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**Part Number:** [0430451609](#)  
**Status:** **Active**  
**Overview:** [microfit\\_30](#)  
**Description:** 3.00mm (.118") Pitch Micro-Fit 3.0™ Header, Surface Mount, Dual Row, Right Angle, with Solder Tab, 16 Circuits, Tin (Sn) Plating, Glow Wire Compatible

**Documents:**

|                               |                                                      |
|-------------------------------|------------------------------------------------------|
| <a href="#">3D Model</a>      | <a href="#">Product Specification PS-43045 (PDF)</a> |
| <a href="#">Drawing (PDF)</a> | <a href="#">RoHS Certificate of Compliance (PDF)</a> |

**Agency Certification**

|     |           |
|-----|-----------|
| CSA | LR19980   |
| TUV | R72081037 |
| UL  | E29179    |

**General**

|                             |                                                                                                        |
|-----------------------------|--------------------------------------------------------------------------------------------------------|
| Product Family              | PCB Headers                                                                                            |
| Series                      | <a href="#">43045</a>                                                                                  |
| Application                 | Wire-to-Board                                                                                          |
| Comments                    | Glow Wire Equivalent Part Number <a href="#">430451609</a> . High Temperature, Square Pin, Solder Type |
| Overview                    | <a href="#">microfit_30</a>                                                                            |
| Product Literature Order No | USA-106                                                                                                |
| Product Name                | Micro-Fit 3.0™                                                                                         |

**Physical**

|                                |                                |
|--------------------------------|--------------------------------|
| Breakaway                      | No                             |
| Circuits (Loaded)              | 16                             |
| Circuits (maximum)             | 16                             |
| Color - Resin                  | Black                          |
| Durability (mating cycles max) | 30                             |
| Flammability                   | 94V-0                          |
| Glow-Wire Compliant            | Yes                            |
| Mated Height (in)              | 0.405 In                       |
| Mated Height (mm)              | 10.29 mm                       |
| Material - Metal               | Brass                          |
| Material - Plating Mating      | Tin                            |
| Material - Plating Termination | Tin                            |
| Material - Resin               | High Temperature Thermoplastic |
| Number of Rows                 | 2                              |
| Orientation                    | Right Angle                    |
| PCB Locator                    | Yes                            |
| PCB Retention                  | Yes                            |
| PCB Thickness Recommended (in) | 0.062 In                       |
| PCB Thickness Recommended (mm) | 1.60 mm                        |
| Packaging Type                 | Embossed Tape on Reel          |
| Pitch - Mating Interface (in)  | 0.118 In                       |
| Pitch - Mating Interface (mm)  | 3.00 mm                        |
| Plating min: Mating (µin)      | 100                            |
| Plating min: Mating (µm)       | 2.5                            |
| Plating min: Termination (µin) | 100                            |
| Plating min: Termination (µm)  | 2.5                            |
| Polarized to PCB               | Yes                            |
| Shrouded                       | Fully                          |
| Stackable                      | No                             |
| Surface Mount Compatible (SMC) | N/A                            |

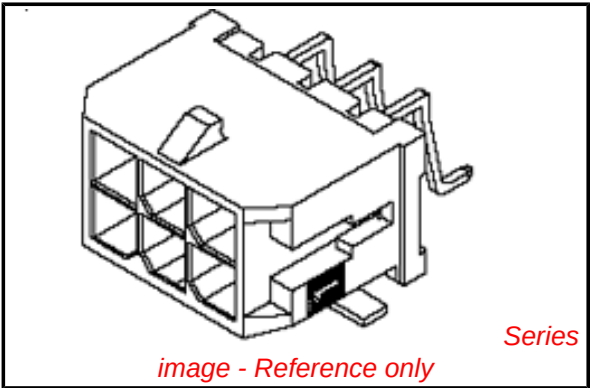


image - Reference only

**EU RoHS**

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

**China RoHS**



**Need more information on product  
environmental compliance?**

Email [productcompliance@molex.com](mailto: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**  
[43045Series](#)

**Mates With**  
[43025](#)

|                               |                 |
|-------------------------------|-----------------|
| Temperature Range - Operating | -40°C to +105°C |
| Termination Interface: Style  | Surface Mount   |

**Electrical**

|                               |      |
|-------------------------------|------|
| Current - Maximum per Contact | 5A   |
| Voltage - Maximum             | 250V |

**Solder Process Data**

|                                                |                           |
|------------------------------------------------|---------------------------|
| Duration at Max. Process Temperature (seconds) | 30                        |
| Lead-free Process Capability                   | Reflow Capable (SMT only) |
| Max. Cycles at Max. Process Temperature        | 3                         |
| Process Temperature max. C                     | 260                       |

