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Part Number: 0015246103

Status: Active

Description: 4.20mm (.165") Pitch Mini-Fit BMI™ Header, Dual Row, Right Angle, with Snap-in Plastic Peg PCB Lock, 10 Circuits, PA Polyamide Nylon 6/6, UL 94V-0, with Select Gold (Au) Plating

Documents:

3D Model
Drawing (PDF)
Product Specification PS-5556-002 (PDF)
RoHS Certificate of Compliance (PDF)

Series image - Reference only

Agency Certification

CSA	LR19980
UL	E29179

General

Product Family	PCB Headers
Series	42404
Application	Board-to-Board, 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 Crimpted to to 16 AWG wire. . See Molex product specification PS-45750-001 for additional current de-rating information.
Product Name	Mini-Fit BMI™

Physical

Breakaway	No
Circuits (Loaded)	10
Circuits (maximum)	10
Color - Resin	Natural (White)
Durability (mating cycles max)	30
Flammability	94V-0
Glow-Wire Compliant	No
Guide to Mating Part	Yes
Lock to Mating Part	Yes
Material - Metal	Brass
Material - Plating Mating	Gold
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	Yes
PCB Retention	Yes
PCB Thickness Recommended (in)	0.070 In
PCB Thickness Recommended (mm)	1.80 mm
Packaging Type	Tray
Pitch - Mating Interface (in)	0.165 In
Pitch - Mating Interface (mm)	4.20 mm
Plating min: Mating (µin)	30
Plating min: Mating (µm)	0.76
Plating min: Termination (µin)	100
Plating min: Termination (µm)	2.50
Polarized to Mating Part	Yes
Polarized to PCB	Yes

EU RoHS
ELV and RoHS Compliant
REACH SVHC
Not Reviewed
Halogen-Free Status
Not Reviewed

China RoHS

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
42404Series

Mates With
15-06-0101 Mini-Fit BMI™ Panel Mount Receptacle, 39-01-2105 Mini-Fit Jr.™ Receptacle, 15-24-7103 Mini-Fit BMI™ Vertical Receptacle Header

Shrouded	Partial
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)	5
Lead-free Process Capability	Wave Capable (TH only)
Max. Cycles at Max. Process Temperature	1
Process Temperature max. C	240

Material Info

Old Part Number	42404-10B5

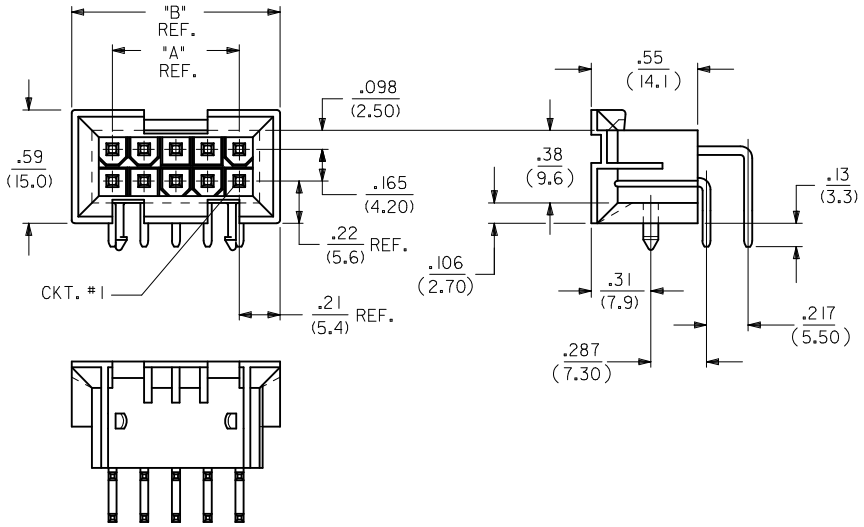
Reference - Drawing Numbers

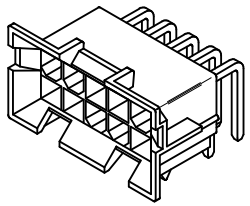
Packaging Specification	PK-42404-002
Product Specification	PS-5556-002
Sales Drawing	SDA-42404-****
Test Summary	TS-5556-002

