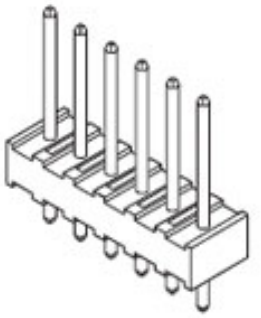
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This document was generated on 05/24/2010

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Part Number: 0010451041
Status: Active
Overview: kk
Description: 5.08mm (.200") Pitch KK® Header, Vertical, Round Pin, 4 Circuits, Gold (Au) Plating, Pin Length 19.05mm (.750")



Series image - Reference only

Documents:

3D Model
Drawing (PDF)
Product Specification PS-99020-0087 (PDF)
RoHS Certificate of Compliance (PDF)

Agency Certification

CSA	LR19980
UL	E29179

General

Product Family	PCB Headers
Series	3003
Application	Board-to-Board, Wire-to-Board
Overview	kk
Product Name	KK®

Physical

Breakaway	No
Circuits (Loaded)	4
Circuits (maximum)	4
Color - Resin	Natural
Durability (mating cycles max)	25
First Mate / Last Break	No
Flammability	94V-2
Glow-Wire Compliant	No
Guide to Mating Part	No
Keying to Mating Part	None
Lock to Mating Part	None
Material - Metal	Brass
Material - Plating Mating	Tin
Material - Plating Termination	Tin
Material - Resin	Nylon
Number of Rows	1
Orientation	Vertical
PC Tail Length (in)	0.155 In
PC Tail Length (mm)	3.94 mm
PCB Locator	No
PCB Retention	None
PCB Thickness Recommended (in)	0.062 In
PCB Thickness Recommended (mm)	1.60 mm
Packaging Type	Bag
Pitch - Mating Interface (in)	0.200 In
Pitch - Mating Interface (mm)	5.08 mm
Pitch - Term. Interface (in)	0.200 In
Pitch - Term. Interface (mm)	5.08 mm
Plating min: Mating (µin)	20
Plating min: Mating (µm)	.5
Plating min: Termination (µin)	30
Plating min: Termination (µm)	.76
Polarized to Mating Part	No
Polarized to PCB	No

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

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
3003Series

Mates With
KK® Crimp Terminal Housing 3001 , 5058

Shrouded	No
Stackable	No
Surface Mount Compatible (SMC)	No
Temperature Range - Operating	0°C to +50°C
Termination Interface: Style	Through Hole

Electrical

Current - Maximum per Contact	7A
Voltage - Maximum	250V

Solder Process Data

Lead-free Process Capability	Wave Capable (TH only)

Material Info

Old Part Number	3003-04AG

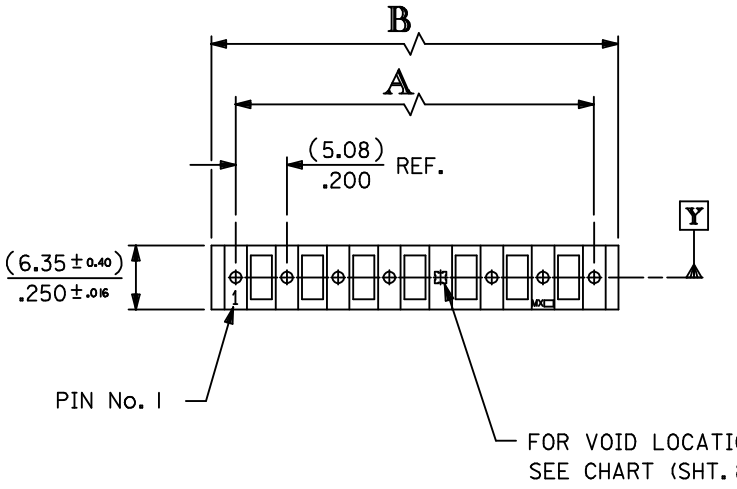
Reference - Drawing Numbers

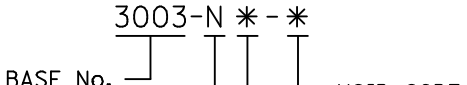
Product Specification	PS-99020-0087
Sales Drawing	SDAE-3003-N*

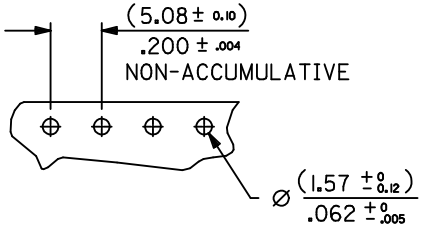
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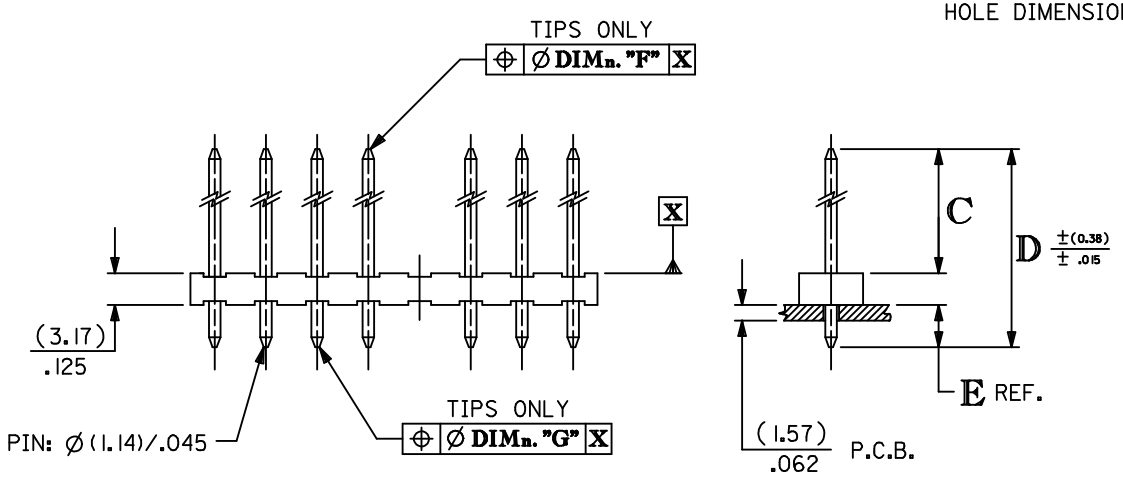
SEE CHART SDAE-3003-N*







RECOMMENDED P.C.B. HOLE DIMENSIONS



No. OF CCTS.	DIMn. A	DIMn. B
2	(5.08 ± 0.05) .200 ± .002	(9.91 ± 0.15) .390 ± .006
3	(10.16 ± 0.08) .400 ± .003	(14.99 ± 0.15) .590 ± .006
4	(15.24 ± 0.08) .600 ± .003	(20.07 ± 0.18) .790 ± .007
5	(20.32 ± 0.08) .800 ± .003	(25.15 ± 0.20) .990 ± .008
6	(25.40 ± 0.10) 1.000 ± .004	(30.23 ± 0.23) 1.190 ± .009
7	(30.48 ± 0.13) 1.200 ± .005	(35.31 ± 0.25) 1.390 ± .010
8	(35.56 ± 0.20) 1.400 ± .008	(40.39 ± 0.28) 1.590 ± .011
9	(40.64 ± 0.20) 1.600 ± .008	(45.47 ± 0.30) 1.790 ± .012
10	(45.72 ± 0.20) 1.800 ± .008	(50.55 ± 0.30) 1.990 ± .012
11	(50.80 ± 0.20) 2.000 ± .008	(55.63 ± 0.33) 2.190 ± .013
12	(55.88 ± 0.25) 2.200 ± .010	(60.71 ± 0.33) 2.390 ± .013
13	(60.96 ± 0.25) 2.400 ± .010	(65.79 ± 0.36) 2.590 ± .014
14	(66.04 ± 0.25) 2.600 ± .010	(70.87 ± 0.36) 2.790 ± .014
15	(71.12 ± 0.35) 2.800 ± .014	(75.95 ± 0.42) 2.990 ± .017
16	(76.20 ± 0.35) 3.000 ± .014	(81.03 ± 0.42) 3.190 ± .017
17	(81.28 ± 0.40) 3.200 ± .016	(86.11 ± 0.51) 3.390 ± .020
18	(86.36 ± 0.40) 3.400 ± .016	(91.19 ± 0.53) 3.590 ± .021
19	(91.44 ± 0.50) 3.600 ± .020	(96.27 ± 0.53) 3.790 ± .021
20	(96.52 ± 0.50) 3.800 ± .020	(101.35 ± 0.53) 3.990 ± .021

NOTES:

1. MATERIAL: WAFER, NYLON, 94V-2, COLOUR - NATURAL PINS, BRASS (FOR PLATING SEE CHARTS)
2. FOR DIMns. "A","B","C","D","E","F" AND VERSIONS, SEE CHARTS ON SHEET 2 & SUBSEQUENT SHEETS.
3. FOR VERSIONS WITH VOIDS SEE SHEET 8.
4. PIN PUSH OUT FORCE: (1.36Kg)/3lbs MIN.
5. PIN MUST MEET MOLEX SOLDERABILITY SPEC. ES-152.
6. MAX BOW (0.38)/.015 OVER (25.4)/1.00

ADD PART NO SHT 7
EC NO: E2009-0320 2009/04/03
DRWN: BMAGUIRE 2009/04/03
CHKD:
APPR: BMAGUIRE 2009/04/06
DESCRIPTION
REV
BM

QUALITY SYMBOLS
▼=0
Ⓒ=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

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

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

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

DRAWN BY DATE
CHECKED BY DATE
APPROVED BY DATE

TITLE: 5.08 MM KK HDR VT RPIN

molex MOLEX INCORPORATED

MATERIAL NO.: SEE TABLES
DOCUMENT NO.: SDAE-3003-N*
SHEET NO.: 1 OF 00
SIZE: A3

THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION

SEE CHART SDAE-3003-N*

INDEX: FOR FULL DIMENSIONS SEE RELEVANT SHEET.

ENG. No.	PLATING	DIM. C	DIM. D	SHT. No.
AE-3003-NA	(102)	(11.94)/.470	(19.05)/.750	3
AE-3003-NAG	(501)			6
AE-3003-NA(503)	(503)			6
AE-3003-NB	(102)	(16.69)/.657	(23.80)/.937	3
AE-3003-NC	(102)	(23.04)/.907	(30.48)/1.200	3
AE-3003-NCG	(501)			6
AE-3003-ND	(102)	(27.81)/1.095	(34.92)/1.375	3
AE-3003-NDG	(501)			6
AE-3003-NF	(102)	(32.56)/1.282	(39.68)/1.562	3
AE-3003-NFG	(501)			6
AE-3003-NI	(102)	(13.51)/.532	(20.32)/.800	4
AE-3003-NJ	(102)	(21.46)/.845	(28.58)/1.125	4
AE-3003-NK	(102)	(18.29)/.720	(25.40)/1.000	4
AE-3003-NS	(501)			7
AE-3003-NM	(102)	(11.89)/.468	(23.80)/.937	4
AE-3003-NU	(102)	(11.18)/.440	(17.45)/.687	4
AE-3003-NV	(102)	(11.94)/.470	(18.29)/.720	5
AE-3003-NY	(102)	(10.90)/.430	(17.45)/.687	5

FOR VOID VERSIONS SEE SHEET 8.

DOCUMENT ERROR
EC NO: E2009-0513
DRWN: BMAGUIRE 2009/04/07
CHKD: 2009/04/07
APPR: BMAGUIRE 2009/04/07
DESCRIPTION
BM
REV

QUALITY SYMBOLS
▼=0
Ⓒ=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

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

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE: MM ONLY
SCALE: 1:1
DESIGN UNITS: METRIC
THIRD ANGLE PROJECTION
DRAWN BY DATE
CHECKED BY DATE
APPROVED BY DATE
TITLE: 5.08 MM KK HDR VT RPIN
MOLEX INCORPORATED
MATERIAL NO.: SEE CHART
DOCUMENT NO.: SDAE-3003-N*
SHEET NO.: 2 OF 08
SIZE: A3

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PART NO. SEE CHART
DWG. NO. SDAE-3003-N ✱

