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Part Number: [0877594251](#)
Status: **Active**
Overview: milligrid
Description: 2.00mm (.079") Pitch Milli-Grid™ Header, Surface Mount, Vertical, 42 Circuits, 0.38µm (30µ") Gold (Au) Selective Plating, without Press-fit Plastic Pegs, Lead-free

Documents:

[3D Model](#) [Product Specification PS-87761-100 \(PDF\)](#)
[Drawing \(PDF\)](#) [RoHS Certificate of Compliance \(PDF\)](#)

Agency Certification

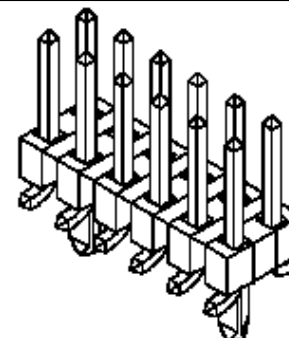
UL E29179

General

Product Family PCB Headers
 Series [87759](#)
 Application Board-to-Board
 Overview [milligrid](#)
 Product Name Milli-Grid™

Physical

Breakaway Yes
 Circuits (Loaded) 42
 Circuits (maximum) 42
 Color - Resin Black
 Durability (mating cycles max) 100
 First Mate / Last Break No
 Flammability 94V-0
 Glow-Wire Compliant No
 Guide to Mating Part No
 Keying to Mating Part None
 Lock to Mating Part None
 Mated Height (in) 0.150 In
 Mated Height (mm) 3.80 mm
 Material - Metal Phosphor Bronze
 Material - Plating Mating Gold
 Material - Plating Termination Tin
 Material - Resin High Temperature Thermoplastic
 Number of Rows 2
 Orientation Vertical
 PCB Locator Yes
 PCB Retention None
 Packaging Type Tube
 Pitch - Mating Interface (in) 0.079 In
 Pitch - Mating Interface (mm) 2.00 mm
 Pitch - Term. Interface (in) 0.079 In
 Pitch - Term. Interface (mm) 2.00 mm
 Plating min: Mating (µin) 30
 Plating min: Mating (µm) 0.76
 Polarized to Mating Part No
 Polarized to PCB No
 Shrouded No
 Stackable Yes
 Temperature Range - Operating -55°C to +105°C
 Termination Interface: Style Surface Mount



Series

image - Reference only

EU RoHS

ELV and RoHS Compliant
REACH SVHC Contains SVHC: No
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

[87759Series](#)

Mates With

[79107](#) Milli-Grid™ Receptacle, Vertical, Through Hole. [79108](#) Milli-Grid™ Flex-to-Board, Vertical Receptacle. Milli-Grid™ Receptacle, Surface Mount. [79109](#). [87381](#)

Electrical

| | |
|-------------------------------|------|
| Current - Maximum per Contact | 2A |
| Voltage - Maximum | 125V |

Solder Process Data

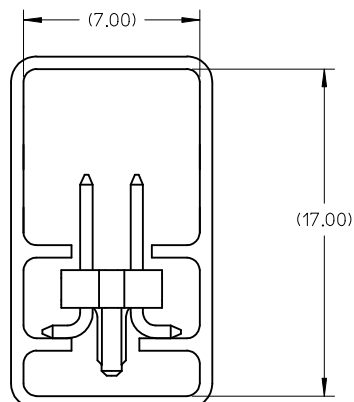
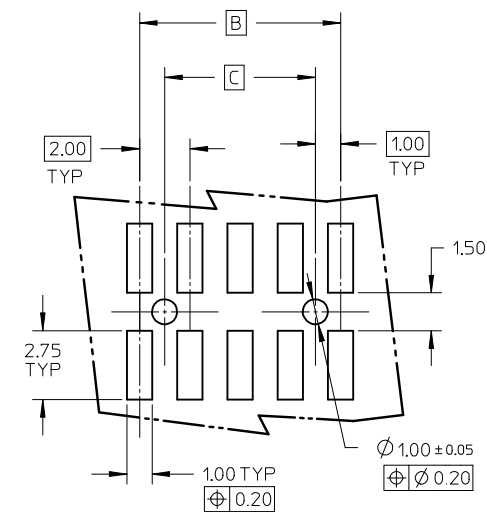
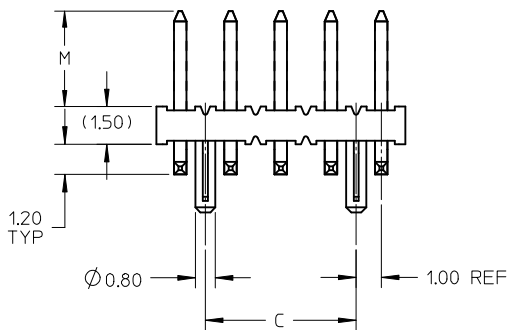
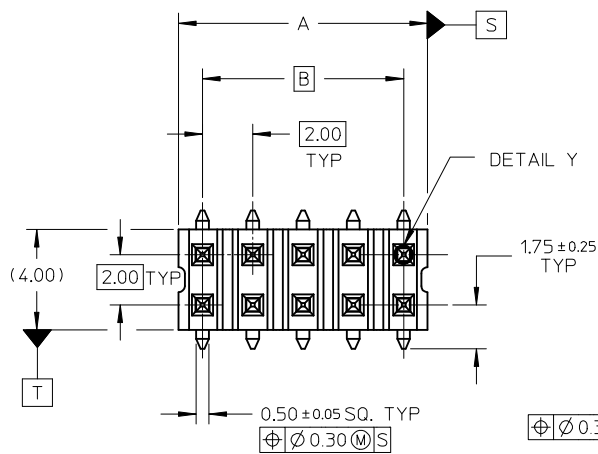
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|------------------------------|---------------------------|
| Lead-free Process Capability | Reflow Capable (SMT only) |
| Process Temperature max. C | 250 |

