

**REVISION**

C	CF	K GUETIG
9/2/2003	ECN-28364	
ADD LABEL TO TOP VIEW, BOTH SHEETS.		
D	KB	E MINGS
11/13/2003	ECN-30360	
CHG PART CALLOUT FROM HFEM-XXX-T-XX-XX-XX TO HFEM-XXX-T-XX-XX-XX TO HFEM-XXX-T-XX-XX-XX BY DEL -SE OPTION & ADDING -MH OPTION; DEL -060 POSITIONS (CALLOUT); ADD NOTE 3; CHG 'C' FOR -014 FROM .778 TO .768; FOR -028 FROM 1.566 TO 1.556 & FOR -042 FROM 2.354 TO 2.344. ADD 'D' & 'E' COLUMNS (TABLE 2); ADD -MH FE NUMBERS (TABLE 3); DEL TABLE 4 ON SHEET 2; CHG FIG. 2 FROM -SE TO -MH VIEWS ON SHEET 2; CHG STIFFENER THICKNESS BY ADDING .093 FOR -MH (CROSS SECTION, SHEET 2).		
E	CW	E MINGS
12/17/2003	ECN-31303	
SHEET 2, CHG 276 TO .227 AND CHG .285 TO .231.		
F	CW	E MINGS
1/16/2004	ECN-32034	
UPDATE THE LOCATION OF DIMENSION 'E' ON SHEET 2 TO SHOW THE OAL OF THE STIFFENER.		
G	CW	E MINGS
2/4/2004	ECN-32516	
UPDATE CROSS SECTION DETAIL ON SHEET 2 TO SHOW ADHESIVE COPPER-ADHESIVE IN PLACE OF COPPER CLAD		
H	CW	E MINGS
5/26/2004	ECN-35897	
SHEET 2, CHG 231 TO .232, .453 TO .550, .461 TO .570		
J	JC	J SCHRECK
7/7/2005	ECN-48200	
ADD FIG. 3 AND SHEET 3		
K	JM	J SCHRECK
9/22/2005	ECN-50968	
CHG NAME FROM HFEM-XXX-T-XX-XX-XX-XX TO HFEM-XXX-T-X-XX-XX-XX-XX; SHEET 1, TOP VIEW: CHG CALLOUT FROM QSE-XXX-01-H-D-DP-A TO QSE-XXX-01-H-D-DP-A; CHG CALLOUT FROM QTE-XXX-01-L-D-DP-A TO QTE-XXX-01-H-D-DP-A; SHEET 1, TABLE 2, COLUMN 5 & 6; CHG EVERY NAME FROM "...L..." TO "...H..."		

No. OF POS	"C"	"D"	"E"	QSE-XXX-01-H-D-DP-A	QTE-XXX-01-H-D-DP-A	FLEX
-014	.768 +/- .010 [19.50 +/- 0.25]	1.0875[27.623]	1.3375[33.973]	QSE-014-01-H-D-DP-A	QTE-014-01-H-D-DP-A	3", FE-10100 (QTY:1) 5", FE-10047 (QTY:1) 10", FE-10091 (QTY:1)
-028	1.556 +/- .010 [39.52 +/- 0.25]	1.8755[47.638]	2.1255[53.988]	QSE-028-01-H-D-DP-A	QTE-028-01-H-D-DP-A	3", FE-10100 (QTY:2) 5", FE-10047 (QTY:2) 10", FE-10091 (QTY:2)
-042	2.344 +/- .010 [59.54 +/- 0.25]	2.6635[67.653]	2.9135[74.003]	QSE-042-01-H-D-DP-A	QTE-042-01-H-D-DP-A	3", FE-10100 (QTY:3) 5", FE-10047 (QTY:3) 10", FE-10091 (QTY:3)

LENGTH	"A"	"B"
-3.00	3.00[76.2]	2.54[64.5]
-5.00	5.00[127.0]	4.54[115.3]
-10.00	10.00[254.0]	9.54[242.3]

**K** HFEM-XXX-T-X-XX.XX-DP-XX

No OF POSITIONS  
-014, -028, -042 (PER ROW)

TRANSFER END  
(MALE-FEMALE)

