

PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION

Part Number: [0874271203](#)
Status: **Active**
Overview: [minifit_jr](#)
Description: 4.20mm (.165") Mini-Fit Jr.™ Header, Right Angle, Nylon, without Flange, 12 Circuits, Tin (Sn) over Copper (Cu) Plating, Glow Wire Compatible

Documents:

[3D Model](#) [Product Specification PS-87427-0001 \(PDF\)](#)
[Drawing \(PDF\)](#) [RoHS Certificate of Compliance \(PDF\)](#)

Agency Certification

CSA LR19980
 UL E29179

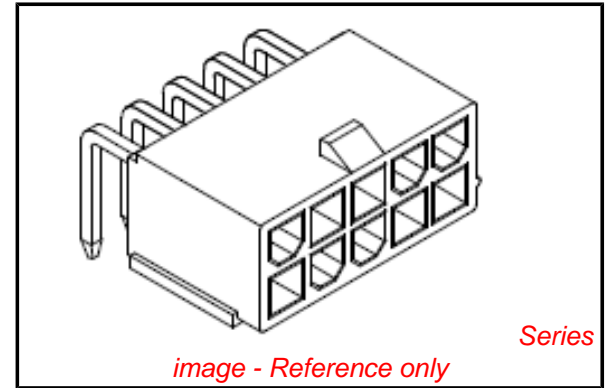
General

Product Family PCB Headers
 Series [87427](#)
 Application Wire-to-Board
 Comments Current = 13A max. per circuit when header is mated to a receptacle loaded with [45750](#) Mini-Fit Plus HCS™ Crimp Terminal Crimped to to 16 AWG wire. . See Molex product specification PS-45750-001 for additional current de-rating information.

Overview [minifit_jr](#)
 Product Name Mini-Fit Jr.™

Physical

Breakaway No
 Circuits (Loaded) 12
 Color - Resin Beige
 Durability (mating cycles max) 30
 First Mate / Last Break No
 Flammability 94V-0
 Glow-Wire Compliant Yes
 Lock to Mating Part Yes
 Material - Metal Brass
 Material - Plating Mating Tin
 Material - Plating Termination Tin
 Material - Resin Nylon
 Number of Rows 2
 Orientation Right Angle
 PC Tail Length (in) 0.130 In
 PC Tail Length (mm) 3.30 mm
 PCB Locator No
 PCB Retention None
 PCB Thickness Recommended (in) 0.062 In
 PCB Thickness Recommended (mm) 1.60 mm
 Packaging Type Tray
 Pitch - Mating Interface (in) 0.165 In
 Pitch - Mating Interface (mm) 4.20 mm
 Pitch - Term. Interface (in) 0.165 In
 Pitch - Term. Interface (mm) 4.20 mm
 Plating min: Mating (µin) 203.2
 Plating min: Mating (µm) 5.08
 Plating min: Termination (µin) 203.2
 Plating min: Termination (µm) 5.08



EU RoHS

ELV and RoHS Compliant
REACH SVHC Contains SVHC: No
Halogen-Free Status

China RoHS



Not Halogen-Free

Need more information on product environmental compliance?

Email productcompliance@molex.com
 For a multiple part number RoHS Certificate of Compliance, [click here](#)

Please visit the [Contact Us](#) section for any non-product compliance questions.

Search Parts in this Series

[87427Series](#)

Mates With

[5557](#) Mini-Fit Jr.™ Receptacle Housing

Polarized to Mating Part	Yes
Polarized to PCB	No
Shrouded	Fully
Stackable	No
Surface Mount Compatible (SMC)	No
Temperature Range - Operating	-40°C to +105°C
Termination Interface: Style	Through Hole

Electrical

Current - Maximum per Contact	13A
Voltage - Maximum	600V

Solder Process Data

Duration at Max. Process Temperature (seconds)	30
Lead-free Process Capability	SMC & Wave Capable (TH only)
Max. Cycles at Max. Process Temperature	2
Process Temperature max. C	240

