REVISION K

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THIS PRODUCT MANUFACTURED WITH LEAD-FREE PROCESSING

DESIGNED & DIMENSIONED IN MILLIMETERS[INCHES]

ECUE-XX-XXX-XX-XX-XX-1-XX

No OF PAIRS
-12 (T1 & C1 CABLE ONLY)
-08 (T2 CABLE ONLY)

ASSEMBLY LENGTH
007 - 999 cm (SEE NOTE 8)

SHIELDED CABLE TYPE
-C1: TCF-3850 (38AWG COAX,12 PAIRS ONLY)
-T1: TTF-36100 (36AWG TWINAX,12 PAIRS ONLY)
-T2: TTF-34100 (34AWG TWINAX, 8 PAIRS ONLY)

END 2 OPTION
-FF: ECUE
* -EC: ECDP

WIRING OPTION (SEE TABLE 1)
-01 "A1 TO A19"
-02 "A1 TO B1"
-B4 (8 PAIR ONLY) "A1 TO B19"

-1
(LOW PROFILE)

OPTION
BLANK: STANDARD FIREFLY
-D1: DECOUPLING CAPACITORS (SEE NOTE 7)
ONLY AVAILABLE WITH -02 & -B4 WIRE OPTION
NOT AVAILABLE WITH -EC OPTION

