



**THE DATASHEET OF
SFM-120-L1-S-D-A-P**



RUGGED TIGER EYE™ SYSTEMS

(1.27 mm) .050" PITCH



MAX
3.7
A m p s

8
G b p s

FEATURES & BENEFITS

- Screw down, locking clip, friction latching and weld tab ruggedizing options
- Shrouded, polarized and keyed
- Surface mount or through-hole tails
- High-density, four row design (FOLC/MOLC Series)
- Discrete wire assemblies available in single or double row, 28 and 30 AWG PVC or *Teflon™ Fluoropolymer (See pages 238-239). Contact asp@samtec.com for custom solutions.
- Cable components (ISDF/CC03) and tooling available: samtec.com/tooling
- Severe Environment Testing qualified (SFM/TFM); aligns with MIL-DTL-55302. Visit samtec.com/set

*Teflon™ is a trademark of The Chemours Company FC, LLC used under license by Samtec.

**TIGER™
EYE**
CONTACT



IDC cable assemblies with rugged strain relief (FFSD/FFMD, FFTP/FMTP)



Locking for increased unmating force (SFML/TFML)

KEY SPECIFICATIONS

SERIES	STACK HEIGHTS	INSULATOR MATERIAL	CONTACT MATERIAL	PLATING	OPERATING TEMP RANGE	CURRENT RATING	VOLTAGE RATING	MAX. CYCLES	LEAD-FREE SOLDERABLE
SFM/TFM	6 to 12 mm	Black LCP	BeCu (SFM) Phosphor Bronze (TFM)	Au or Sn over 50 μ" (1.27 μm) Ni	-55 °C to +125 °C	3.7A per pin (2 pins powered)	275 VAC	10,000 with 30 μ" (0.76 μm) Au	Yes
SFC/TFC	6 to 12 mm	Black LCP	Phosphor Bronze	Au or Sn over 50 μ" (1.27 μm) Ni	-55 °C to +125 °C	3.1 A per pin (2 pins powered)	350 VAC	(Call Samtec for E.L.P.™ plating option)	Yes

(1.27 mm) .050" PITCH • SMT/THROUGH-HOLE SOCKET

SERIES	1	NO. PINS PER ROW	LEAD STYLE	PLATING OPTION	ROW OPTION	OPTIONS
SFM = Standard		03, 04, 06, 08 (SFM only)	(Surface Mount) (Through-hole) -02 = Tiger Eye™ Contact (BeCu) -L2 = Low Insertion Force Tiger Eye™ Contact (BeCu) -T2 = Tiger Eye™ LITE Contact (Phosphor Bronze)	-L = 10 μm (0.25 μm) Gold on contact, Matte Tin on tail (Call Samtec for E.L.P.™ plating option)	-S = Single Row (SFM only) -D = Double Row -SH = Single Horizontal (05 thru 30 positions only) (SFM only) (Lead style -02 only) -DH = Double Horizontal (05 thru 30 positions only) (SFM only) (Lead style -02 only)	Specify only -A, -LC or -DS (Not available with -DH, -SH) -A = Alignment Pin -LC = Locking Clip (Manual placement required) -DS = Dual Screw Down for (1.60 mm) .062" PCB (05 thru 40 positions only) (Lead styles -01, -02 & -03 only) (Requires -D row option) (Not available with SFML) (Mates with TFM-DS option) (Not available with -A, -LC, -K, -P, -XR) Specify only -K or -P (Lead styles -02, -L2, -T2 only) -K = Polyimide film Pick & Place Pad (Not available with -DH, -SH) -P = Plastic Pick & Place Pad (Not available with -DH, -SH) Specify -TR or -FR last; Required for -DH & -SH. (Lead styles -02, -L2 & -T2 only) -TR = Tape & Reel -FR = Full Reel Tape & Reel (must order max. quantity per reel; contact Samtec for quantity breaks)
SFML = Locking		05, 07, 10, 15, 20, 25, 30, 35, 40, 45, 50 (Standard sizes)	-01, -03 = Tiger Eye™ Contact (BeCu) -L1, -L3 = Low Insertion Force Tiger Eye™ Contact (BeCu) -T1 = Tiger Eye™ LITE Contact (Phosphor Bronze)			

SFM
Board Mates:
TFM
Cable Mates:
TFSD, TFSS

SFML
Board Mates:
TFML
Cable Mates:
TFSD



SINGLE ROW

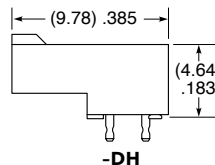


DOUBLE ROW

LEAD STYLE	A	B
-01, -L1, -T1	(3.05) .120	(0.51) .020
-03, -L3	(1.91) .075	(0.41) .016



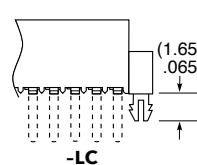
-SH



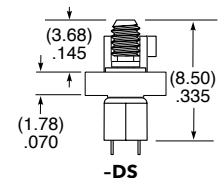
-DH



-A



-LC



-DS



Notes:
Severe Environment Testing qualified (SFM); aligns with MIL-DTL-55302. Visit samtec.com/set

Some lengths, styles and options are non-standard, non-returnable.

View complete specifications at: samtec.com?SFM & samtec.com?SFML

Looking for pricing, stock, or lifecycle information?

Click below to explore more details on WIN SOURCE:

-  [View SFM-120-L1-S-D-A-P on WIN SOURCE](#)
-  [Samtec Inc. Information](#)

Optimize Your Supply Chain with WIN SOURCE Solutions

-  Global Sourcing Solution
-  Obsolete Management
-  Cost Control Management
-  Shortage Management
-  Alternative Solution
-  Excess Inventory Management