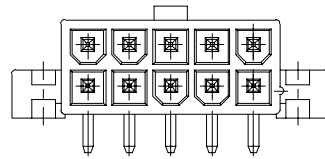
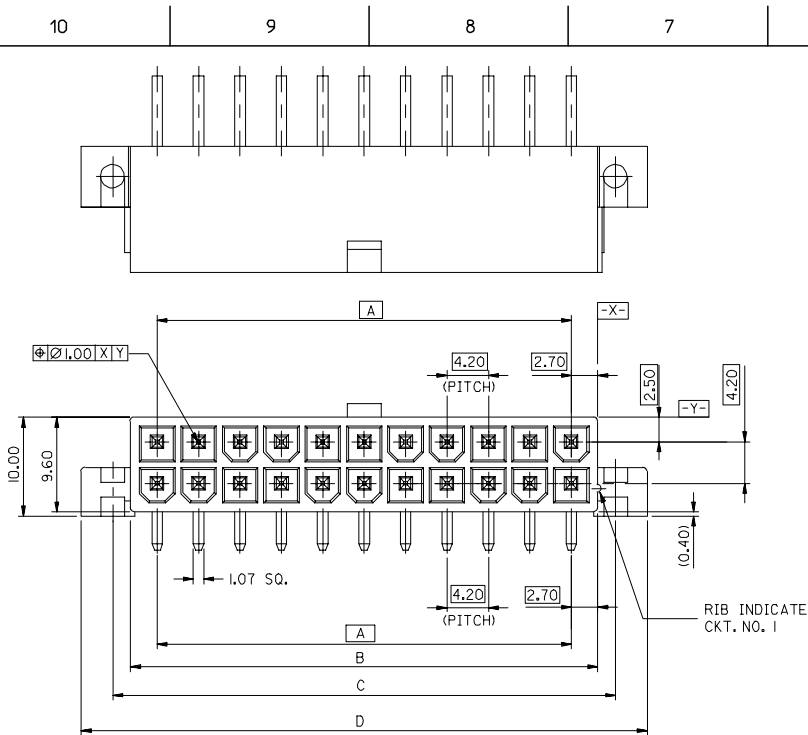
Material Info

Reference - Drawing Numbers

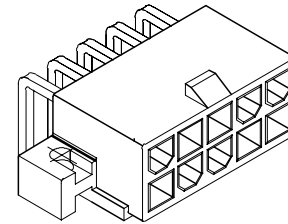
Packaging Specification	PK-87427-001
Product Specification	PS-87427-0001
Sales Drawing	SD-87427-**0*

This document was generated on 05/31/2010

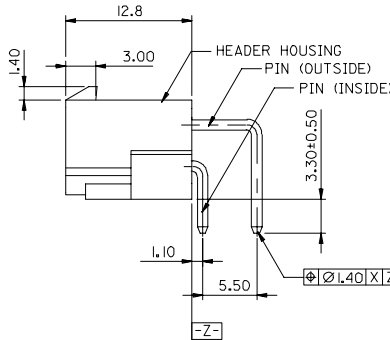
PLEASE CHECK WWW.MOLEX.COM FOR LATEST PART INFORMATION



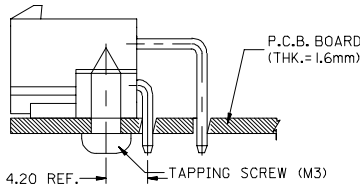
CKT. SIZE 10



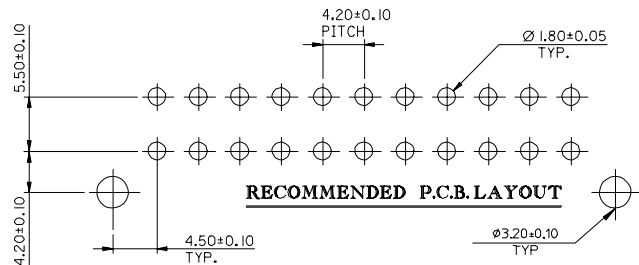
ISOMETRIC VIEW



RIB INDICATE CKT. NO. 1



RECOMMENDED INSTALLATION PATTERN



RECOMMENDED P.C.B. LAYOUT

LEGEND

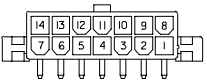
- 87427-****
- CKT. SIZE (SEE SHEET 2)
 - PLATING OPTIONS
 - 2 = NOTE 2
 - 3 = NOTE 3
 - PACKAGING OPTIONS
 - 1 = TRAY PACKED

NOTES

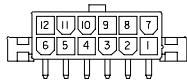
1. MATERIAL - HEADER : NYLON 46, UL94V-0, COLOR BEIGE
PIN : BRASS (1.07 SQUARE)
2. PLATING OF PIN
TIN 2.54um MIN. OVER NICKEL 1.27um MIN.
3. PLATING OF PIN
TIN 4-10um OVER COPPER 2-8um.

EC NO: 12005-0465 2005/05/13 DRWN:SSUDHIR 2005/05/16 CHKD:KPRASAD 2005/05/16 APPR:KPRASAD 2005/05/16	DESCRIPTION	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE MM ONLY	SCALE 2:1	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION																																					
		<p>▽=0</p> <p>▽C=0</p>	<table border="1"> <tr> <th></th> <th>mm</th> <th>INCH</th> </tr> <tr> <td>4 PLACES</td> <td>±---</td> <td>±---</td> </tr> <tr> <td>3 PLACES</td> <td>±---</td> <td>±---</td> </tr> <tr> <td>2 PLACES</td> <td>±0.20</td> <td>±---</td> </tr> <tr> <td>1 PLACE</td> <td>±0.20</td> <td>±---</td> </tr> <tr> <td></td> <td>ANGULAR</td> <td>±---°</td> </tr> </table>		mm	INCH	4 PLACES	±---	±---	3 PLACES	±---	±---	2 PLACES	±0.20	±---	1 PLACE	±0.20	±---		ANGULAR	±---°	<table border="1"> <tr> <td>DRAWN BY</td> <td>DATE</td> <td>TITLE</td> </tr> <tr> <td>STEVEN</td> <td>1994/06/24</td> <td>4.2MM W-T-B HIGH TEMP. RIGHT ANGLE HEADER (WITH MOUNTING FLANGES)</td> </tr> <tr> <td>CHECKED BY</td> <td>DATE</td> <td></td> </tr> <tr> <td>EDMUND</td> <td>1995/03/01</td> <td></td> </tr> <tr> <td>APPROVED BY</td> <td>DATE</td> <td></td> </tr> <tr> <td>ROY WONG</td> <td>1995/03/01</td> <td></td> </tr> <tr> <td>MATERIAL NO.</td> <td>DOCUMENT NO.</td> <td>SHEET NO.</td> </tr> <tr> <td></td> <td>SD-87427-***1*</td> <td>1 OF 2</td> </tr> </table>	DRAWN BY	DATE	TITLE	STEVEN	1994/06/24	4.2MM W-T-B HIGH TEMP. RIGHT ANGLE HEADER (WITH MOUNTING FLANGES)	CHECKED BY	DATE		EDMUND	1995/03/01		APPROVED BY	DATE		ROY WONG	1995/03/01		MATERIAL NO.	DOCUMENT NO.	SHEET NO.	
	mm	INCH																																										
4 PLACES	±---	±---																																										
3 PLACES	±---	±---																																										
2 PLACES	±0.20	±---																																										
1 PLACE	±0.20	±---																																										
	ANGULAR	±---°																																										
DRAWN BY	DATE	TITLE																																										
STEVEN	1994/06/24	4.2MM W-T-B HIGH TEMP. RIGHT ANGLE HEADER (WITH MOUNTING FLANGES)																																										
CHECKED BY	DATE																																											
EDMUND	1995/03/01																																											
APPROVED BY	DATE																																											
ROY WONG	1995/03/01																																											
MATERIAL NO.	DOCUMENT NO.	SHEET NO.																																										
	SD-87427-***1*	1 OF 2																																										
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS			SEE CHART	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION																																								

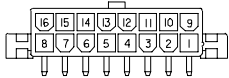
10 9 8 7 6 5 4 3 2 1



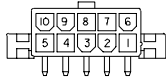
CKT.SIZE 14



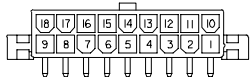
CKT.SIZE 12



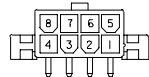
CKT.SIZE 16



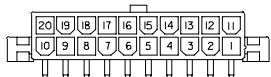
CKT.SIZE 10



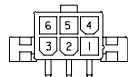
CKT.SIZE 18



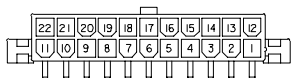
CKT.SIZE 8



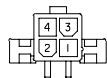
CKT.SIZE 20



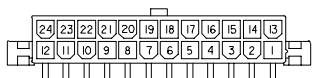
CKT.SIZE 6



CKT.SIZE 22



CKT.SIZE 4



CKT.SIZE 24



CKT.SIZE 2

61.60	55.20	51.60	46.20	87427-24 *	24
57.40	51.00	47.40	42.00	87427-22 *	22
53.20	46.80	43.20	37.80	87427-20 *	20
49.00	42.60	39.00	33.60	87427-18 *	18
44.80	38.40	34.80	29.40	87427-16 *	16
40.60	34.20	30.60	25.20	87427-14 *	14
36.40	30.00	26.40	21.00	87427-12 *	12
32.20	25.80	22.20	16.80	87427-10 *	10
28.00	21.60	18.00	12.60	87427-08 *	8
23.80	17.40	13.80	8.40	87427-06 *	6
19.60	13.20	9.60	4.20	87427-04 *	4
15.40	9.00	5.40	--	87427-02 *	2
D	C	B	A	ENG.NO. TRAY PACKED	CKT. SIZE

EC NO: I2005-0465 DRWN:SSUDHIR 2005/05/13 CHKD:KPRASAD 2005/05/16 APPR:KPRASAD 2005/05/16	QUALITY SYMBOLS ▽=0 ▽=0	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE 1:1	DESIGN UNITS METRIC	THIRD ANGLE PROJECTION		
		4 PLACES ± --- ± ---		mm INCH		DRAWN BY DATE SAMC 1996/02/05		TITLE 4.2MM W-T-B HIGH TEMP RIGHT ANGLE HEADER (WITH MOUNTING FLANGES)		
		3 PLACES ± --- ± ---		2 PLACES ± 0.20 ± ---		CHECKED BY DATE		MOLEX INCORPORATED		
		1 PLACE ± 0.20 ± ---		ANGULAR ± ---°		APPROVED BY DATE		MATERIAL NO. DOCUMENT NO. SEE CHART SD-87427-***1*		SHEET NO. 2 OF 2
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								

9 8 7 6 5 4 3 2 1