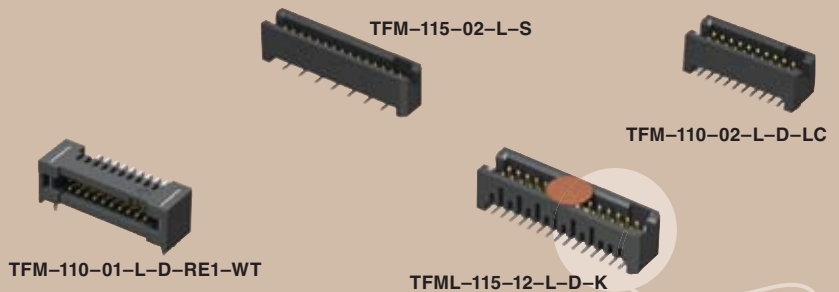


(1,27 mm) .050"

TFM, TFML SERIES



# SMT & THROUGH-HOLE HEADER

## SPECIFICATIONS

For complete specifications and recommended PCB layouts see [www.samtec.com?TFM](http://www.samtec.com?TFM) or [www.samtec.com?TFML](http://www.samtec.com?TFML)

### Insulator Material:

Black Liquid

Crystal Polymer

### Terminal Material:

Phosphor Bronze

### Plating:

Au or Sn over 50µ" (1,27 µm) Ni

### Voltage Rating:

350 VAC mated with SFM

### Operating Temp Range:

-55°C to +125°C

### RoHS Compliant:

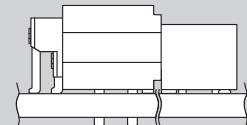
Yes



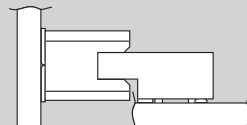
**TFM Mates with:**  
SFM, SFMC, SFSD

**TFML Mates with:**  
SFML,  
SFSD (-XL option),  
SFSDT (-XL option)

## APPLICATIONS

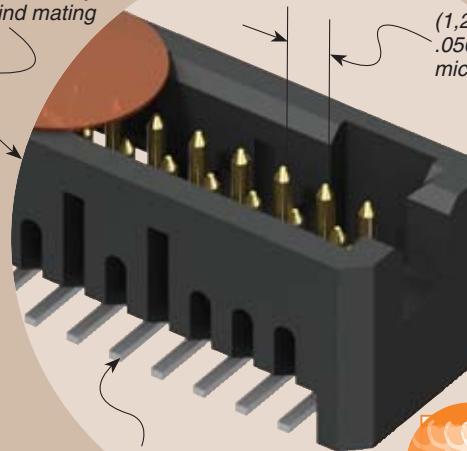


TFM-DH to SFM-DH SHOWN



TFM to SFM-SH SHOWN

Shrouded body  
for blind mating



(1,27 mm x 1,27 mm)  
.050" x .050"  
micro pitch

Surface mount or  
Through-hole tails



- Passes 10 Year MFG
- Locking option
- Locking clip option
- Weld tab option
- Screw Down option



**E.L.P.**  
EXTENDED LIFE PRODUCT

10 year Mixed Flowing Gas with 30µ" Gold  
1,000 cycles when mated with SFM

CURRENT RATING (PER CONTACT)	
AMBIENT TEMP	TFM/SFM
20°C	5A
40°C	4.5A
60°C	3.9A
95°C	2.6A

6 POSITIONS (2x3) POWERED

## Processing:

Lead-Free Solderable:

Yes

### SMT Lead Coplanarity:

(0,10 mm) .004" max (05-25)

(0,15 mm) .006" max (30-50)

## MATED HEIGHT

LEAD STYLE		MATED HEIGHT*
TFM	SFM	
−02	−02	(6,35) .250
−12		(8,13) .320
−22		(9,91) .390
−32		(11,81) .465
LEAD STYLE		MATED HEIGHT*
TFM	SFM	
−01	−01	(5,97) .235
−03		(5,97) .235
−11		(7,75) .305
−13		(7,75) .305
−21		(9,53) .375
−31		(11,43) .450

\*Processing conditions will affect mated height.

## TYPE STRIP

1

## NO. PINS PER ROW

04, 06, 08  
(TFM only)

05, 07, 10, 15, 20,  
25, 30, 35, 40, 45, 50  
(Call Samtec for other sizes)

TFM  
= Standard

TFML  
= Locking

## LEAD STYLE

Specify  
LEAD STYLE  
from chart

## PLATING OPTION

-L  
= 15µ" (0,38 µm)  
Gold on post,  
Matte Tin on tail  
(Call Samtec for  
E.L.P. plating option)

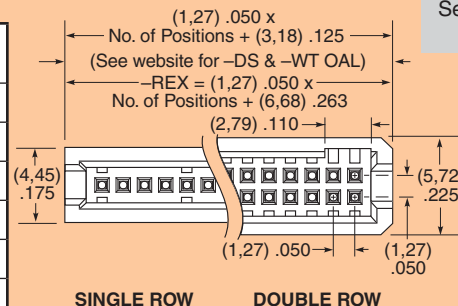
## COST-SAVING APPLICATIONS

See TFC Series for lower cost plating options.

Note: Other Gold plating options available. Contact Samtec.

LEAD STYLE (T/H)	B	C
-01	(5,59) .220	(1,97) .078
-03*	(5,59) .220	(2,77) .109
-11*	(7,37) .290	(1,97) .078
-13*	(7,37) .290	(2,77) .109
-21*	(9,14) .360	(1,97) .078
-31*	(11,05) .435	(1,97) .078

\* N/A with 07 or -S row option

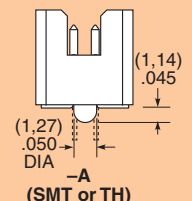


SINGLE ROW

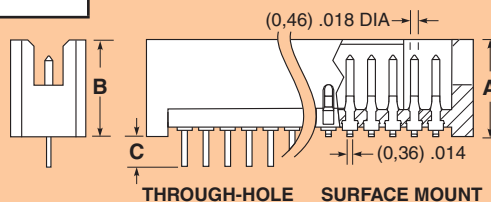
DOUBLE ROW

LEAD STYLE (SMT)	A
-02	(5,72) .225
-12*	(7,49) .295
-22*	(9,27) .365
-32*	(11,18) .440

\* N/A with 07, -DH or -S row option

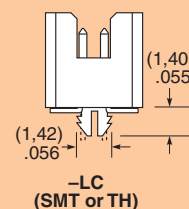


-A (SMT or TH)

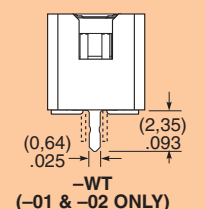


THROUGH-HOLE

SURFACE MOUNT



-LC (SMT or TH)



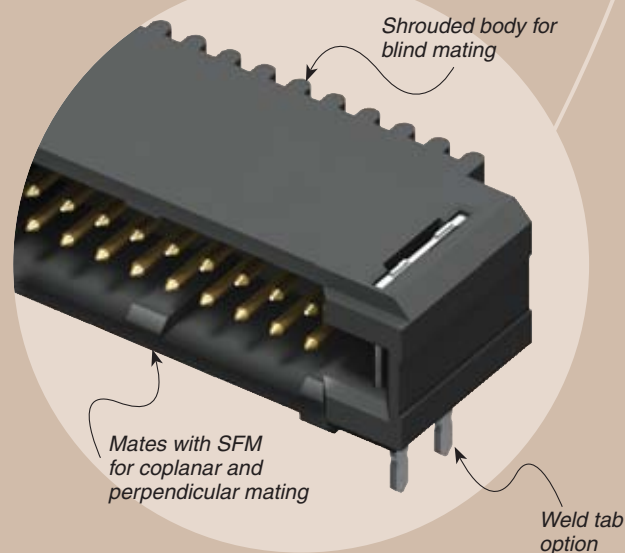
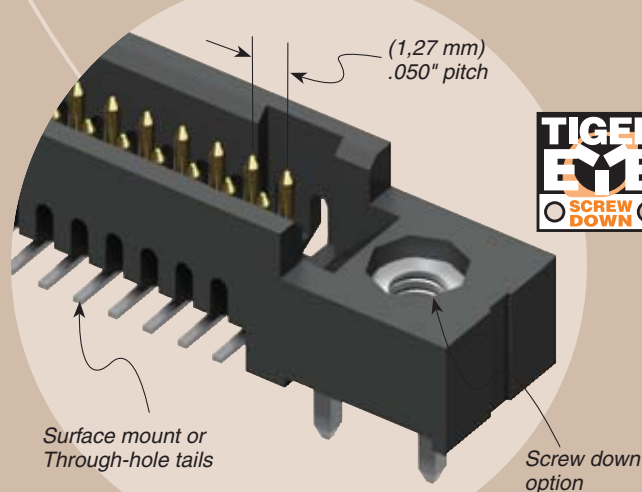
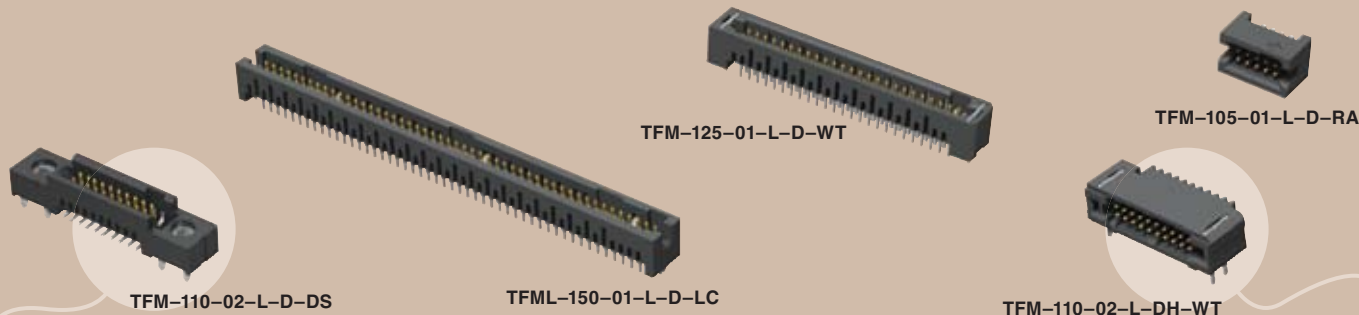
-WT (-01 &amp; -02 ONLY)

