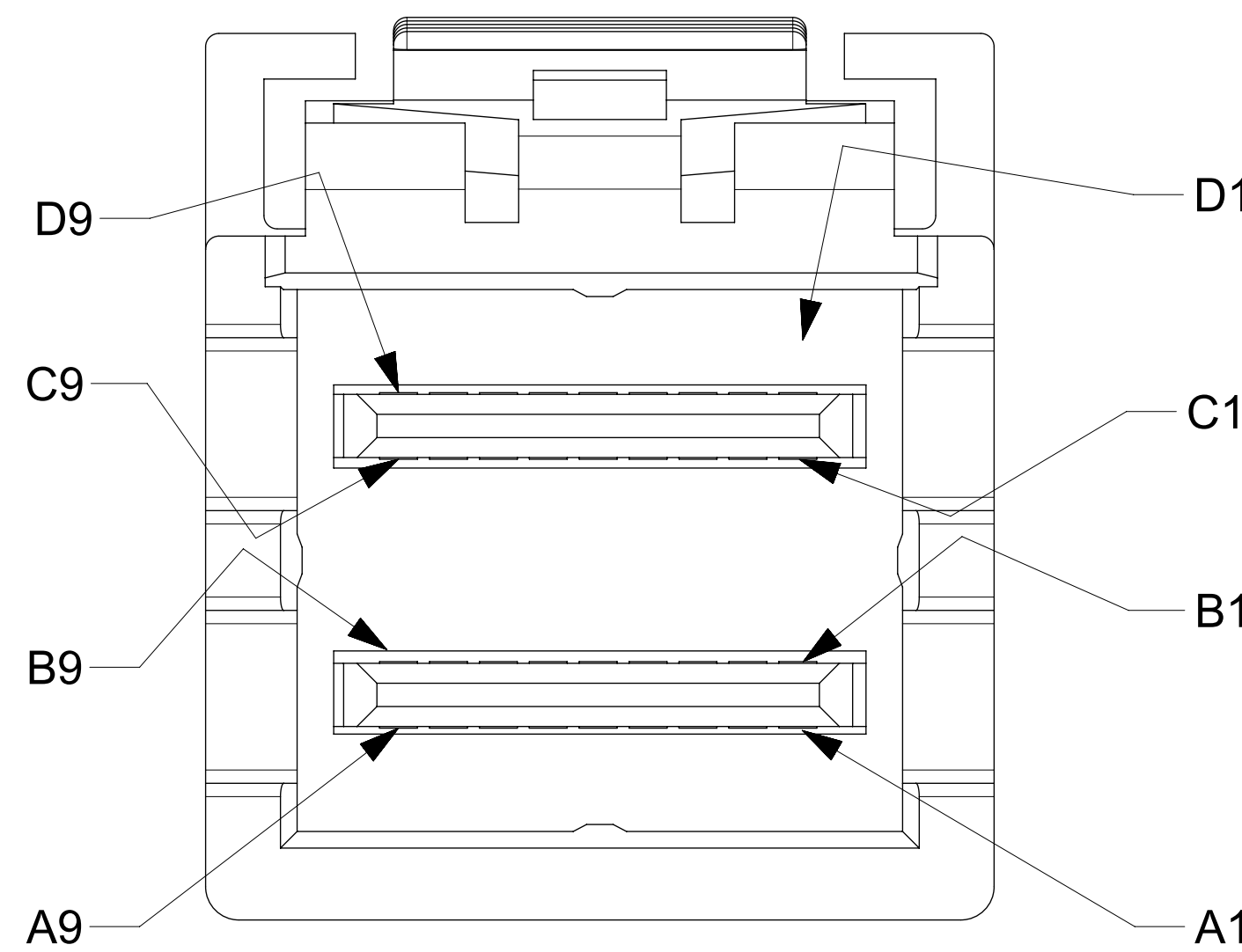
PINOUT 3

	P1		N/C	P2	
		GND		D9	B9
	TX2-	D8	→	B8	RX2-
	TX2+	D7	→	B7	RX2+
	GND	D6	——	B6	GND
	TX0-	D5	→	B5	RX0-
	TX0+	D4	→	B4	RX0+
	GND	D3	——	B3	GND
	SB6	D2	-----	D1	SB6
	SB5	D1	-----	D2	SB5
	WAKEn	C1	-----	C2	CWAKEn
	RSTn	C2	-----	C1	CPERSTn
	GND	C3	——	A6	GND
	TX1+	C4	→	A4	RX1+
	TX1-	C5	→	A5	RX1-
	GND	C6	——	A9	GND
	TX3+	C7	→	A7	RX3+
	TX3-	C8	→	A8	RX3-
	GND	C9	N/C	C9	GND
	GND	B9	N/C	D9	GND
	RX2-	B8	←	D8	TX2-
	RX2+	B7	←	D7	TX2+
	GND	B6	——	D6	GND
	RX0-	B5	←	D5	TX0-
	RX0+	B4	←	D4	TX0+
	GND	B3	——	D3	GND
	SB1	B2	-----	B1	SB1
	SB3	B1	-----	B2	SB3
	CLK+	A1	←	A2	CLK+
	CLK-	A2	←	A1	CLK-
	GND	A3	——	A3	GND
	RX1+	A4	←	C4	TX1+
	RX1-	A5	←	C5	TX1-
	GND	A6	——	C3	GND
	RX3+	A7	←	C7	TX3+
	RX3-	A8	←	C8	TX3-
	GND	A9	——	C6	GND

P C I E

LEGEND:

- = GROUND LINES
- = THRU LINES