Material Info**Reference - Drawing Numbers**

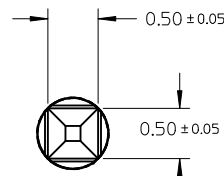
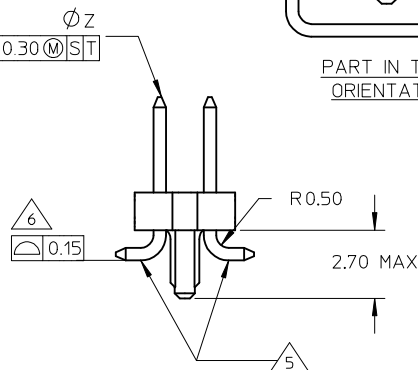
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|-------------------------|--------------|
| Packaging Specification | PK-89990-475 |
| Product Specification | PS-87761-100 |
| Sales Drawing | SD-87759-113 |

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PART IN TUBE ORIENTATION



DETAIL Y

NOTE:

1. MATERIAL:

HSG - HIGH TEMPERATURE THERMOPLASTIC,
UL 94V-0, COLOUR BLACK

PIN - 0.50 SQ PHOSPHOR BRONZE

2. PLATING:

**50 / **52 - 0.38um MIN GOLD PLATE AT CONTACT AREA,
TIN PLATE AT SOLDER AREA,
BOTH OVER NICKEL UNDERPLATE

**51 - 0.76um MIN GOLD PLATE AT CONTACT AREA,
TIN PLATE AT SOLDER AREA,
BOTH OVER NICKEL UNDERPLATE

(** - REPRESENTS DIFFERENT CKT SIZE . SEE TABLE AT SHT 2)

3. PIN PUSHOUT FORCE: 1KG MIN IN EITHER DIRECTION

4. PRODUCT SPEC PS-87761-100 APPLIES.

5 BEND DEPRESSION IS ACCEPTABLE SO LONG AS IT DOES NOT AFFECT THE OVERALL COPLANARITY OF TAIL.

6 COPLANARITY IS TO BE MEASURED BY RESTING THE SOLDER TAIL ON A FLAT SURFACE.

7. FOR ILLUSTRATION PURPOSES, 10CKT IS SHOWN

8. TUBE LENGTH IS 560MM REF STANDARD.

9. RECOMMENDED PCB BOARD THK IS 1.60±0.10 MM.

| | | | | | | | | | |
|---|-------------------------------|---------------------------------------|----------------------|---|---------------------|-------------------------------|------------------------|---|----------------------------|
| PDR#S-001876-00-00 EC NO: S2009-0182 DRWN:SKANG 2008/09/24 CHKD:ATSEE 2008/09/24 APPR:MLONG 2008/09/25 | QUALITY SYMBOLS ▽=0 C=0 | GENERAL TOLERANCES (UNLESS SPECIFIED) | | DIMENSION STYLE MM ONLY | SCALE NTS | DESIGN UNITS METRIC | THIRD ANGLE PROJECTION | | |
| | | 4 PLACES ± --- ± --- | 3 PLACES ± --- ± --- | 2 PLACES ± 0.2 ± --- | 1 PLACE ± --- ± --- | DRAWN BY KSEE | DATE 2003/12/24 | TITLE CUSTOM HEADER MGRID, 2MM DUAL ROW HDR WITH PEG, SMT | |
| | | ANGULAR ± 3 ° | | DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | | CHECKED BY KCLING | DATE 2004/01/12 | APPROVED BY SKTOH | DATE 2004/01/12 |
| | | SEE TABLE | | MATERIAL NO. | | MOLEX INCORPORATED | | DOCUMENT NO. SD-87759-113 | SHEET NO. 1 OF 2 |