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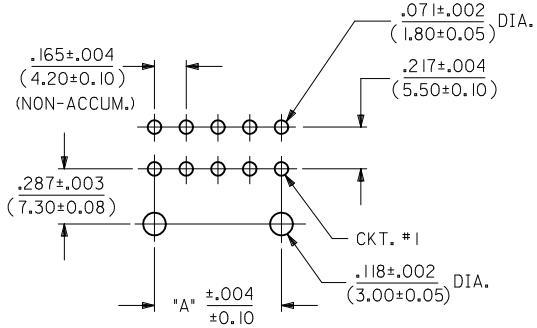
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CIRCUIT SIZE	DIM. "A"	DIM. "B"
6	.331 (8.40)	.76 (19.2)
8	.496 (12.60)	.92 (23.4)
10	.661 (16.80)	1.09 (27.6)
12	.827 (21.00)	1.25 (31.8)
14	.992 (25.20)	1.42 (36.0)
16	1.157 (29.40)	1.58 (40.2)
18	1.323 (33.60)	1.75 (44.4)
20	1.488 (37.80)	1.91 (48.6)
22	1.654 (42.00)	2.08 (52.8)
24	1.819 (46.20)	2.24 (57.0)





A-42404-****



RECOMMENDED HOLE LAYOUT FOR .070/(1.78) MAX. THICK P.C. BOARD VIEWED FROM COMPONENT SIDE

NOTES:

1) MATERIAL: HOUSING: "A" = NYLON 6/6, U.L. 94V-2, COLOR: NATURAL.
"B" = NYLON 6/6, U.L. 94V-0, COLOR: NATURAL.
TERMINAL: BRASS ALLOY 260.

2) TERMINAL PLATING:
1 = .000100/(.00254) MIN. BRIGHT TIN OVER .000050/(.00127) MIN. NICKEL OVERALL.
2 = .000030/(.00076) MIN. GOLD OVER .000050/(.00127) MIN. NICKEL OVERALL.
*3 = .000100/(.00254) MIN. MATTE TIN OVER .000050/(.00127) MIN. NICKEL OVERALL.
5 = .000030/(.00076) MIN. GOLD AND .000100/(.00254) MIN. MATTE TIN OVER .000050/(.00127) MIN. NICKEL OVERALL.
*THE PRIMARY SHIPPING CARTON WILL BE LABELED "COMPLIANT TO RoHS DIRECTIVE 2002/95/EC AND ELV ANNEX II OF DIRECTIVE 2000/53/EC." CARTONS WITHOUT THIS LABEL MAY CONTAIN PRODUCT WITH TIN-LEAD PLATING.

3) PRODUCT SPECIFICATION AND PROCESSING PARAMETERS: SEE PS-5556-002
4) PACKAGING SPECIFICATION: PK-42404-002.
5) 4-24 CKT. PARTS MATE WITH MINI-FIT JR. RECEPTACLES #5557, #42385 AND #42474. 2 CKT. PART MATES WITH #42385 AND #42474 ONLY.
6) PART ALLOWS FOR UP TO .100/(2.54) MISALIGNMENT WITH MATING RECEPTACLE IN ANY DIRECTION. SEE MATING CONNECTOR DRAWINGS FOR SPECIFIC ALLOWANCES.
7) CONNECTOR ASSEMBLIES ARE NOT TO BE MATED OR UNMATED WHILE CIRCUITS ARE LIVE.
8) A MAXIMUM TOLERANCE OF .050/(1.27) ALLOWS FOR 2 POINTS OF ELECTRICAL CONTACT. A MAXIMUM TOLERANCE OF .020/(.51) ALLOWS FOR 4 POINTS OF CONTACT.
9) DISCOLORATION IN THE BANDOLIER CARRIER AREA OF THE PIN IS INHERENT TO THE PLATING PROCESS AND IS DUE TO THE MASKING EFFECT OF THE CARRIER. THIS DISCOLORATION IS IN A NON-FUNCTIONAL AREA OF THE PIN AND WILL NOT AFFECT THE PERFORMANCE OF THE HEADER ASSEMBLY.
10) PART IS NOT DESIGNED FOR CURRENT SHARING.
11) PART IS NOT INTENDED TO PROVIDE ANY ALIGNMENT OF CUSTOMER COMPONENTS OR MODULES, SUCH AS POWER SUPPLIES AND CHASSIS.
12) PARTS CONFORM TO CLASS 'B' REQUIREMENTS OF COSMETIC SPECIFICATION PS-45499-002."