* NOT TOOLED

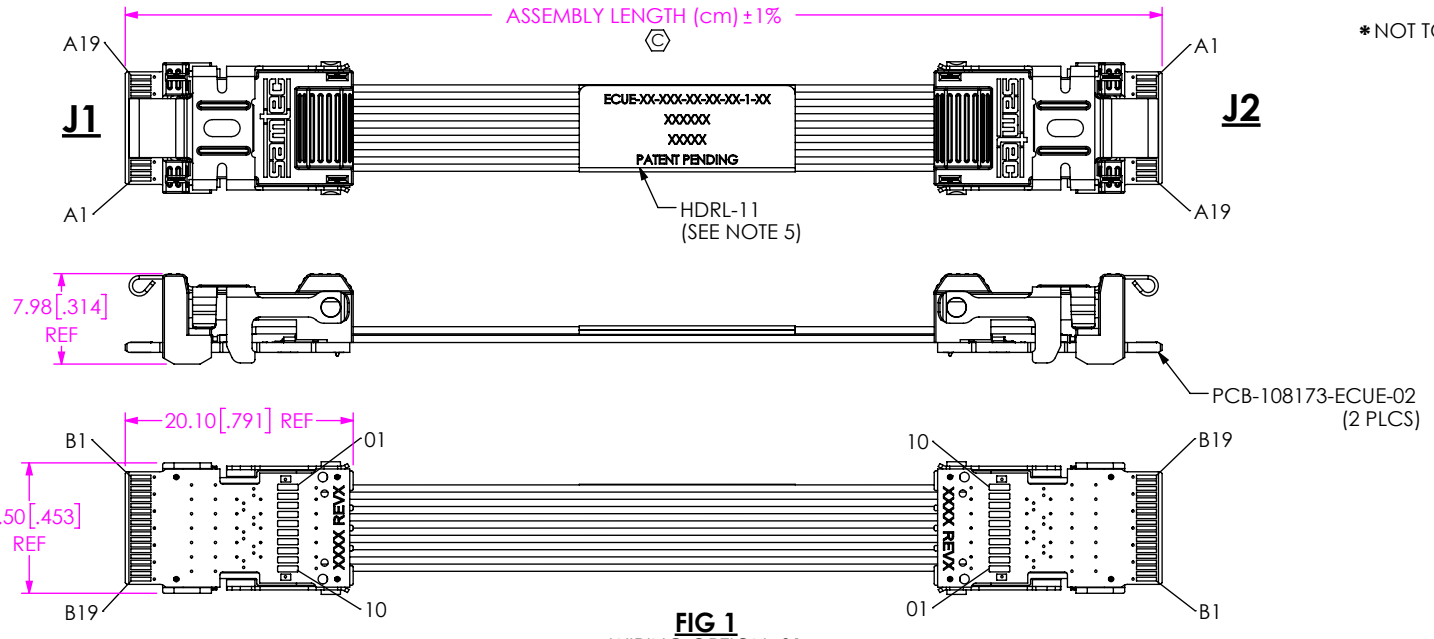


FIG 1
WIRING OPTION -01
ECUE-12-XXX-C1-FF-01-1 SHOWN

TABLE 1

WIRING OPTION	END 1	END 2	
	-FF	-FF	*-EC
	ECUE PIN #	ECUE PIN #	ECDP PIN #
01	A1	A19	1
02	A1	B1	38
B4	A1	B19	NA

* NOT TOOLED

TABLE 2
ECUE-12-XXX-X1-FF-01-1 SIGNAL MAPPING
(12 PAIRS, -01 WIRING OPTION)

J1	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19
NAME	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G
J2	A19	A18	A17	A16	A15	A14	A13	A12	A11	A10	A9	A8	A7	A6	A5	A4	A3	A2	A1	B19	B18	B17	B16	B15	B14	B13	B12	B11	B10	B9	B8	B7	B6	B5	B4	B3	B2	B1

NOTES:
1. Ⓒ REPRESENTS A CRITICAL DIMENSION
2. PARTS TO BE PROCESSED PER SAMTEC WORKMANSHIP GUIDELINES
3. Ⓒ ALL ASSEMBLIES TO BE 100% ELECTRICALLY TESTED
4. Ⓒ ALL ASSEMBLIES TO BE 100% HI-POT TESTED AT 300V
5. LABEL TO BE CENTERED ON CABLE AS SHOWN. LABEL TO CONTAIN:
   LINE 1 - PART NUMBER "ECUE-XX-XXX-XX-XX-XX-1-XX"
   LINE 2 - SHOP ORDER NUMBER "XXXXXX"
   LINE 3 - DATE CODE "XXXXX"
   LINE 4 - PATENT PENDING
6. FOR SUB-ASSEMBLY AND FINISHED GOOD PACKAGING REQUIREMENTS, REFERENCE SAMTEC PACKAGING STANDARD
7. -D1 OPTION USES 0.1µF DECOUPLING CAPACITORS
8. CABLE LENGTHS LONGER THAN 150 cm NOT SUPPORTED BY SI TEST DATA
9. PIN 3 ON UCC8 CONNECTION TIED TO GROUND, REMAINDER ARE NO CONNECT.
10. REFER TO PREP-SPEC.PDF FOR CABLE PREP DIMENSIONS. ASSEMBLY USES HIGH SPEED PCB PREP.

F:\DWG\MISC\MKTG\ECUE-XX-XXX-XX-XX-XX-1-XX-MKT.SLDDRW

TOLERANCES DO NOT APPLY TO REFERENCE DIMENSIONS.
UNLESS OTHERWISE SPECIFIED, DIMENSIONS ARE IN MILLIMETERS.
TOLERANCES ARE:
DECIMALS: .X: ±.3[.01] .XX: ±.13[.005] .XXX: ±.051[.0020]
ANGLES: 2°

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MATERIAL: DO NOT SCALE DRAWING
HOUSING: LCP
LATCH: STAINLESS STEEL
WELD TAB: BRASS
CABLE: JACKET: PVC
DIELECTRIC: FEP
CONDUCTORS: SILVER PLATED COPPER
SHIELD: SERVED SILVER PLATED COPPER
PCB: FR4, COPPER

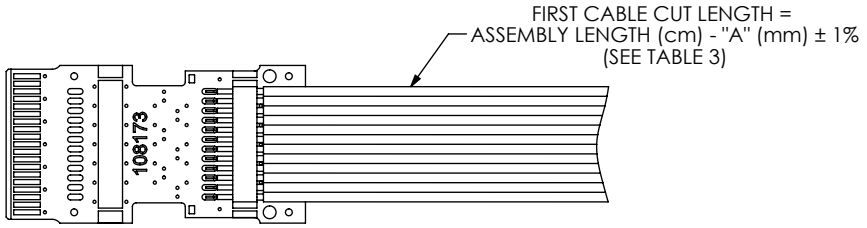
520 PARK EAST BLVD, NEW ALBANY, IN 47150
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DESCRIPTION: FIREFLY CABLE ASSEMBLY

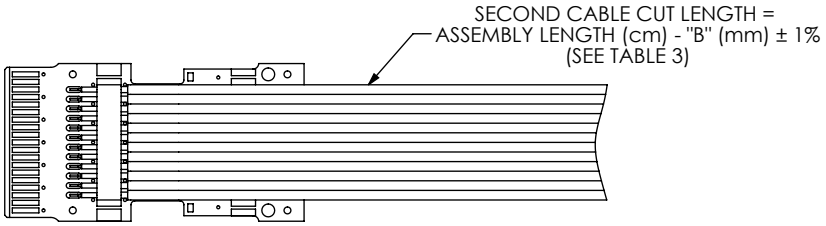
DWG. NO. ECUE-XX-XXX-XX-XX-XX-1-XX

BY: RMSANTOS 10/9/2014 SHEET 1 OF 6

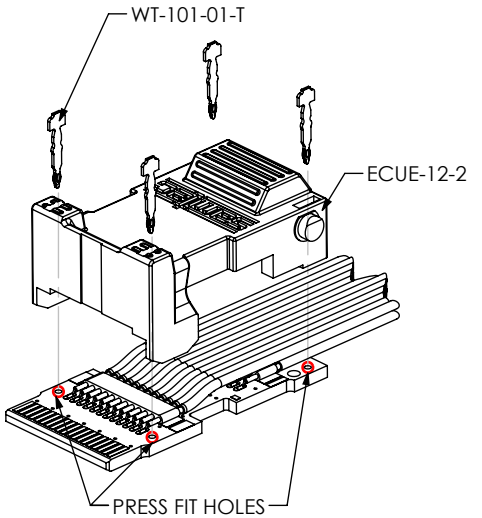
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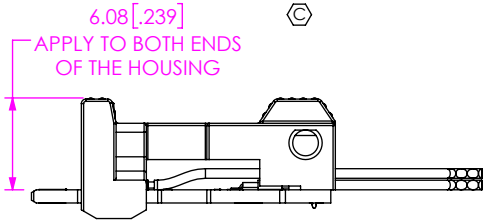


IN PROCESS 1
SOLDER FIRST CABLE TO PCB

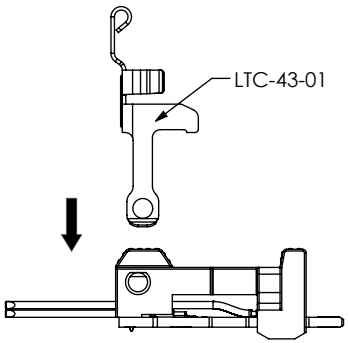


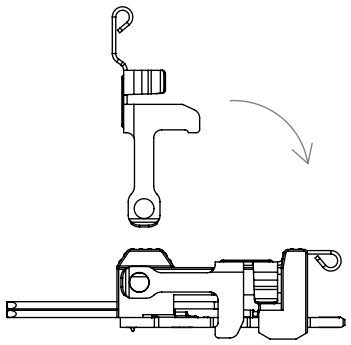
IN PROCESS 2
SOLDER SECOND CABLE TO PCB



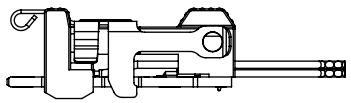


IN PROCESS 3
INSERT WELD TABS & ATTACH TO BOARD





IN PROCESS 4
ATTACH LATCH AND
ROTATE INTO DOWN POSITION



IN PROCESS 5
SOLDER WELD TABS

TABLE 3						
END 2 OPTION	WIRING OPTION					
	-01		-02		-B4	
	"A" mm[in.]	"B" mm[in.]	"A" mm[in.]	"B" mm[in.]	"A" mm[in.]	"B" mm[in.]
-FF: ECUE	26.29 [1.035]	8.51 [0.335]	17.41 [0.685]	17.41 [0.685]	16.41 [0.646]	16.41 [0.646]
-EC: ECDP	22.32 [0.879]	12.91 [0.508]	22.32 [0.879]	12.91 [0.508]	22.32 [0.879]	12.91 [0.508]

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DESCRIPTION:
FIREFLY CABLE ASSEMBLY

DWG. NO.
ECUE-XX-XXX-XX-XX-XX-1-XX

BY: RMSANTOS 10/9/2014 SHEET 2 OF 6

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FIG 2
WIRING OPTION -02
ECUE-12-XXX-T1-FF-02-1-D1 SHOWN
(SAME AS FIG 1 EXCEPT AS NOTED)

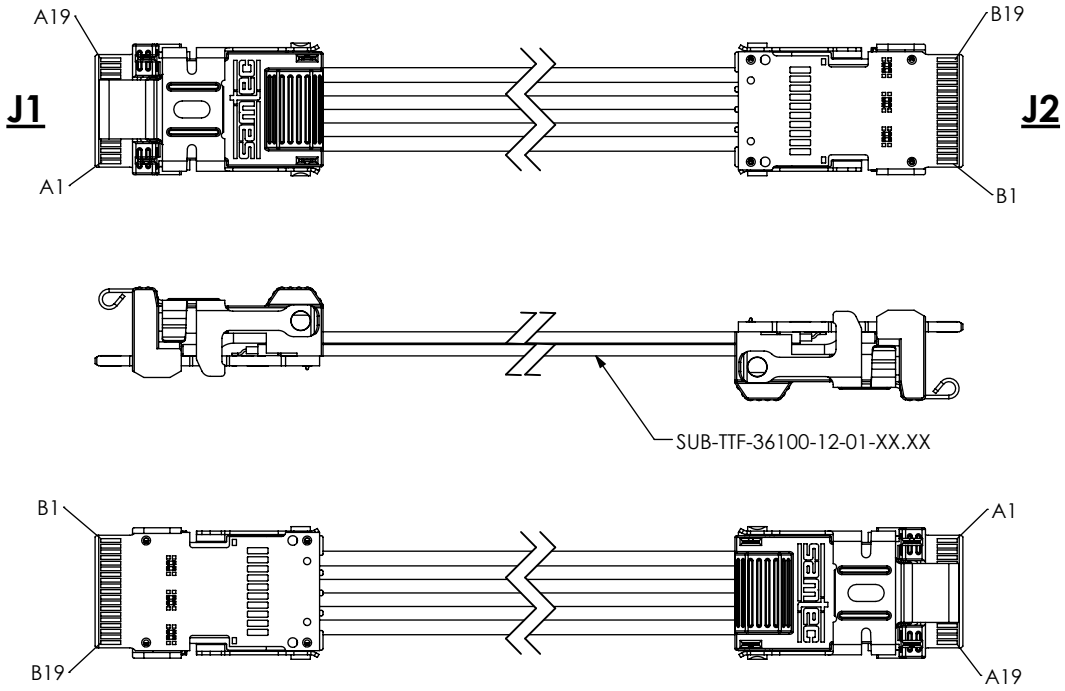


TABLE 4
ECUE-12-XXX-X1-FF-02-1-XX SIGNAL MAPPING
(12 PAIRS, -02 WIRING OPTION)

J1	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19
NAME	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G	S	S	G
J2	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19

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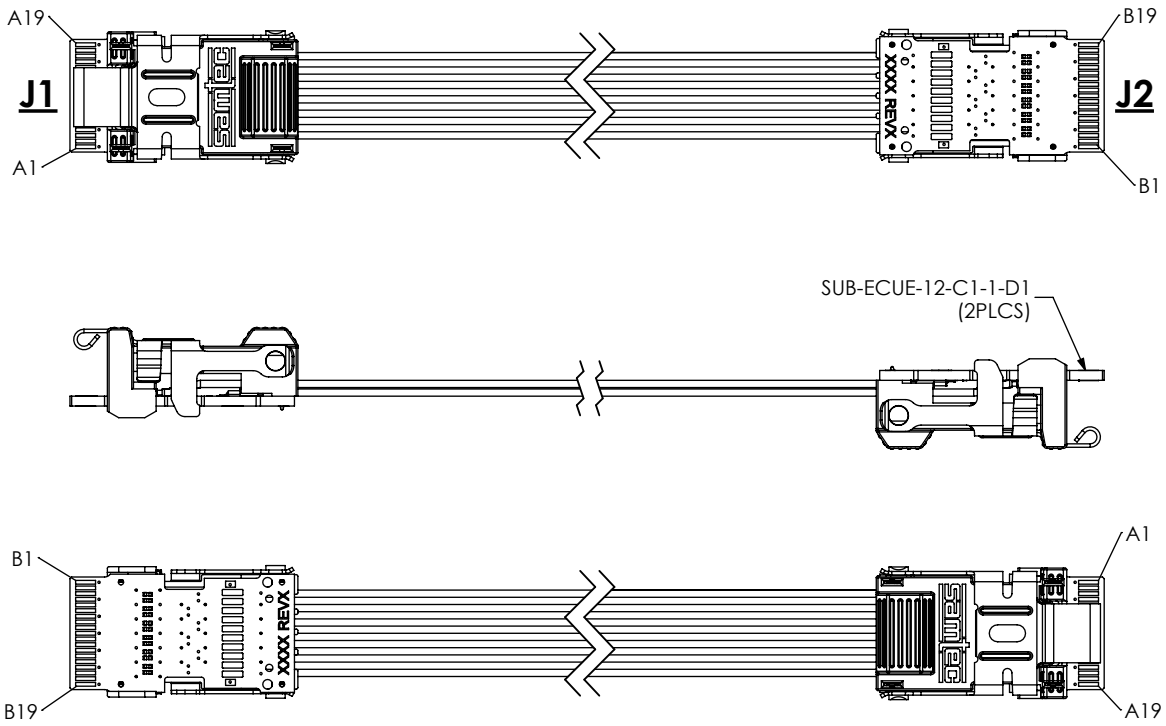
DESCRIPTION: FIREFLY CABLE ASSEMBLY

DWG. NO. ECUE-XX-XXX-XX-XX-XX-1-XX

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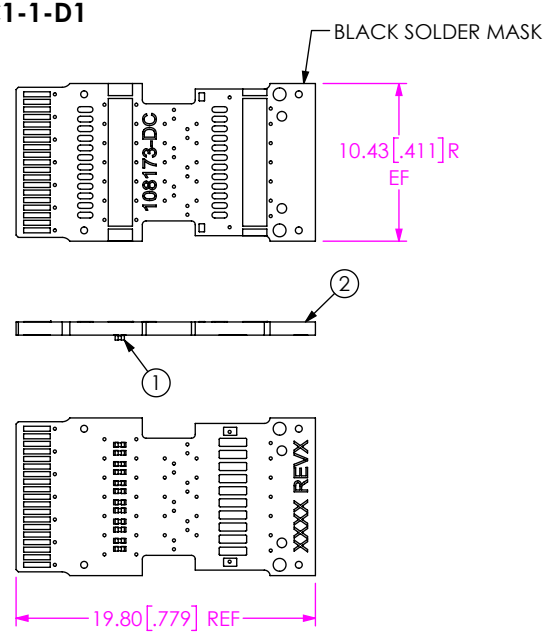
FIG 3
ECUE-12-XXX-C1-FF-02-1-D1 SHOWN
(SAME AS FIG 1 EXCEPT AS NOTED)



THIS PRODUCT MANUFACTURED WITH LEAD-FREE PROCESSING

J1 & J2

SUB-ECUE-12-C1-1-D1



SUB-ECUE-12-C1-1-D1 BOM			
ITEM NO.	PART NUMBER	QUANTITY	MATERIAL
1	CAP-0201-104-K-06.3-SM	12	CAP
2	PCB-108173-ECUE-DC-01	0.05	PCB

TABLE 5

No OF PAIRS	CABLE TYPE	END 2 OPTION	DC OPTION	PCBX-XXXXXX		SUB-TXF-XXXXX
				END 1	END 2	
-08	-T2	-FF	(BLANK)	PCB-108175-ECUE-02	PCB-108175-ECUE-02	SUB-TTF-34100-04-01-XX.XX
			-D1	PCBA-199848-ECUE-DC-01	PCBA-199848-ECUE-DC-01	SUB-TTF-34100-04-01-XX.XX
-12	-C1	-FF	(BLANK)	PCB-108173-ECUE-02	PCB-108173-ECUE-02	SUB-TCF-3850-12-01-DP-XX.XX
			-D1	SUB-ECUE-12-C1-1-D1	SUB-ECUE-12-C1-1-D1	SUB-TCF-3850-12-01-DP-XX.XX
		-EC*	(BLANK)	PCB-108173-ECUE-02	PCB-104465-HDR-01	SUB-TCF-3850-12-01-DP-XX.XX
			-D1	N/A	N/A	SUB-TCF-3850-12-01-DP-XX.XX
	-T1	-FF	(BLANK)	PCB-108177-ECUE-02	PCB-108177-ECUE-02	SUB-TTF-36100-06-01-XX.XX
			-D1	PCBA-199130-ECUE-E-03	PCBA-199130-ECUE-E-03	SUB-TTF-36100-06-01-XX.XX

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e-Mail info@SAMTEC.com code 55322

DESCRIPTION: FIREFLY CABLE ASSEMBLY

DWG. NO. ECUE-XX-XXX-XX-XX-XX-1-XX

BY: RMSANTOS 10/9/2014 SHEET 4 OF 6

REVISION K

TABLE 6
ECUE-08-XXX-T2-FF-01-1 SIGNAL MAPPING
(8 PAIRS, -01 WIRING OPTION)

J1	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19
NAME	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G
J2	A19	A18	A17	A16	A15	A14	A13	A12	A11	A10	A9	A8	A7	A6	A5	A4	A3	A2	A1	B19	B18	B17	B16	B15	B14	B13	B12	B11	B10	B9	B8	B7	B6	B5	B4	B3	B2	B1

TABLE 7
ECUE-08-XXX-T2-FF-02-1-XX SIGNAL MAPPING
(8 PAIRS, -02 WIRING OPTION)

J1	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19
NAME	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G
J2	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19

TABLE 8
ECUE-08-XXX-T2-FF-B4-1-XX SIGNAL MAPPING
(8 PAIRS, -B4 WIRING OPTION)

J1	A1	A2	A3	A4	A5	A6	A7	A8	A9	A10	A11	A12	A13	A14	A15	A16	A17	A18	A19	B1	B2	B3	B4	B5	B6	B7	B8	B9	B10	B11	B12	B13	B14	B15	B16	B17	B18	B19
NAME	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G	G	S	S	G	S	S	G	NC	NC	NC	NC	NC	G	S	S	G	S	S	G
J2	B19	B18	B17	B16	B15	B14	B13	B12	B11	B10	B9	B8	B7	B6	B5	B4	B3	B2	B1	A19	A18	A17	A16	A15	A14	A13	A12	A11	A10	A9	A8	A7	A6	A5	A4	A3	A2	A1

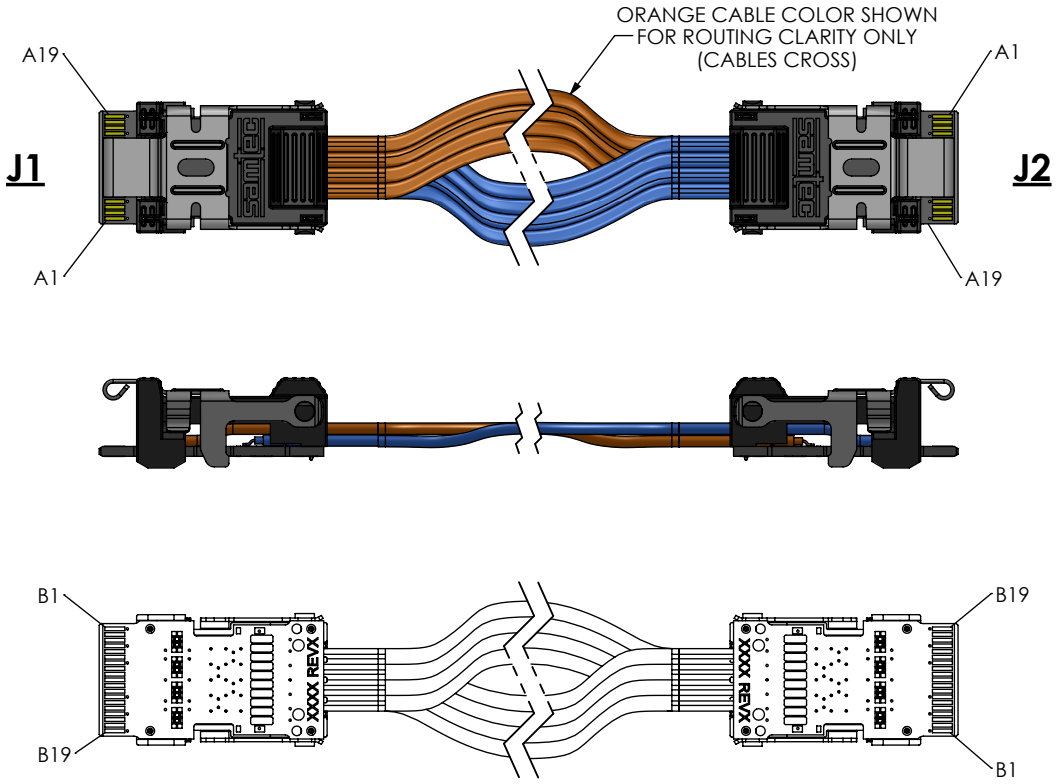


FIG 4
WIRING OPTION -B4
ECUE-08-XXX-T2-FF-B4-1-D1 SHOWN
(SAME AS FIG1 EXCEPT AS NOTED)

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SHEET SCALE: 1:1

DESCRIPTION:
FIREFLY CABLE ASSEMBLY

DWG. NO.
ECUE-XX-XXX-XX-XX-XX-1-XX

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*NOT TOOLED

FIG 5
ECUE-12-XXX-C1-EC-01-1 SHOWN
(SAME AS FIG1 EXCEPT AS NOTED)

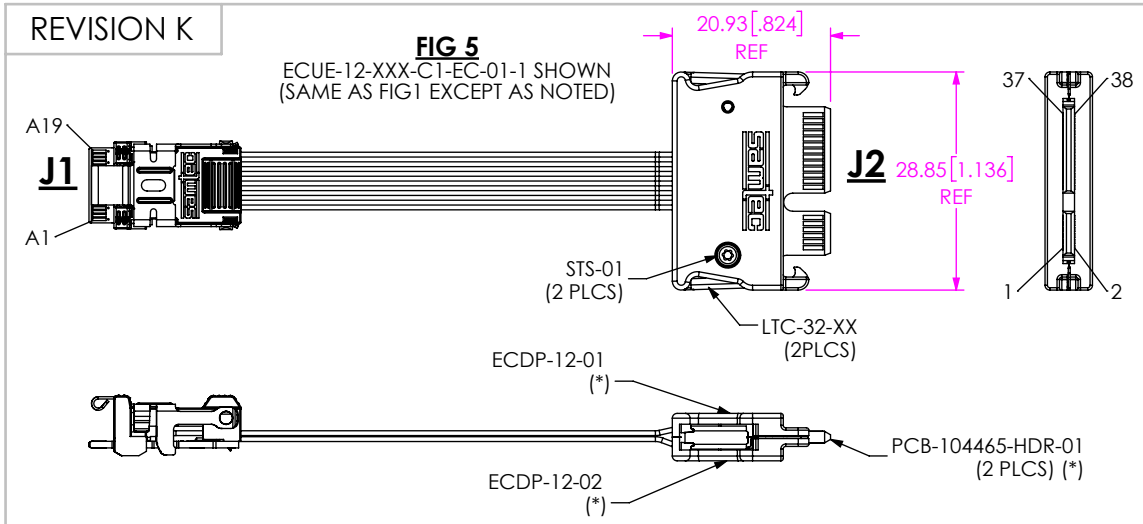


TABLE 9
ECUE-12-XXX-C1-EC-01-1 SIGNAL MAPPING
(12 PAIRS, -EC-01 WIRING OPTION)

J1	A1	A2	A3	~	A17	A18	A19	B1	B2	B3	~	B17	B18	B19
NAME	G	S	S	~	S	S	G	G	S	S	~	S	S	G
J2	1	3	5	~	33	35	37	2	4	6	~	34	36	38

*NOT TOOLED

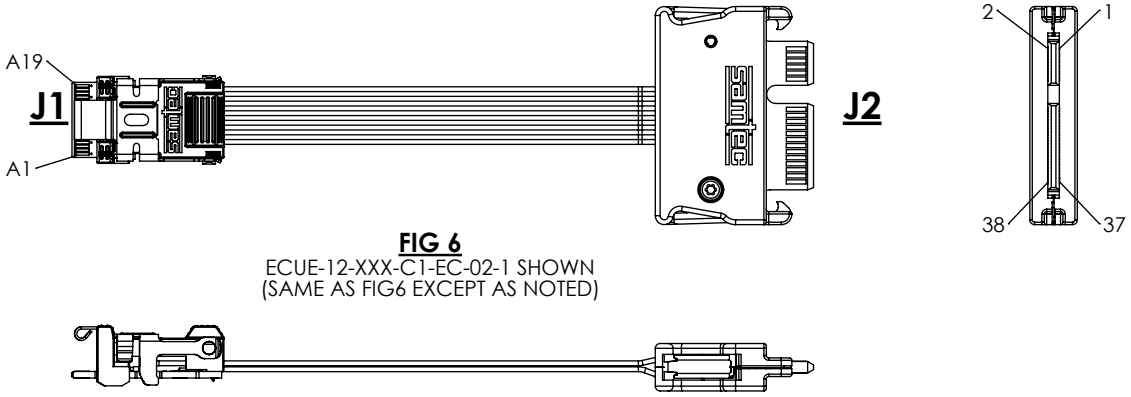


FIG 6
ECUE-12-XXX-C1-EC-02-1 SHOWN
(SAME AS FIG6 EXCEPT AS NOTED)

TABLE 10
ECUE-12-XXX-C1-EC-02-1 SIGNAL MAPPING
(12 PAIRS, -EC-02 WIRING OPTION)

J1	A1	A2	A3	~	A17	A18	A19	B1	B2	B3	~	B17	B18	B19
NAME	G	S	S	~	S	S	G	G	S	S	~	S	S	G
J2	38	36	34	~	6	4	2	37	35	33	~	5	3	1

TABLE 13

No OF PAIRS	*ECDP POSITIONS																		
-12	1	3	5	7	9	11	KEY	13	15	17	19	21	23	25	27	29	31	33	35	37
	G	S	S	G	S	S		G	S	S	G	S	S	G	S	S	G	S	S	G
	G	S	S	G	S	S		G	S	S	G	S	S	G	S	S	G	S	S	G
	2	4	6	8	10	12		14	16	18	20	22	24	26	28	30	32	34	36	38

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SHEET SCALE: 1:1

DESCRIPTION:
FIREFLY CABLE ASSEMBLY

DWG. NO.
ECUE-XX-XXX-XX-XX-XX-1-XX

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