- = TRANSMIT TO RECEIVE ON HIGH SPEED CIRCUITS
- N/C = NOT CONNECTED



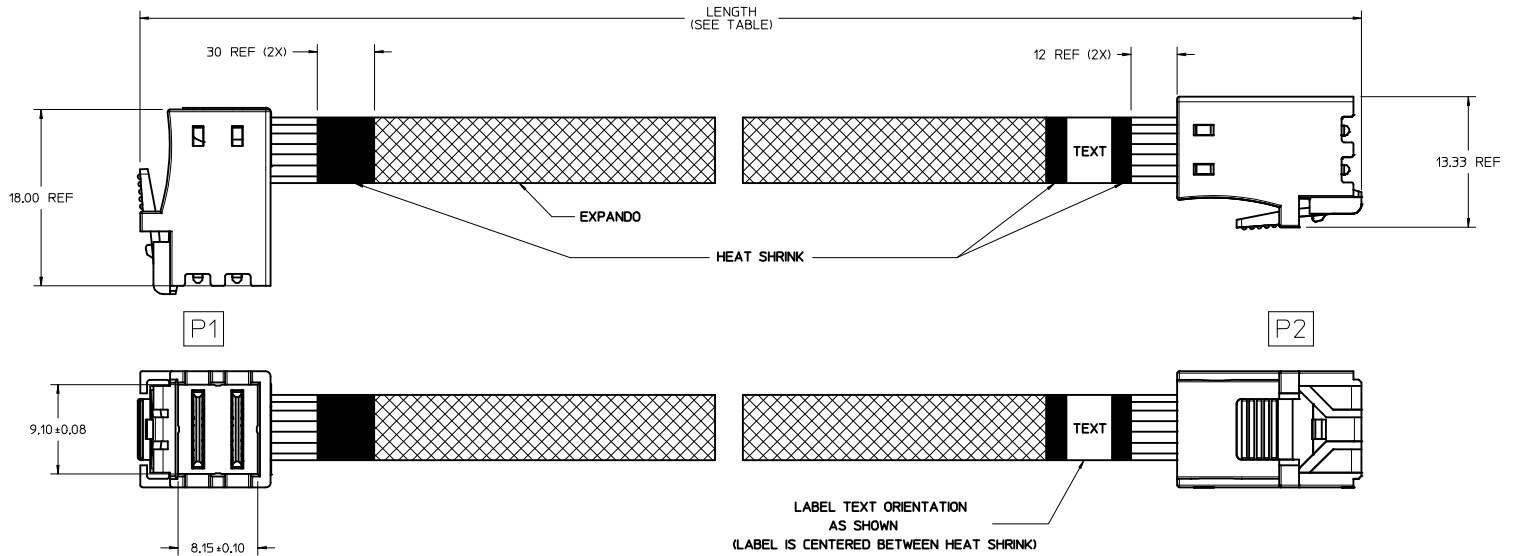
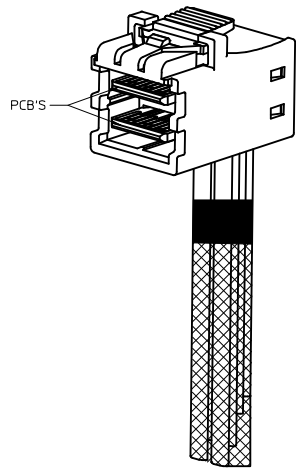
SYMBOLS	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX ELECTRONIC TECHNOLOGIES, LLC AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION		CURRENT REV DESC:	
	DIMENSION UNITS	SCALE		
▽ = 0	mm	10:1		
▽ = 0	GENERAL TOLERANCES (UNLESS SPECIFIED)			
▽ = 0	ANGULAR TOL ± 1.0°			
▽ = 0	4 PLACES	±		
▽ = 0	3 PLACES	±		
▽ = 0	2 PLACES	± 0.13		
▽ = 0	1 PLACE	± 0.25		
▽ = 0	0 PLACES	±		
■ = 0	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		THIRD ANGLE PROJECTION	DRAWING
▽ = 0				D-SIZE
		SERIES	MATERIAL NUMBER	CUSTOMER
		100222	SEE P/N TABLE	GENERAL MARKET
		DOCUMENT NUMBER		DOC TYPE
		1002220100		PSD
		DOC PART	000	REVISION
		E		
		SHEET NUMBER		
		2 OF 3		