LEGEND:

A-42404-****

BASE NUMBER:
CKT. SIZE: (02-24)
HOUSING MAT'L: (SEE NOTE 1)
TERMINAL PLATING: (SEE NOTE 2)

-**B2, _**B4	42474-**21, 5556-PBGS*P	94V-0	PHOS. BRZ.	GOLD
-**A2, _**A4	42474-**11, 5556-PBGS*P	94V-2		
-**B1, _**B3	42474-**21, 5556-PBS*P	94V-0		TIN
-**A1, -**A3	42474-**11, 5556-PBS*P	94V-2		
-**B2, _**B4	42474-**21, 5556-GS*P	94V-0	BRASS	GOLD
-**A2, _**A4	42474-**11, 5556-GS*P	94V-2		
-**B1, _**B3	42474-**21, 5556-S*P	94V-0		TIN
-**A1, -**A3	42474-**11, 5556-S*P	94V-2		
-**B2, _**B4	A-42385-**D2	94V-0	PHOS. BRZ.	GOLD
-**A2, _**A4	A-42385-**C2	94V-2		
-**B1, _**B3	A-42385-**D1	94V-0		TIN
-**A1, -**A3	A-42385-**C1	94V-2		
-**B2, _**B4	A-42385-**B2	94V-0	BRASS	GOLD
-**A2, _**A4	A-42385-**A2	94V-2		
-**B1, _**B3	A-42385-**B1	94V-0		TIN
-**A1, -**A3	A-42385-**A1	94V-2		

R.A. HEADER	MATING CONNECTOR	HSG. MAT'L.	TERM. MAT'L.	PLATING
A-42404		MATING CONNECTOR FEATURES		

REV	DESCRIPTION
R2	REVISE NOTES EC NO: UCP2010-0864 2010/01/18 DRWN: JJAGUILAR 2010/01/06 CHKD: JBELL 2010/03/16 APPR: FSMITH 2010/03/16
4	R
3	R2
2	R
1	R2
SHT	REV.

QUALITY SYMBOLS
▼=0
▽(C)=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± .010
2 PLACES	± 0.25	± .015
1 PLACE	± 0.38	± ---
ANGULAR ±1/2°		

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: IN/MM
SCALE: 1:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

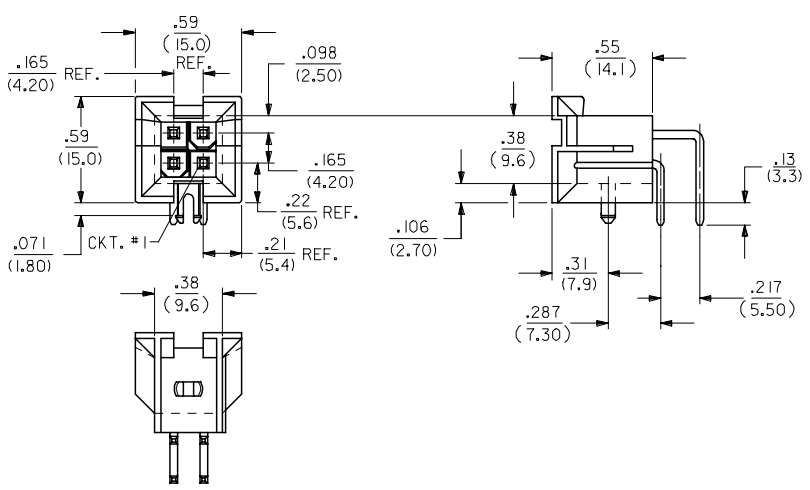
		DATE
DRAWN BY	RWK	2/7/89
CHECKED BY	RJF	2/7/89
APPROVED BY	FSMITH	2010/03/16

TITLE: MINI-FIT JR. 2-24 CKT RIGHT ANGLE HEADER ASSY (BLIND MATE)