ENG. NO.	AE-3003-NAG		AE-3003-NA(503)		AE-3003-NCG		AE-3003-NDG		AE-3003-NFG	
DIMN. "C"	(11.94 ±0.51) .470 ±.020		(11.94 ±0.51) .470 ±.020		(23.04 ±0.51) .907 ±.020		(27.81 ±0.51) 1.095 ±.020		(32.56 ±0.51) 1.282 ±.020	
DIMN. "D"	(19.05) / .750		(19.05) / .750		(30.48) / 1.200		(34.92) / 1.375		(39.68) / 1.562	
DIMN. "E"	(3.94) / .155		(3.94) / .155		(4.27) / .168		(3.94) / .155		(3.94) / .155	
DIMN. "F"	(1.02) / .040		(1.02) / .040		(1.02) / .040		(1.02) / .040		(1.02) / .040	
DIMN. "G"	(1.02) / .040		(1.02) / .040		(1.02) / .040		(1.02) / .040		(1.02) / .040	
PLATING	(501) GOLD (0.5uM)/.000020 MIN. OVER NICKEL (0.76uM)/.000030 MIN.		(503) GOLD (0.76uM)/.000030 MIN. OVER NICKEL (1.27uM)/.000050 MIN.		(501) GOLD (0.5uM)/.000020 MIN. OVER NICKEL (0.76uM)/.000030 MIN.		(501) GOLD (0.5uM)/.000020 MIN. OVER NICKEL (0.76uM)/.000030 MIN.		(501) GOLD (0.5uM)/.000020 MIN. OVER NICKEL (0.76uM)/.000030 MIN.	
NO. OF CIRCUITS	PART NO.	ENG NO.			PART NO.	ENG NO.	PART NO.	ENG NO.	PART NO.	ENG NO.
2	10-45-1021	AE-3003-2AG	NOT TOOLED	AE-3003-2A(503)	10-45-1025	AE-3003-2CG	10-45-1024	AE-3003-2DG	38-00-2482	AE-3003-2FG
3	-1031	-3AG		-3A(503)	-1035	-3CG	-1034	-3DG	-2483	-3FG
4	-1041	-4AG		-4A(503)	-1045	-4CG	-1044	-4DG	-2484	-4FG
5	-1051	-5AG		-5A(503)	-1055	-5CG	-1054	-5DG	-2485	-5FG
6	-1061	-6AG		-6A(503)	-1065	-6CG	-1064	-6DG	-2486	-6FG
7	-1071	-7AG		-7A(503)	-1075	-7CG	-1074	-7DG	-2487	-7FG
8	-1081	-8AG		-8A(503)	-1085	-8CG	-1084	-8DG	-2488	-8FG
9	-1091	-9AG		-9A(503)	-1095	-9CG	-1094	-9DG	-2489	-9FG
10	-1101	-10AG		-10A(503)	-1105	-10CG	-1104	-10DG	-2490	-10FG
11	-1111	-11AG		-11A(503)	-1115	-11CG	-1114	-11DG	-2491	-11FG
12	-1121	-12AG		-12A(503)	-1125	-12CG	-1124	-12DG	-2492	-12FG
13	-1131	-13AG		-13A(503)	-1135	-13CG	-1134	-13DG	-2493	-13FG
14	-1141	-14AG		-14A(503)	-1145	-14CG	-1144	-14DG	-2494	-14FG
15	-1151	-15AG		-15A(503)	-1155	-15CG	-1154	-15DG	-2495	-15FG
16	-1161	-16AG		-16A(503)	-1165	-16CG	-1164	-16DG	-2496	-16FG
17	-1171	-17AG		-17A(503)	-1175	-17CG	-1174	-17DG	-2497	-17FG
18	-1181	-18AG		-18A(503)	-1185	-18CG	-1184	-18DG	-2498	-18FG
19	-1191	-19AG		-19A(503)	-1195	-19CG	-1194	-19DG	-2499	-19FG
20	10-45-1201	AE-3003-20AG	NOT TOOLED	AE-3003-20A(503)	10-45-1205	AE-3003-20CG	10-45-1204	AE-3003-20DG	38-00-2500	AE-3003-20FG
			SEE VOIDS							

FOR PREVIOUS DRAWING ISSUES SEE MRI.

BK SEE SHEET 1.

LTR	REVISIONS

THIRD ANGLE PROJECTION

REVISE ONLY ON CAD SYSTEM | SH. | REV.

DIMENSIONS SHOWN (METRIC) INCH

UNLESS OTHERWISE SPECIFIED TOLERANCES: ANGULAR ±2°

	INCH	(METRIC)
3 PLACE	± .	
2 PLACE	± .	±
1 PLACE		±

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DESIGN DIMENSION (PRIMARY) ☒ (MM) ☐ IN.

EQUIVALENT DIMENSION (SECONDARY) ☐ (MM) ☒ IN.

DRWG BY: GCH

CHK'D BY:

APP'D BY:

SCALE:

CADCAM FILENAME SA3003X6 DGN

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TITLE: 5.08 mm KK Hdr Vt RPin

molex MOLEX EUROPE

SHEET NO. 60F

DATE 29/8 /86

PART NO. SEE CHART

DWG NO. SDAE-3003-N ✱

SIZE B

7132-1283