LABEL DETAIL



MOLEX PART NUMBER (SEE P/N TABLE)
 XXXX:MANUFACTURING LOCATION
 MANUFACTURING DATE
 WW: WEEK OF THE YEAR (0-52)
 YY: LAST TWO DIGITS OF THE YEAR

SYMBOLS = 0 = 0 = 0 = 0 = 0 = 0 = 0 = 0	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX ELECTRONIC TECHNOLOGIES, LLC AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION			
	DIMENSION UNITS	SCALE	CURRENT REV DESC:	
	mm	1:1		
	GENERAL TOLERANCES (UNLESS SPECIFIED)			EC NO: 604318 DRWN: NHSU01 2018/07/23 CHK'D: VPENG01 2018/09/12 APPR: VPENG01 2018/09/12 INITIAL REVISION: DRWN: CYEH03 2017/12/18 APPR: RHSU01 2018/02/13
	ANGULAR TOL ± 1.0°			
	4 PLACES ±			
	3 PLACES ±			
	2 PLACES ± 0.13			
	1 PLACE ± 0.25			DOCUMENT NUMBER 1002220100 DOC TYPE PSD DOC PART 000 REVISION E
	0 PLACES ±			
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS				
THIRD ANGLE PROJECTION		DRAWING	SERIES	
		D-SIZE	100222	
MATERIAL NUMBER		CUSTOMER	SHEET NUMBER	
SEE P/N TABLE		GENERAL MARKET	3 OF 3	



LABEL TEXT ORIENTATION
AS SHOWN
(LABEL IS CENTERED BETWEEN HEAT SHRINK)

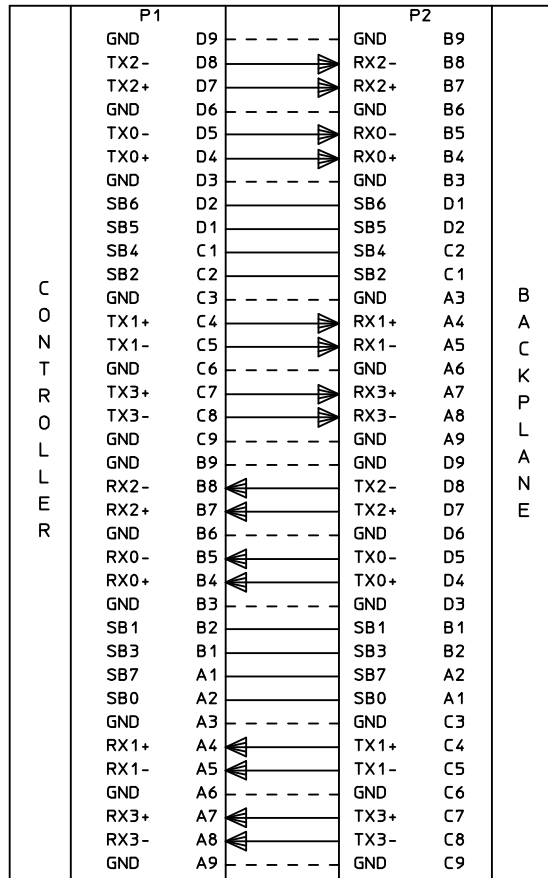
MOLEX P/N	AWG	LENGTH (mm)	TOLERANCE (+mm)	DESCRIPTION	PINOUT
1002220100	30	0.152	10	CTRL TO BP	1
1002220101	30	0.300	10	CTRL TO BP	1
1002220102	30	0.500	10	CTRL TO BP	1
1002220103	30	0.600	10	CTRL TO BP	1
1002220104	30	1.000	15	CTRL TO BP	1
1002220200	30	0.152	10	CTRL TO CTRL	2
1002220201	30	0.300	10	CTRL TO CTRL	2
1002220202	30	0.500	10	CTRL TO CTRL	2
1002220203	30	0.600	10	CTRL TO CTRL	2
1002220204	30	1.000	15	CTRL TO CTRL	2
1002220300	30	0.152	10	PCIE	3
1002220301	30	0.300	10	PCIE	3
1002220302	30	0.500	10	PCIE	3
1002220303	30	0.600	10	PCIE	3
1002220304	30	1.000	15	PCIE	3

NOTES:

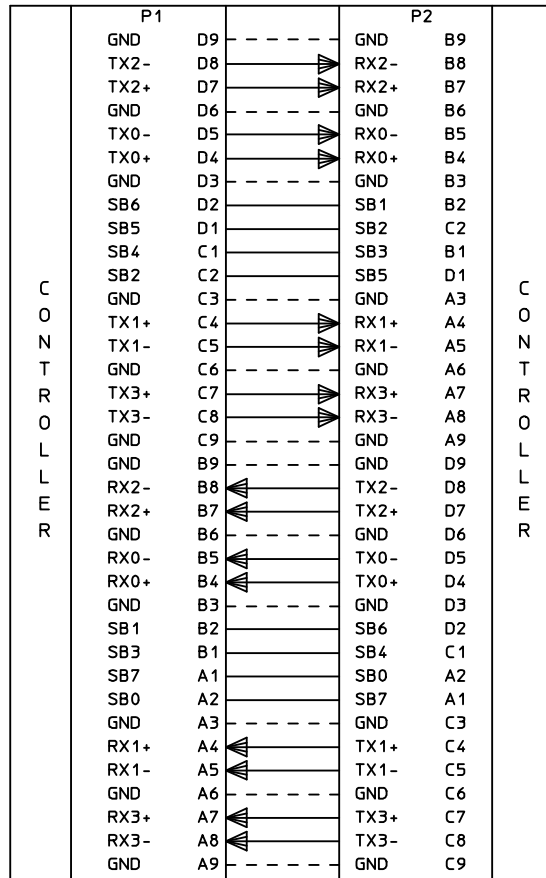
- MATERIAL:
HOUSING - 30% GLASS FILLED NYLON, UL94-V0
LATCH - MOLDED INTO HOUSING
EXPANDO - PET
CABLE - TWIN-AX SHIELD: ALUMINIZED POLYESTER FOIL
SIGNAL AND DRAIN: SOLID COPPER
PCB - FR4 (HALOGEN FREE)
- THIS PRODUCT CONFORMS TO THE MECHANICAL DIMENSIONING OF SFF-8643 AND ELECTRICAL PERFORMANCE REQUIREMENTS OF SAS 3.0
- RoHS COMPLIANT. NO EXEMPTIONS

UPDATED PINOUT EC NO: CPG2015-4494 DRAWN BY: TPRATT CHKD: CHYK APPR: CHIRSCHY DATE: 2015/02/25 REV: 1	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE	SCALE	DESIGN UNITS	THIRD ANGLE PROJECTION
	$\nabla=0$ $\nabla=0$ $\nabla=0$	mm INCH 4 PLACES ± --- ± --- 3 PLACES ± --- ± --- 2 PLACES ± 0.13 ± --- 1 PLACE ± 0.25 ± --- 0 PLACE ± --- ± ---	MM ONLY	4:1	METRIC	
	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS	DRAWN BY: TPRATT CHECKED BY: PSYTSMA APPROVED BY: CHIRSCHY DATE: 2014/02/26 DATE: 2014/02/26 DATE: 2014/03/21	TITLE: 4X INT. HD SHORT BODY RIGHT ANGLE DOWN TO STR CBL ASSY 85 OHM molex DOCUMENT NO: SD-100222-0100	SHEET NO: 1 OF 3		

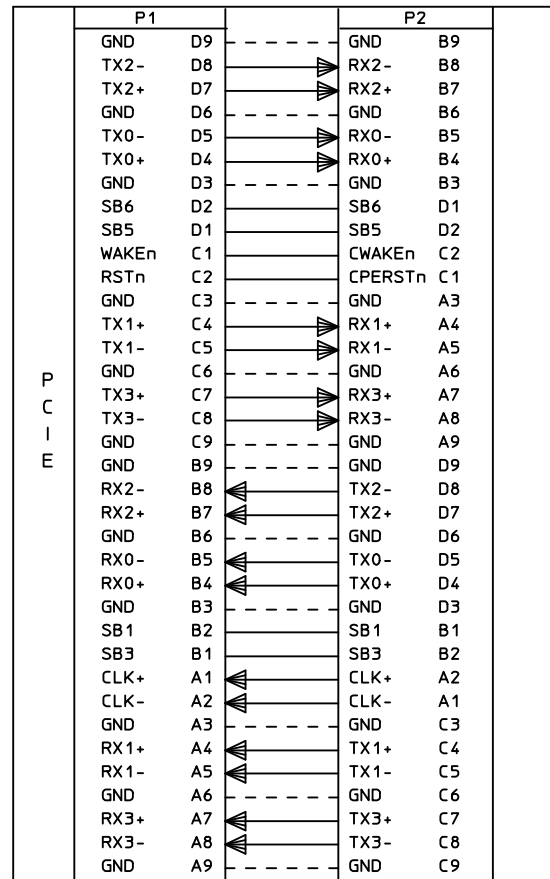
PINOUT 1



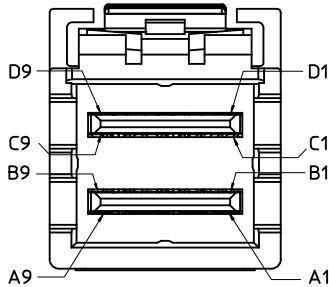
PINOUT 2



PINOUT 3



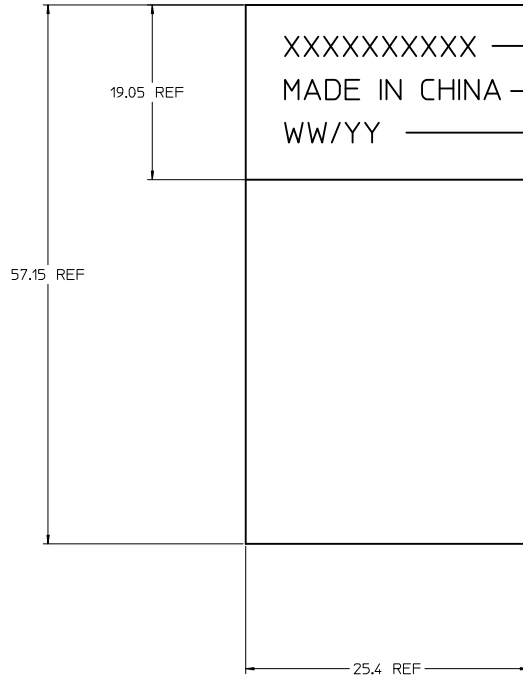
LEGEND:
 ---- = THRU LINES
 ▲ = TRANSMIT TO RECEIVE ON HIGH SPEED CIRCUITS



UPDATED PINOUT EC NO: CPG2015-4494 DRAWN/TPRATT CHKD: APPR:CHRISCHY 2015/02/25 2015/03/03	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE	SCALE	DESIGN UNITS	THIRD ANGLE PROJECTION
	▽=0	4 PLACES ± mm	MM ONLY	4:1	METRIC	☉
	▽=0	3 PLACES ± mm				
	▽=0	2 PLACES ± 0.13				
		1 PLACE ± 0.25				
		0 PLACE ±				
		ANGULAR ± 1°				
		DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS	SEE P/N TABLE			
			MATERIAL NO.	DOCUMENT NO.		SHEET NO.
				SD-100222-0100		2 OF 3
			THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION			

20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1

LABEL DETAIL



XXXXXXXXXX — MOLEX PART NUMBER (SEE P/N TABLE)
 MADE IN CHINA — MANUFACTURING LOCATION
 WW/YY — WW: WEEK OF THE YEAR (0-52)
 YY: LAST TWO DIGITS OF THE YEAR

UPDATED PINOUT IEC NO: CPG2015-4494 DRAWN: PRATT CHKD: APPR: CHIRSCHY 2015/03/03	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE	SCALE	DESIGN UNITS	THIRD ANGLE PROJECTION
	▽=0	mm INCH	MM ONLY	4:1	METRIC	☉
	▽=0	4 PLACES ± --- ± --- 3 PLACES ± --- ± --- 2 PLACES ± 0.13 ± --- 1 PLACE ± 0.25 ± --- 0 PLACE ± --- ± ---	DRAWN BY DATE TPRATT 2014/02/26	CHECKED BY DATE PSYTSMA 2014/02/26	TITLE 4X INT. HD SHORT BODY RIGHT ANGLE DOWN TO STR CBL ASSY 85 OHM	
	▽=0	ANGULAR ± 1 ° DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS	APPROVED BY DATE CHIRSCHY 2014/03/21	MATERIAL NO. SEE P/N TABLE	DOCUMENT NO. SD-100222-0100	SHEET NO. 3 OF 3

19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1