Note: Some sizes, styles and options are non-standard, non-returnable.

Due to technical progress, all designs, specifications and components are subject to change without notice.

WWW.SAMTEC.COM

SAMTEC USA • Tel: 1-800-SAMTEC-9 or 812-944-6733 SAMTEC NORTHERN CALIFORNIA • Tel: 408-395-5900 SAMTEC SOUTHERN CALIFORNIA • Tel: 1-800-726-8329  
SAMTEC AMERICA LATINA COMERCIO EXTERIOR LTDA • Tel: (+55 31) 3786 3227 SAMTEC UNITED KINGDOM • Tel: 44 01236 739292 SAMTEC GERMANY • Tel: +49 (0) 89 / 89460-0  
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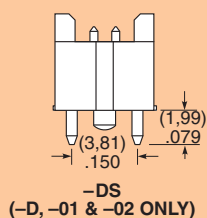
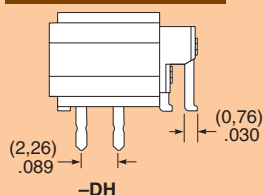


## ROW OPTION

**-S**  
= Single Row  
(TFM only)

**-D**  
= Double Row

**-DH**  
= Double Horizontal  
(TFM lead style -02 only)  
(05 thru 50 positions only)  
(-WT standard; -TR option only available)

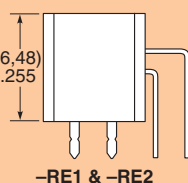
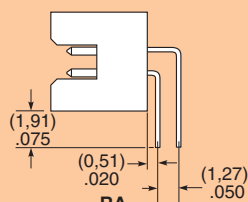


Specify only -RA, -RE1 or -RE2

**-RA**  
= Right Angle  
(Lead style -01 only)

**-RE1**  
= Right Angle Elevated for (1,58 mm) .062" PCB  
(Requires TFM lead style -01, -D row and -WT)

**-RE2**  
= Right Angle Elevated for (2,36 mm) .093" PCB  
(Requires TFM lead style -01, -D row and -WT)



## OPTION

Specify only -A, -LC, -DS or -WT  
Not available with -RA, -RE1 and -RE2 unless otherwise noted.

**-A**  
= Alignment Pin

**-LC**  
= Locking Clip  
(Manual Placement required)

**-DS**  
= Dual Screw Down for  
(1,60 mm) .062" PCB  
(05, 07, 10, 15, 20, 25, 30, 35, 40 positions only)  
(TFM lead styles -01 and -02 only)  
(Requires -D row option)  
(Mates with SFM-DS option and SFSD/SFSDT -SS and -DS option only)

**-WT**  
= Weld Tab  
(TFM lead styles -01 and -02 only)  
(Standard with -DH)  
(Mates to SFSS/SFSD -SR and -DR option only)

SMT lead styles only  
Specify only -K or -P

**-K**  
= Polyimide Film Pick & Place Pad

**-P**  
= Plastic Pick & Place Pad

Specify -TR last  
**-TR**  
= Tape & Reel  
(Not available with -DS)

## APPLICATION SPECIFIC OPTION

Solder nail option available.  
Call Samtec.

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