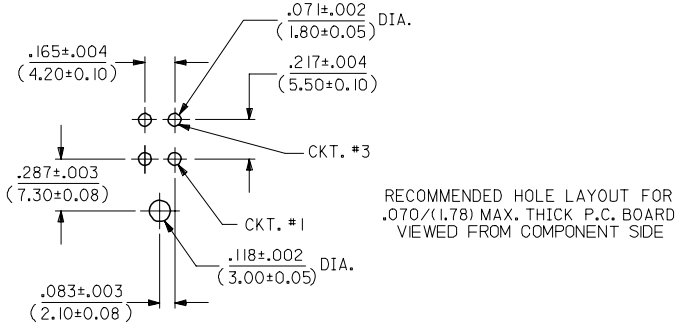
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MATERIAL NO.: SEE SHTS 3&4
DOCUMENT NO.: SDA-42404-****
SHEET NO.: 1 OF 4
SIZE: C

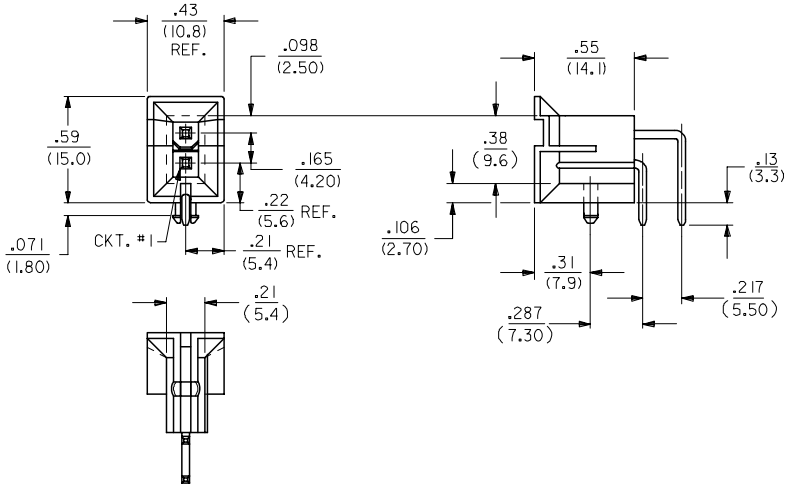
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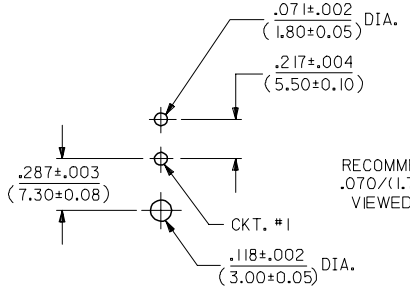
A-42404-04**



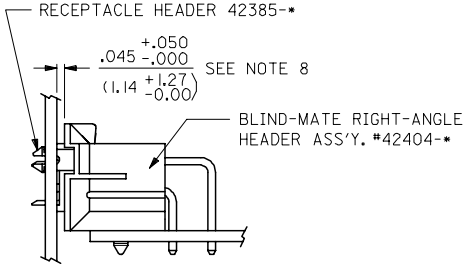
RECOMMENDED HOLE LAYOUT FOR .070/(1.78) MAX. THICK P.C. BOARD VIEWED FROM COMPONENT SIDE



A-42404-02**



RECOMMENDED HOLE LAYOUT FOR .070/(1.78) MAX. THICK P.C. BOARD VIEWED FROM COMPONENT SIDE



SEE SHEET 1
EC NO: UCP2006-1780 2006/02/03
DRWN:ADRAINOL 2006/02/03
CH'KD:GPOLGAR 2006/02/06
APPR:JCOMERCI
DESCRIPTION
REV
R