**Material Info**

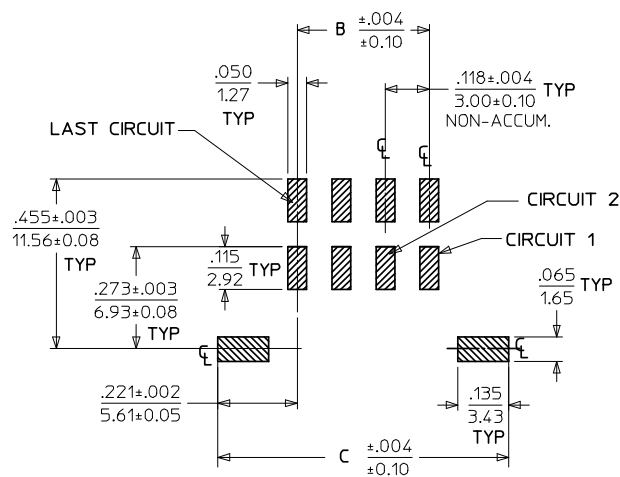
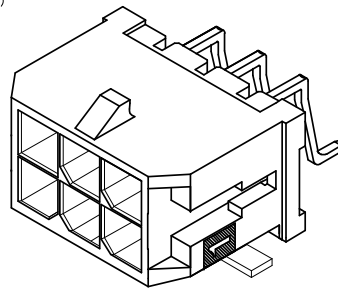
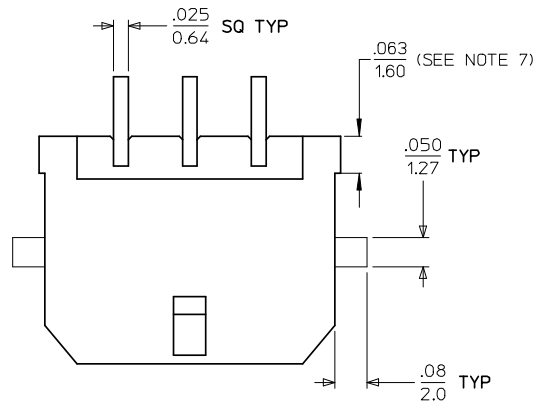
**Reference - Drawing Numbers**

|                         |                                        |
|-------------------------|----------------------------------------|
| Packaging Specification | PK-70873-05**                          |
| Product Specification   | PS-43045, RPS-43045-003, RPS-43045-004 |
| Sales Drawing           | SD-43045-004                           |
| Test Summary            | TS-43045-001                           |

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13 12 11 10 9 8 7 6 5 4 3 2 1



PCB LAYOUT: COMPONENT SIDE

CIRCUIT "1" IDENTIFIED ON THIS SURFACE  
(APPROX. LOCATION SHOWN FOR REF.)

| CKTS | A<br>(SEE<br>NOTE 7) | B              | C              |
|------|----------------------|----------------|----------------|
| 02   | .262<br>6.65         | NA             | .441<br>11.20  |
| 04   | .380<br>9.65         | .118<br>3.00   | .559<br>14.20  |
| 06   | .498<br>12.65        | .236<br>6.00   | .677<br>17.20  |
| 08   | .616<br>15.65        | .354<br>9.00   | .795<br>20.20  |
| 10   | .734<br>18.65        | .472<br>12.00  | .913<br>23.20  |
| 12   | .852<br>21.65        | .591<br>15.00  | 1.031<br>26.20 |
| 14   | .970<br>24.65        | .709<br>18.00  | 1.150<br>29.20 |
| 16   | 1.088<br>27.65       | .827<br>21.00  | 1.268<br>32.20 |
| 18   | 1.206<br>30.65       | .945<br>24.00  | 1.386<br>35.20 |
| 20   | 1.325<br>33.65       | 1.063<br>27.00 | 1.504<br>38.20 |
| 22   | 1.443<br>36.65       | 1.181<br>30.00 | 1.622<br>41.20 |
| 24   | 1.561<br>39.65       | 1.299<br>33.00 | 1.740<br>44.20 |

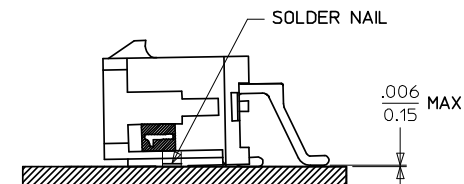
LAST  
CIRCUIT

CIRCUIT 2

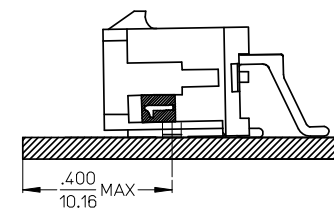
CIRCUIT 1

#### NOTES:

- HOUSING MATERIAL: GLASS FILLED LIQUID CRYSTAL POLYMER, UL94V-0, COLOR: BLACK  
TERMINAL MATERIAL: BRASS ALLOY
- FINISH: A = .000100/(0.00254) MIN. TIN OVER  
.000050/(0.00127) MIN. NICKEL PLATE.  
B = .000015/(0.00038) MIN. GOLD IN SELECTIVE AREA,  
.000100/(0.00254) MIN. MATTE TIN ON SOLDER TAILS,  
BOTH OVER .000050/(0.00127) MIN. NICKEL PLATE.  
C = .000030/(0.00076) MIN. GOLD IN SELECTIVE AREA,  
.000100/(0.00254) MIN. MATTE TIN ON SOLDER TAILS,  
BOTH OVER .000050/(0.00127) MIN. NICKEL PLATE.  
\* 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 IN THE PC TAIL AREA.
- PRODUCT SPECIFICATION: PS-43045
- TAPE AND REEL PACK: SEE MOLEX DRAWING PK-70873-05\*\*
- MATES WITH MOLEX RECEPTACLE SERIES 43025
- THE COPLANARITY DIMENSION IS ESTABLISHED BY PLACING THE ASSEMBLY  
ON A FLAT SURFACE. THE DISTANCE FROM THAT SURFACE TO THE BOTTOM  
OF ANY TERMINAL OR NAIL MUST NOT EXCEED .006/0.15
- .010/0.25 OFFSETS ARE PRESENT ON ALL PARTS MANUFACTURED AFTER 11/1/2007,  
AND ON PARTS PRIOR TO 11/1/2007 THAT CONTAIN A GREEN DOT ON THE PRIMARY  
SHIPPING CARTON LABEL.
- TO AVOID INTERFERENCE BETWEEN RECEPTACLE AND PCB, HEADER MUST BE PLACED  
WITHIN .400/(10.16) MAX. FROM EDGE OF PCB, AS SHOWN IN LOCATION DETAIL.
- THIS PART CONFORMS TO CLASS B REQUIREMENTS OF COSMETIC SPECIFICATION  
PS-45499-002.



COPLANARITY DETAIL  
(SEE NOTE #6)



LOCATION DETAIL  
(SEE NOTE #8)

|      | FINISH A     | FINISH B     | FINISH C     |
|------|--------------|--------------|--------------|
| CKTS | MATERIAL NO: | MATERIAL NO: | MATERIAL NO: |
| 02   | 43045-0209   | 43045-0210   | 43045-0211   |
| 04   | 43045-0409   | 43045-0410   | 43045-0411   |
| 06   | 43045-0609   | 43045-0610   | 43045-0611   |
| 08   | 43045-0809   | 43045-0810   | 43045-0811   |
| 10   | 43045-1009   | 43045-1010   | 43045-1011   |
| 12   | 43045-1209   | 43045-1210   | 43045-1211   |
| 14   | 43045-1409   | 43045-1410   | 43045-1411   |
| 16   | 43045-1609   | 43045-1610   | 43045-1611   |
| 18   | 43045-1809   | 43045-1810   | 43045-1811   |
| 20   | 43045-2009   | 43045-2010   | 43045-2011   |
| 22   | 43045-2209   | 43045-2210   | 43045-2211   |
| 24   | 43045-2409   | 43045-2410   | 43045-2411   |

|                                                                                                                          |             |                                   |                                                            |        |                          |                                                                                                                                  |                     |                                                                               |                                                                                                              |                              |
|--------------------------------------------------------------------------------------------------------------------------|-------------|-----------------------------------|------------------------------------------------------------|--------|--------------------------|----------------------------------------------------------------------------------------------------------------------------------|---------------------|-------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------|------------------------------|
| LOCATION DETAIL<br>EC NO: UCP2008-0324<br>DRAWN: KIPPER 2007/12/19<br>CHKD: SSUSEK 2007/12/20<br>APPR: FSMITH 2007/12/21 | DESCRIPTION | QUALITY SYMBOLS<br><br>▽=0<br>▽=0 | GENERAL TOLERANCES (UNLESS SPECIFIED)                      |        | DIMENSION STYLE<br>IN/MM |                                                                                                                                  | SCALE<br>---        | DESIGN UNITS<br>METRIC                                                        |  THIRD ANGLE PROJECTION |                              |
|                                                                                                                          |             |                                   |                                                            | mm     | INCH                     | DRAWN BY<br>SAMIEC                                                                                                               | DATE<br>2000/03/15  | TITLE<br>MICRO FIT (3.0)<br>DUAL ROW RIGHT ANGLE SMT<br>HEADER W/NAI LS ASS'Y |                                                                                                              |                              |
|                                                                                                                          |             |                                   | 4 PLACES                                                   | ± ---  | ± ---                    | CHECKED BY<br>MUELLER                                                                                                            | DATE<br>2000/03/15  | MOLEX<br>MOLEX INCORPORATED                                                   |                                                                                                              |                              |
|                                                                                                                          |             |                                   | 3 PLACES                                                   | ± ---  | ± .010                   | APPROVED BY<br>EDGLEY                                                                                                            | DATE<br>2000/03/15  |                                                                               |                                                                                                              | DOCUMENT NO.<br>SD-43045-004 |
|                                                                                                                          |             |                                   | 2 PLACES                                                   | ± 0.25 | ± .014                   | MATERIAL NO.<br>SEE CHART                                                                                                        | SHEET NO.<br>1 OF 1 |                                                                               |                                                                                                              |                              |
| 1 PLACE                                                                                                                  | ± 0.36      | ± .014                            | DRAFT WHERE APPLICABLE<br>MUST REMAIN<br>WITHIN DIMENSIONS |        |                          | THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX<br>INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION |                     |                                                                               |                                                                                                              |                              |