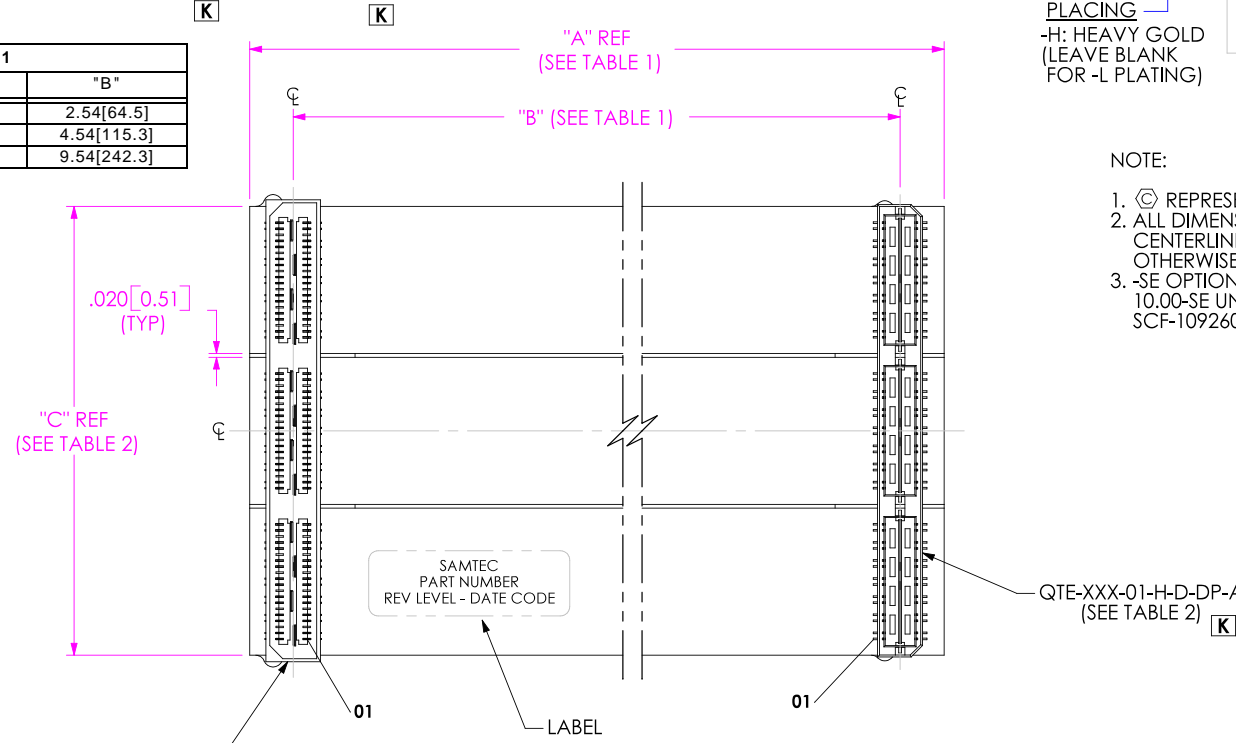
PLACING  
-H: HEAVY GOLD  
(LEAVE BLANK FOR -L PLATING)

OPTION  
-MH: MOUNTING HOLES  
(SEE FIG. 2, SHEET 2 AND FIG. 3, SHEET 3)  
(LEAVE BLANK FOR STANDARD)

-DP: DIFFERENTIAL PAIRS

LENGTH  
-03.00: 3.00[76.2] INCHES  
-05.00: 5.00[127.0] INCHES  
-10.00: 10.00[254.0] INCHES

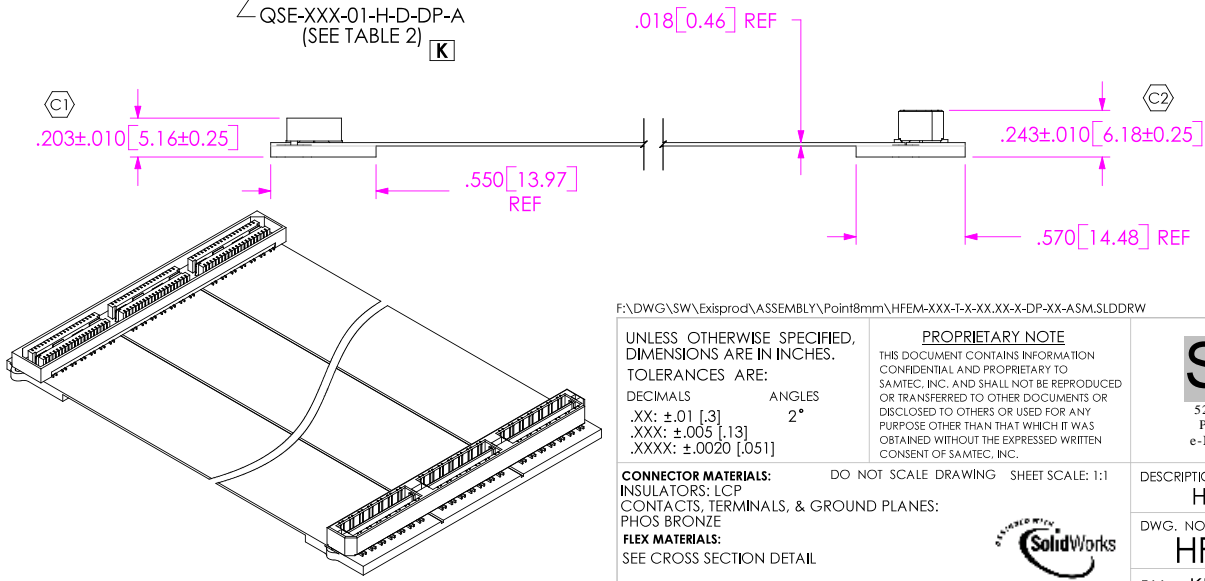
- NOTE:
- ⊕ REPRESENTS A CRITICAL DIMENSION.
  - ALL DIMENSIONS TO BE SYMMETRICAL ABOUT CENTERLINE WITHIN ±.002[.05] UNLESS OTHERWISE STATED.
  - SE OPTION DELETED. ORDER HFEM-060-T-10.00-SE UNDER NEW PART NUMBER: SCF-109260-01-DL.



**FIG. 1**  
HFEM-042-T-10.00-DP SHOWN

THIS DESIGN HAS NOT BEEN APPROVED BY ENGINEERING DO NOT DISTRIBUTE THIS PRINT

PART NUMBER	FE NUMBER
HFEM-014-T-03.00-DP	FE-10097
HFEM-014-T-03.00-DP-MH	FE-10115
HFEM-028-T-03.00-DP	FE-10098
HFEM-028-T-03.00-DP-MH	FE-10116
HFEM-042-T-03.00-DP	FE-10099
HFEM-042-T-03.00-DP-MH	FE-10117
HFEM-014-T-05.00-DP	FE-10086
HFEM-014-T-05.00-DP-MH	FE-10118
HFEM-028-T-05.00-DP	FE-10085
HFEM-028-T-05.00-DP-MH	FE-10119
HFEM-042-T-05.00-DP	FE-10076
HFEM-042-T-05.00-DP-MH	FE-10120
HFEM-014-T-10.00-DP	FE-10093
HFEM-014-T-10.00-DP-MH	FE-10121
HFEM-028-T-10.00-DP	FE-10094
HFEM-028-T-10.00-DP-MH	FE-10122
HFEM-042-T-10.00-DP	FE-10095
HFEM-042-T-10.00-DP-MH	FE-10123



F:\DWG\SW\Exisprod\ASSEMBLY\Point8mm\HFEM-XXX-T-X-XX-XX-XX-XX-ASM.SLDDRW

UNLESS OTHERWISE SPECIFIED, DIMENSIONS ARE IN INCHES.  
TOLERANCES ARE:  
DECIMALS ANGLES  
.XX: ±.01 [.3]  
.XXX: ±.005 [.13]  
.XXXX: ±.0020 [.051]

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**CONNECTOR MATERIALS:**  
INSULATORS: LCP  
CONTACTS, TERMINALS, & GROUND PLANES: PHOS BRONZE  
**FLEX MATERIALS:**  
SEE CROSS SECTION DETAIL

DO NOT SCALE DRAWING SHEET SCALE: 1:1

SolidWorks

**SAMTEC**

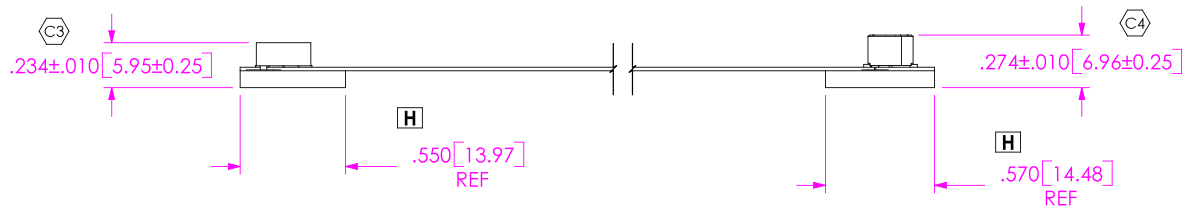
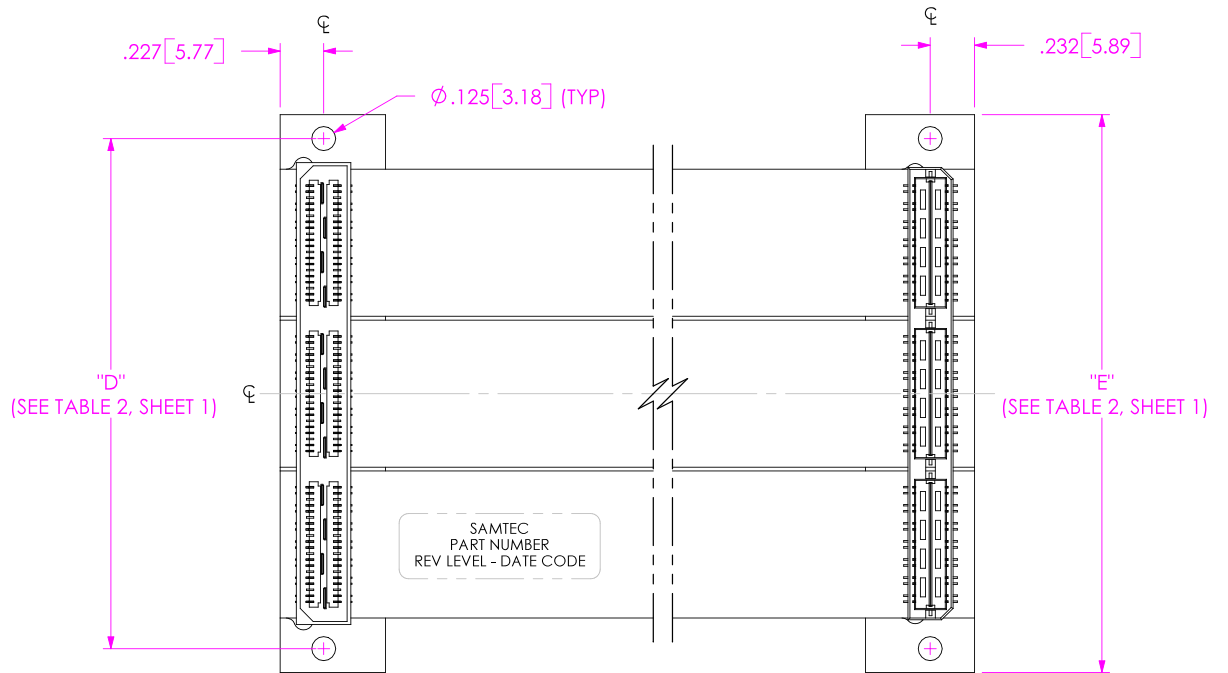
520 PARK EAST BLVD, NEW ALBANY, IN 47150  
PHONE: 812.944.6733 FAX: 812.948.5047  
e-Mail: [INFO@SAMTEC.COM](mailto:INFO@SAMTEC.COM) CODE: 55322

DESCRIPTION:  
HIGH SPEED FLEX 0.8mm ASSEMBLY

DWG. NO.  
**HFEM-XXX-T-X-XX.XX-DP-XX**

BY: KEVIN B 12/31/2001 SHEET 1 OF 3

**FIG. 2**  
 -MH OPTION  
 (SAME AS FIG. 1, UNLESS OTHERWISE STATED)  
 HFEM-042-T-10.00-DP-MH SHOWN



COVERFILM		.001 [0.03] POLYIMIDE .001 [0.03] ADHESIVE
COPPER CLAD		1 oz COPPER .001 [0.03] ADHESIVE .003 [0.08] POLYIMIDE
ADHESIVE		.002 [0.05] ADHESIVE
COPPER		1 oz COPPER
ADHESIVE		.001 [0.03] ADHESIVE
COPPER CLAD		.003 [0.08] POLYIMIDE .001 [0.03] ADHESIVE 1 oz COPPER
COVERFILM		.001 [0.03] POLYIMIDE .001 [0.03] ADHESIVE
ADHESIVE		.001 [0.03] ADHESIVE
STIFFENER		STANDARD: .062 [1.57] FR4 -MH OPTION: .093 [2.36] FR4

**CROSS SECTION OF  
 FLEX & STIFFENER**

NOT TO SCALE

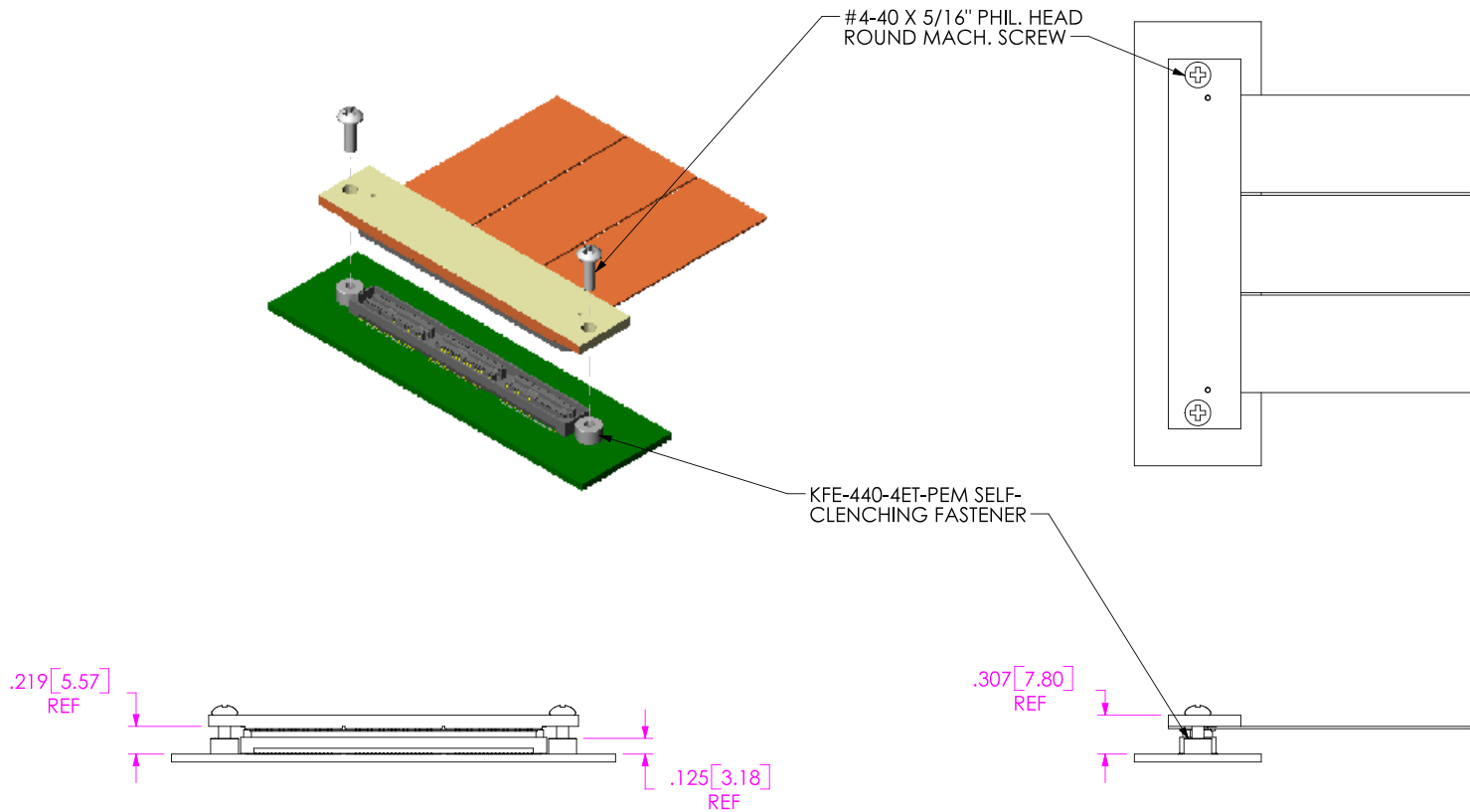
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DESCRIPTION:	HIGH SPEED FLEX 0.8mm ASSEMBLY
DWG. NO.	HFEM-XXX-T-X-XX.XX-DP-XX
BY: KEVIN B	12/31/2001 SHEET 2 OF 3

FIG. 3  
RECOMMENDED FASTENERS FOR -MH OPTION



NOTE:  
THE PEM NUT AND MACHINE SCREW (NOT SUPPLIED BY SAMTEC) SPECIFIED ON THIS PRINT WILL WORK FOR THIS APPLICATION; HOWEVER, THE CUSTOMER IS FREE TO USE OTHER HARDWARE ACCEPTABLE TO THEM AS MOST OF THIS IS COMMODITY.

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DESCRIPTION:  
HIGH SPEED FLEX 0.8mm ASSEMBLY

DWG. NO.  
HFEM-XXX-T-X-XX.XX-DP-XX

BY: KEVIN B 12/31/2001 SHEET 3 OF 3