QUALITY SYMBOLS
▼=0
▽=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± .01
2 PLACES	± 0.25	± .015
1 PLACE	± 0.38	± ---

ANGULAR ±1/2°

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: IN/MM
SCALE: 2:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION

DRAWN BY	RWK
DATE	1989/02/07
CHECKED BY	RJF
DATE	1989/02/07
APPROVED BY	RAS
DATE	1989/02/07

TITLE: MINI-FIT JR. 2-24 CKT RIGHT ANGLE HEADER ASSY (BLIND MATE)

MOLEX INCORPORATED

MATERIAL NO.: SEE SHTS 3&4
DOCUMENT NO.: SDA-42404-****
SHEET NO.: 2 OF 4
SIZE: C

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PART NUMBER	ENG. NUMBER	CKT. SIZE	HOUSING MATERIAL	PLATING (NOTE 5)	PART NUMBER	ENG. NUMBER	CKT. SIZE	HOUSING MATERIAL	PLATING (NOTE 5)
NOT TOOLED	A-42404-02A5	02	94V-2	SELECT GOLD OVER NICKEL	NOT TOOLED	A-42404-02B5	02	94V-0	SELECT GOLD OVER NICKEL
15-24-9047	A-42404-04A5	04			15-24-6043	A-42404-04B5	04		
15-24-9067	A-42404-06A5	06			15-24-6063	A-42404-06B5	06		
NOT TOOLED	A-42404-08A5	08			NOT TOOLED	A-42404-08B5	08		
15-24-9107	A-42404-10A5	10			15-24-6103	A-42404-10B5	10		
NOT TOOLED	A-42404-12A5	12			NOT TOOLED	A-42404-12B5	12		
15-24-9147	A-42404-14A5	14			15-24-6143	A-42404-14B5	14		
NOT TOOLED	A-42404-16A5	16			15-24-6163	A-42404-16B5	16		
15-24-9187	A-42404-18A5	18			15-24-6183	A-42404-18B5	18		
NOT TOOLED	A-42404-20A5	20			NOT TOOLED	A-42404-20B5	20		
NOT TOOLED	A-42404-22A5	22			NOT TOOLED	A-42404-22B5	22		
15-24-9247	A-42404-24A5	24	94V-2	SELECT GOLD OVER NICKEL	15-24-6243	A-42404-24B5	24	94V-0	SELECT GOLD OVER NICKEL
		02					02		
		04					04		
		06					06		
		08					08		
		10					10		
		12					12		
		14					14		
		16					16		
		18					18		
		20					20		
		22					22		
		24					24		
		02					02		
		04					04		
		06					06		
		08					08		
		10					10		
		12					12		
		14					14		
		16					16		
		18					18		
		20					20		
		22					22		
		24					24		
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		18					18		
		20					20		
		22					22		
		24					24		
		02					02		
		04					04		
		06					06		
		08					08		
		10					10		
		12					12		
		14					14		
		16					16		
		18					18		
		20					20		
		22					22		
		24					24		

SEE SHEET 1

EC NO: UCP2006-1780

R	DRWN:ADRATNOL	2006/02/03
	CH'KD:GPOLGAR	2006/02/03
	APPR: JCOMERCI	2006/02/06

REV	DESCRIPTION

QUALITY SYMBOLS: ▽=0 ◀=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	INCH	mm
4 PLACES	± ---	± ---
3 PLACES	± ---	± ---
2 PLACES	± ---	± ---
1 PLACE	± ---	± ---
ANGULAR ±1/2°		

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: IN/MM

		DATE
DRAWN BY	ADRATNOL	2006/02/01
CHECKED BY	GPOLGAR	2006/02/01
APPROVED BY	JCOMERCI	2006/02/01

SIZE: C

MATERIAL NO.: SEE CHARTS

SCALE: ---

DESIGN UNITS: METRIC

THIRD ANGLE PROJECTION

TITLE: MINI-FIT JR. 2-24 CKT RIGHT ANGLE HEADER ASSY (BLIND MATE)

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DOCUMENT NO.: SDA-42404-****

SHEET NO.: 4 OF 4

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lb_frame_C_P_ME_T
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