| | 10 | 9 | | 8 | | 7 | 6 | 5 | 4 | 3 | 2 | 1 |
|---|---------------------------------------|-------------|-------|-------|-------|------|---|---|---|---|---|---|
| | PART NUMBER WITHOUT CAP IN TUBE | CKT SIZE | A | B | C | M | | | | | | |
| F | 87759-0850/0851 | 08 | 7.90 | 6.00 | 4.00 | 3.80 | | | | | | |
| | 87759-0852 | 08 | 7.90 | 6.00 | 4.00 | 9.60 | | | | | | |
| | 87759-1050/1051 | 10 | 9.90 | 8.00 | 6.00 | 3.80 | | | | | | |
| | 87759-1250/1251 | 12 | 11.90 | 10.00 | 8.00 | 3.80 | | | | | | |
| | 87759-1450/1451 | 14 | 13.90 | 12.00 | 10.00 | 3.80 | | | | | | |
| | 87759-1650/1651 | 16 | 15.90 | 14.00 | 12.00 | 3.80 | | | | | | |
| E | 87759-1850/1851 | 18 | 17.90 | 16.00 | 14.00 | 3.80 | | | | | | |
| | 87759-2050/2051 | 20 | 19.90 | 18.00 | 16.00 | 3.80 | | | | | | |
| | 87759-2250/2251 | 22 | 21.90 | 20.00 | 18.00 | 3.80 | | | | | | |
| | 87759-2450/2451 | 24 | 23.90 | 22.00 | 20.00 | 3.80 | | | | | | |
| | 87759-2650/2651 | 26 | 25.90 | 24.00 | 22.00 | 3.80 | | | | | | |
| | 87759-2850/2851 | 28 | 27.90 | 26.00 | 24.00 | 3.80 | | | | | | |
| D | 87759-3050/3051 | 30 | 29.90 | 28.00 | 26.00 | 3.80 | | | | | | |
| | 87759-3250/3251 | 32 | 31.90 | 30.00 | 28.00 | 3.80 | | | | | | |
| | 87759-3450/3451 | 34 | 33.90 | 32.00 | 30.00 | 3.80 | | | | | | |
| | 87759-3650/3651 | 36 | 35.90 | 34.00 | 32.00 | 3.80 | | | | | | |
| | 87759-3850/3851 | 38 | 37.90 | 36.00 | 34.00 | 3.80 | | | | | | |
| | 87759-4050/4051 | 40 | 39.90 | 38.00 | 36.00 | 3.80 | | | | | | |
| C | 87759-4250/4251 | 42 | 41.90 | 40.00 | 38.00 | 3.80 | | | | | | |
| | 87759-4450/4451 | 44 | 43.90 | 42.00 | 40.00 | 3.80 | | | | | | |
| | 87759-4650/4651 | 46 | 45.90 | 44.00 | 42.00 | 3.80 | | | | | | |
| | 87759-4850/4851 | 48 | 47.90 | 46.00 | 44.00 | 3.80 | | | | | | |
| | 87759-5050/5051 | 50 | 49.90 | 48.00 | 46.00 | 3.80 | | | | | | |

| | | | | | | | | |
|---|------------------------------|-----------------|---|--|---|---|------------------------|--|
| PDR#S-001876-00-00 EC NO: S2009-0182 DRWN:SKANG 2008/09/24 CHKD:ATSEE 2008/09/24 APPR:MLONG 2008/09/25 | REV DESCRIPTION B1 | QUALITY SYMBOLS | GENERAL TOLERANCES (UNLESS SPECIFIED) | DIMENSION STYLE | SCALE | DESIGN UNITS | THIRD ANGLE PROJECTION | |
| | | =0 =0 | mm INCH 4 PLACES ± --- ± --- 3 PLACES ± --- ± --- 2 PLACES ± 0.2 ± --- 1 PLACE ± --- ± --- ANGULAR ± 3 ° | MM ONLY | NTS | METRIC | | |
| | | | DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS | DRAWN BY DATE KSEE 2003/12/24 CHECKED BY DATE KCLING 2004/01/12 APPROVED BY DATE SKTOH 2004/01/12 | TITLE | CUSTOM HEADER MGRID, 2MM DUAL ROW HDR WITH PEG, SMT | | |
| | | | | MATERIAL NO. SEE TABLE SIZE A3 | MOLEX INCORPORATED DOCUMENT NO. SD-87759-113 SHEET NO. 2 OF 2 | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION | | |