

INTRODUCTION:

Adam Tech 0.8mm and 1.00mm Pin Header and Female Header series is a fine pitch, low profile, dual row, PCB mounted connector set intended for limited space applications or where total weight is a factor. Our specially tooled insulators and contacts maintain consistent high quality through our automated production processes. Each series is available in thru-hole PCB or SMT mounting and plated tin, gold or selective gold as specified.

FEATURES:

0.8mm and 1.0mm versions
Pin Header and Female Header set
Lightweight and Compact
Hi Temp Insulators

MATING OPTIONS:

Mates with all industry standard 0.8mm & 1.0mm pitch headers and female headers

SPECIFICATIONS:

Material:

Standard Hi-Temp insulator: Nylon 6T, rated UL94V-0
Insulator Color: Black
Contacts: Phosphor Bronze

Plating:

U = Gold flash (30u" optional) over nickel underplate
SG = Gold flash (30u" optional) over nickel underplate on contact area, tin over copper underplate on tails.
T = Tin over copper underplate overall.

Electrical:

Operating voltage: 250V AC max.
Current rating: 1 Amp max
Contact resistance: 20 mΩ max. initial
Insulation resistance: 5000 MΩ min.
Dielectric withstanding voltage: 1000V AC for 1 minute

Mechanical:

Mating durability: 500 cycles min.

Temperature Ratings:

Operating temperature: -40°C to +105°C
Max process temp: 230°C for 30 ~ 60 seconds
(260°C for 10 seconds)
Soldering process temperature: 260°C

PACKAGING:

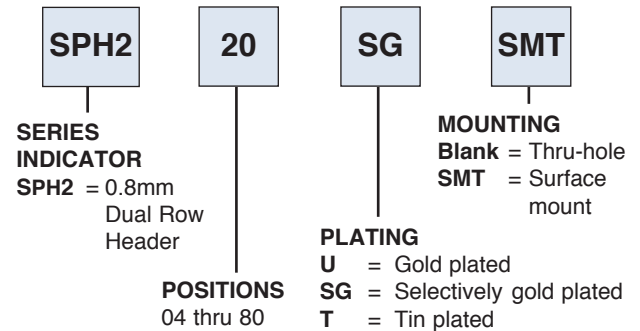
Anti-ESD plastic bags or tubes

APPROVALS AND CERTIFICATIONS:

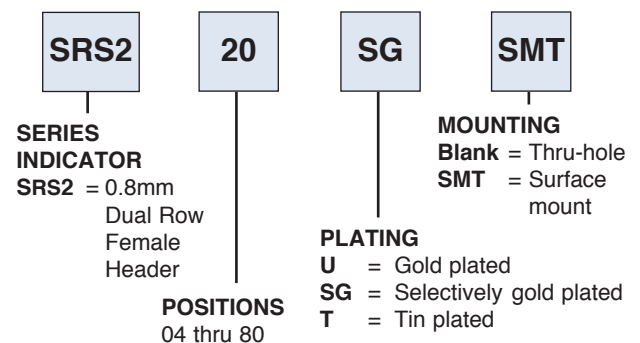
UL Recognized & CSA Certified, File no. E224053



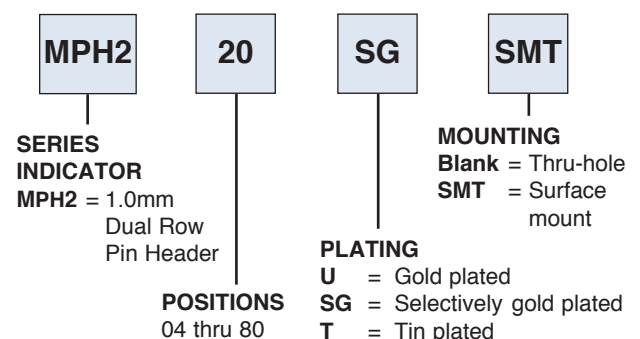
0.8mm MALE ORDERING INFORMATION



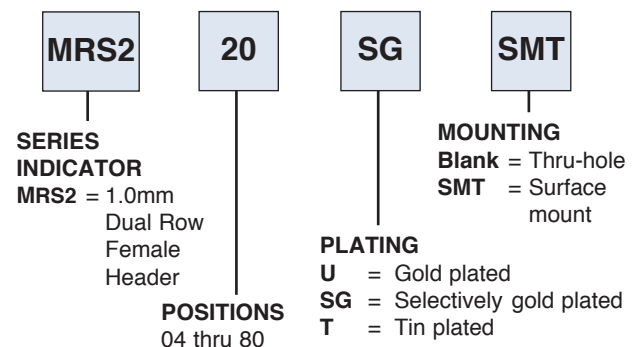
0.8mm FEMALE ORDERING INFORMATION



1.0mm MALE ORDERING INFORMATION



1.0mm FEMALE ORDERING INFORMATION



0.8mm SUB-MICRO HEADERS

<p>SPH2-60-UA</p> <p>0.8mm Male Header SPH2 Series</p> <p>A = .031 [.80] X No of Positions Per Row B = .031 [.80] X No of Spaces Per Row</p>	<p>SRS2-60-UA</p> <p>0.8mm Female Header SRS2 Series</p> <p>A = .031 [.80] X No of Positions Per Row B = .031 [.80] X No of Spaces Per Row</p>
<p>SPH2-60-UA-SMT</p> <p>0.8mm SMT Male Header SPH2 SMT Series</p> <p>A = .031 [.80] X No of Positions Per Row B = .031 [.80] X No of Spaces Per Row C = .031 [.80] X No of Spaces - 1</p>	<p>SRS2-60-UA-SMT</p> <p>0.8mm SMT Female Header SRS2 SMT Series</p> <p>A = .031 [.80] X No of Positions Per Row B = .031 [.80] X No of Spaces Per Row C = .031 [.80] X No of Spaces - 1</p>

1.0mm MICRO HEADERS

<p>MPH2-60-UA</p> <p>1.0mm Male Header MPH2 Series</p> <p>A = .039 [1.00] X No of Positions Per Row B = .039 [1.00] X No of Spaces Per Row</p>	<p>MRS2-60-UA</p> <p>1.0mm Female Header MRS2 Series</p> <p>A = .039 [1.00] X No of Positions Per Row B = .039 [1.00] X No of Spaces Per Row</p>
<p>MPH2-60-UA-SMT</p> <p>1.0mm SMT Male Header MPH2-SMT Series</p> <p>A = .039 [1.00] X No of Positions Per Row B = .039 [1.00] X No of Spaces Per Row</p>	<p>MRS2-60-UA-SMT</p> <p>1.0mm SMT Female Header MRS2-SMT Series</p> <p>A = .039 [1.00] X No of Positions Per Row B = .039 [1.00] X No of Spaces Per Row</p>

INTRODUCTION:

Adam Tech .050" HPH Series Pin Headers are fine pitched, low profile, PCB mounted pin headers intended for limited space applications or where overall size is a factor. Our specially tooled insulators and contacts offer consistent high quality through automated production processes. This series offers an extensive range of single, dual and stacked versions. Each is available in thru-hole PCB or SMT mounting with choice of tin, gold or selective gold plating.

FEATURES:

- Single and Dual Row
- Stacked, Thru-Hole and SMT mounting
- Pin Header and Female Header sets
- Lightweight and Compact
- Hi Temp Insulator available
- Choice of plating

MATING OPTIONS:

Mates with all industry standard .050" [1.27mm] pitch female headers designed for use with 0.4mm Sq. pins and Low profile receptacle

SPECIFICATIONS:

Material:

Standard Hi-Temp insulator: Nylon 6T or Nylon 46, rated UL94V-0
Insulator Color: Black

Contacts: Brass or Phosphor Bronze

Plating:

- U = Gold flash over nickel underplate overall
- SG = Gold flash over nickel underplate on contact area, tin over copper underplate on tails.
- T = Tin over copper underplate overall

Electrical:

- Operating voltage: 250V AC max.
- Current rating: 1 Amp max
- Contact resistance: 20 mΩ max. Initial
- Insulation resistance: 5000 MΩ min.
- Dielectric withstanding voltage: 1000V AC for 1 minute

Mechanical:

Mating durability: 500 Cycles min.

Temperature Rating:

- Operating temperature: -40°C to +105°C
- Soldering process temperature: 260°C

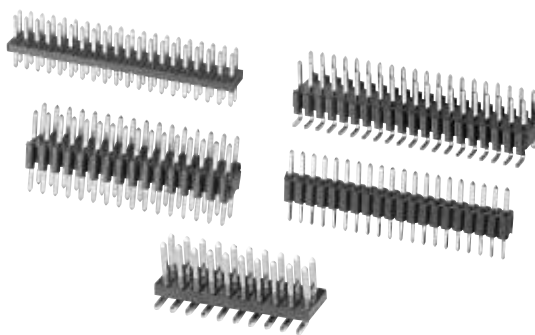
PACKAGING:

Anti-ESD plastic bags

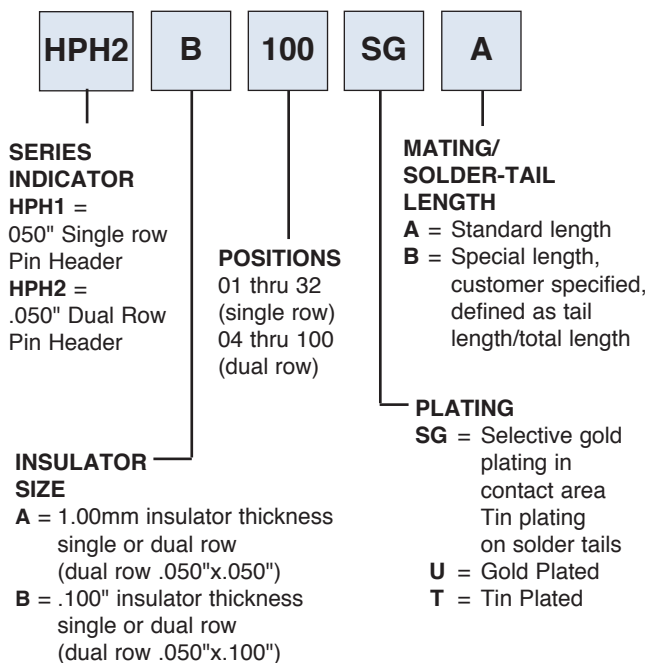
APPROVALS AND CERTIFICATIONS:

UL Recognized & CSA Certified, File no. E224053

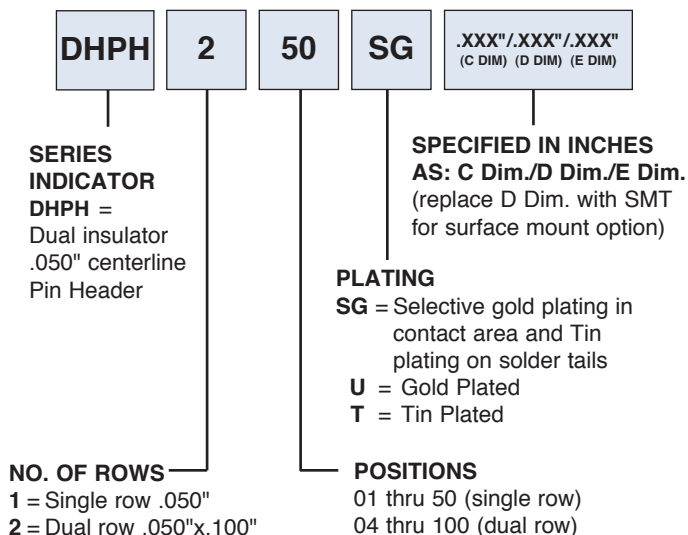
**HI-TEMP
INSULATOR
AVAILABLE**



ORDERING INFORMATION



ORDERING INFORMATION



OPTIONS:

- Add designator(s) to end of part number
- HT** = Hi-Temp insulator for Hi-Temp soldering processes up to 260°C
(Add this option for thru-hole products only. All SMT products are manufactured with Hi-Temp insulators)
- SMT** = Dual Row Surface Mount leads with Hi-Temp insulator for Hi-Temp soldering processes up to 260°C
- SMT-A** = Single Row Surface Mount Leads Type A
- SMT-B** = Single Row Surface Mount Leads Type B
- P** = Optional locating peg

<p>A = .050 [1.27] X No. of Positions B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH1-A SINGLE ROW STRAIGHT WITH 1.00mm INSULATOR</p> <p>HPH1-A-20-UA</p>
<p>A = .050 [1.27] X No. of Positions B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH1-B SINGLE ROW STRAIGHT WITH .100" INSULATOR</p> <p>HPH1-B-20-UA</p>
<p>A = .050 [1.27] X No. of Positions per row B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH2-A DUAL ROW STRAIGHT WITH 1.00mm INSULATOR</p> <p>HPH2-A-40-UA</p>
<p>A = .050 [1.27] X No. of Positions per row B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH2-B DUAL ROW STRAIGHT WITH .100" INSULATOR</p> <p>HPH2-B-40-UA</p>
<p>A = .050 [1.27] X No. of Positions B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH1-A (SMT) SINGLE ROW STRAIGHT SMT WITH 1.00mm INSULATOR</p> <p>HPH1-A-20-UA-SMT</p>
<p>A = .050 [1.27] X No. of Positions B = .050 [1.27] X No. of Spaces</p> <p>Recommended PCB Layout</p>		<p>HPH1-B (SMT) SINGLE ROW STRAIGHT SMT WITH .100" INSULATOR</p> <p>HPH1-B-20-UA-SMT</p>

INTRODUCTION

Adam Tech 2PH & D2PH Series 2.0mm Pin Headers offer a full range of fine pitched headers in a variety of configurations including Single, Dual and Three rows, Straight & Right Angle in Thru-Hole or SMT mounting. Their close tolerance .020" sq. posts are smoothly finished and taper tipped to eliminate insertion damage to the PCB or mating connector. Adam Tech 2.0mm Pin Headers can be easily cut into exact sizes as required. Options include stacked insulator versions and choice of tin, gold or selective gold plating. This series is compatible with all industry standard 2.0mm pitch mating connectors.

FEATURES:

Single, Dual or Three Row
Tin, gold or selective gold plating options
Thru-hole or SMT mounting
Stacked and Custom length versions available
Versatile Breakaway design
Hi Temp Insulator available

MATING RECEPTACLES:

Mates with all industry standard .050" pitch female headers

SPECIFICATIONS:

Material:

Standard insulator: PBT, glass reinforced, rated UL94V-0
Optional Hi-Temp insulator: Nylon 6T, rated UL94V-0
Insulator Color: Black
Contacts: Brass

Plating:

U = Gold flash (30u" optional) over nickel underplate overall
SG = Gold flash (30u" optional) over nickel underplate on contact area, tin over copper underplate on tails.
T = Tin over copper underplate overall

Electrical:

Operating voltage: 250V AC max.
Current rating: 1 Amp max.
Contact resistance: 20 mΩ max. initial
Insulation resistance: 5000 MΩ min.
Dielectric withstanding voltage: 1000V AC for 1 minute

Mechanical:

Mating durability: 1,000 cycles

Temperature Rating:

Operating temperature: -40°C to +105°C
Soldering process temperature: 260°C

PACKAGING:

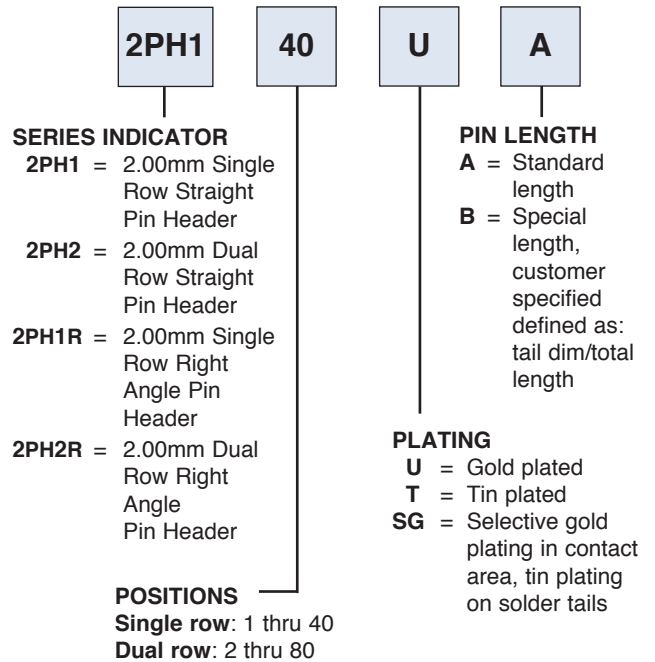
Anti-ESD plastic bags
(Tape and Reel available for SMT option)

APPROVALS AND CERTIFICATIONS:

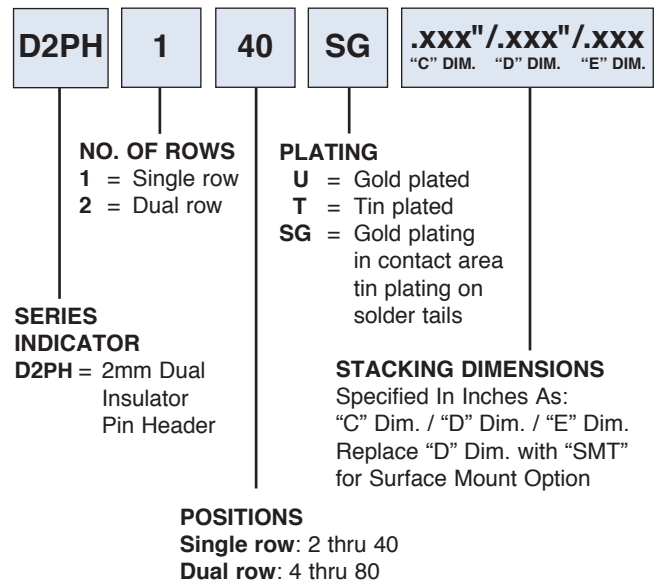
UL Recognized & CSA Certified,
File no. E224053



ORDERING INFORMATION

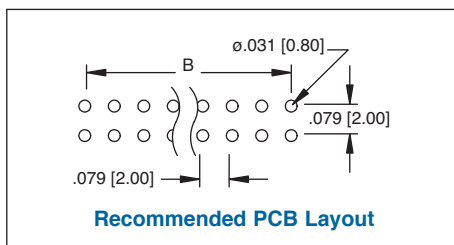
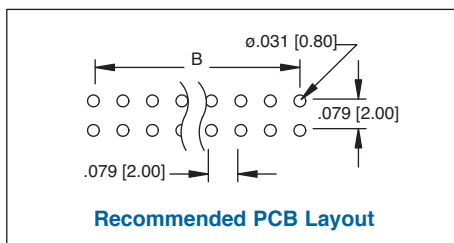
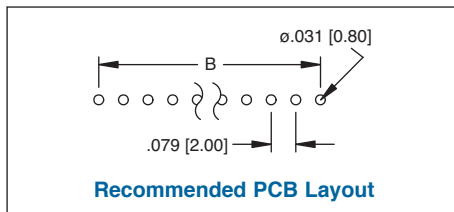
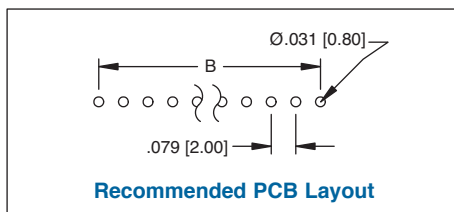


ORDERING INFORMATION DUAL INSULATOR HEADERS



OPTIONS: Add designator(s) to end of part number
SMT = Surface Mount leads Dual Row
SMT-A = Surface Mount leads Type A
SMT-B = Surface Mount Leads Type B
HT = Hi-Temp insulator for Hi-Temp soldering processes up to 260°C
 (Add this option for thru-hole products only. All SMT products are manufactured with Hi-Temp insulators)
L = Low profile 1.5mm insulator thickness
P = Locating pegs
BR = Board retention solder tails

<p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH1</p> <p>2PH1-16-UA</p>
<p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH1R</p> <p>2PH1R-16-UA</p>
<p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH2</p> <p>2PH2-32-UA</p>
<p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH2R</p> <p>2PH2R-32-UA</p>



<p>PIN 1 TYPE B</p> <p>PIN 1 TYPE A</p> <p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH1 (SMT)</p> <p>2PH1-15-UA-SMT</p> <p>Recommended PCB Layout</p> <p>SMT-A SMT-B</p>
<p>PIN 2 PIN 1</p> <p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>2PH2 (SMT)</p> <p>2PH2-26-UA-SMT</p> <p>Recommended PCB Layout</p>
<p>PIN 1</p> <p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>D2PH-1</p> <p>D2PH1-16-UA-.235 / .100 / .400</p> <p>Recommended PCB Layout</p>
<p>PIN 2 PIN 1</p> <p>A = .079" [2.00] x No. of positions B = .079" [2.00] x No. of spaces</p>	<p>D2PH-2</p> <p>D2PH2-32-UA-.235 / .100 / .400</p> <p>Recommended PCB Layout</p>

D2PH-1 (SMT)

A = .079" [2.00] x No. of positions
B = .079" [2.00] x No. of spaces

D2PH-1-12-U-100/SMT/240

Recommended PCB Layouts

SMT-A

SMT-B

D2PH-2 (SMT)

A = .079" [2.00] x No. of positions
B = .079" [2.00] x No. of spaces

D2PH-2-16-U-.145/SMT/360

Recommended PCB Layouts

MS2A

MS2B

MS2C

MS2H-1 RIGID SHORT HANDLE

MS2H-2 FLEXIBLE LONG HANDLE

INTRODUCTION:

Adam Tech PH Series .100" Pin Headers are a full range headers in a variety of configurations including Single, Dual and Three rows, Straight or Right Angle in Thru-Hole or SMT mounting. Their close tolerance .025" sq. posts are smoothly finished and taper tipped to eliminate insertion damage to the PCB or mating connector. Adam Tech Pin Headers can be easily cut into exact sizes as required. Options include stacked insulator versions and choice of tin, gold or selective gold plating. This series is compatible with all industry standard .100" pitch pin headers.

FEATURES:

Single, Dual or Three Row
Tin, gold or selective gold plating options
Thru-hole or SMT mounting
Stacked and Custom length versions available
Versatile Breakaway design
Hi Temp Insulator available

MATING RECEPTACLES:

Mates with all industry standard receptacles accepting a .025" square post on .100" [2.54mm] centerlines

SPECIFICATIONS:

Material:

Insulator: PBT, glass reinforced, rated UL94V-0
Optional Hi-Temp insulator: Nylon 6T, rated UL94V-0
Insulator Color: Black
Contacts: Brass

Plating:

U = Gold flash (30u" optional) over nickel underplate
SG = Gold flash (30u" optional) over nickel underplate on contact area, tin over copper underplate on tails.
T = Tin over copper underplate overall

Electrical:

Operating voltage: 250V AC max.
Current rating: 3 Amps max
Contact resistance: 20 mΩ max. initial
Insulation resistance: 5000 MΩ min.
Dielectric withstanding voltage: 1000V AC for 1 minute

Mechanical:

Insertion force: 2 oz lbs max.
Withdrawal force: .75 oz lbs min
Mating durability: 1000 cycles min.

Temperature Rating:

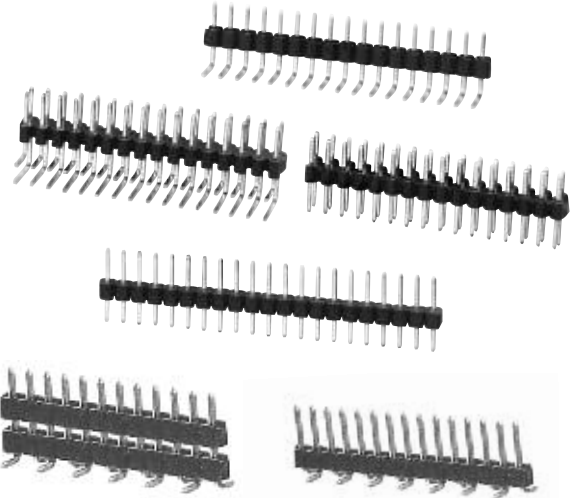
Operating temperature: -40°C to +105°C
Soldering process temperature:
Standard insulator: 235°C
Hi-Temp insulator: 260°C

PACKAGING:

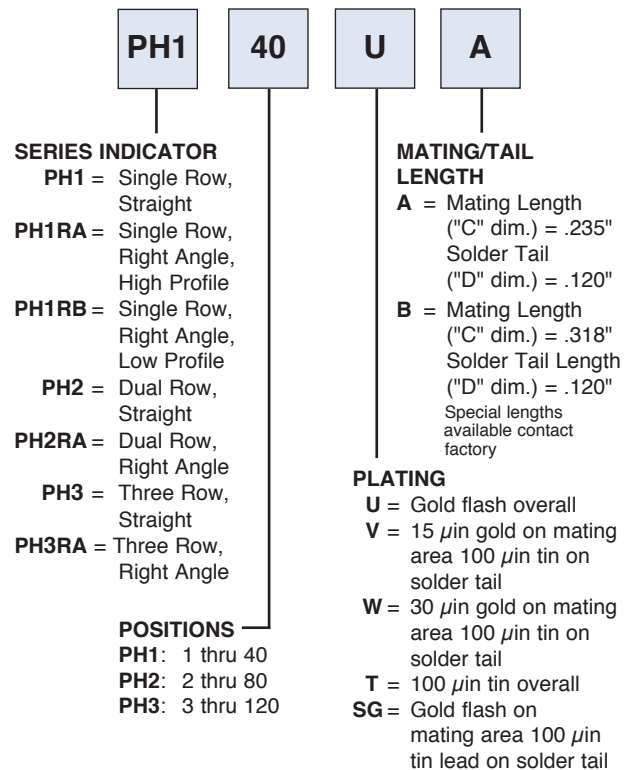
Anti-ESD plastic bags

SAFETY AGENCY APPROVALS:

UL Recognized & CSA Certified, File no. E224053



ORDERING INFORMATION

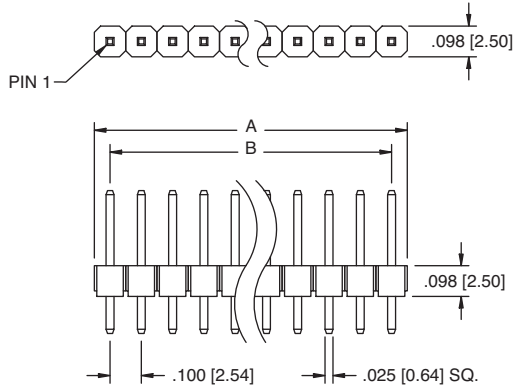


OPTIONS:

Add designator(s) to end of part number
SMT = Surface mount leads Dual row with Hi-Temp insulator
SMT-A = Surface mount leads Type A with Hi-Temp insulator
SMT-B = Surface mount leads Type B with Hi-Temp insulator
HT = Hi-Temp insulator for Hi-Temp soldering processes up to 260°C (Add this option for thru-hole products only.
 All SMT products are manufactured with Hi-Temp insulators)
L = Low profile 1.50 mm insulator thickness

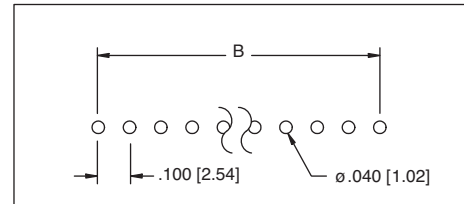
A = .100 [2.54] X No. of Positions.
B = .100 [2.54] X No. of Spaces.

PH1 SINGLE ROW



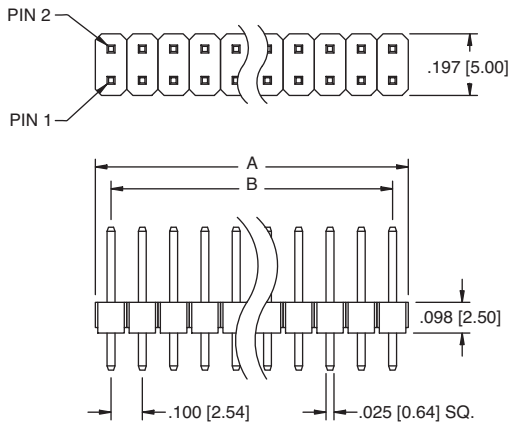
PH1-16-UA

Recommended PCB Layout



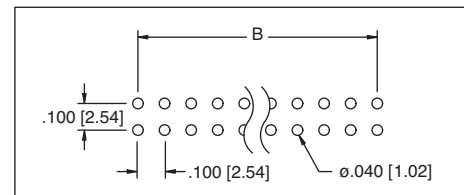
A = .100 [2.54] X No. of Positions per row.
B = .100 [2.54] X No. of Spaces.

PH2 DUAL ROW



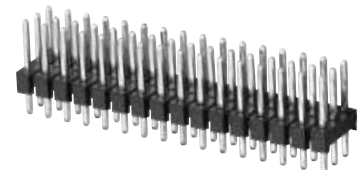
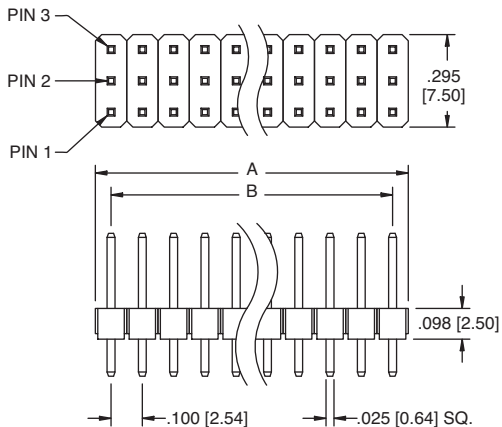
PH2-32-UA

Recommended PCB Layout



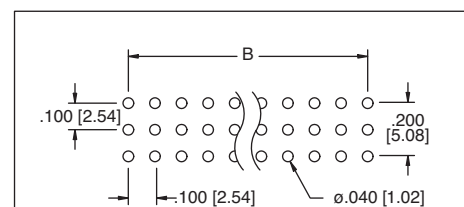
A = .100 [2.54] X No. of Positions per row.
B = .100 [2.54] X No. of Spaces.

PH3 TRIPLE ROW



PH3-48-UA

Recommended PCB Layout



A = .100 [2.54] X No. of Positions.
B = .100 [2.54] X No. of Spaces.

PH1RB
SINGLE ROW

PH1RB-16-UA

PH1RA

Recommended PCB Layout

A = .100 [2.54] X No. of Positions per row.
B = .100 [2.54] X No. of Spaces.

PH2RA
DUAL ROW

PH2RA-32-UA

Recommended PCB Layout

A = .100 [2.54] X No. of Positions per row.
B = .100 [2.54] X No. of Spaces.

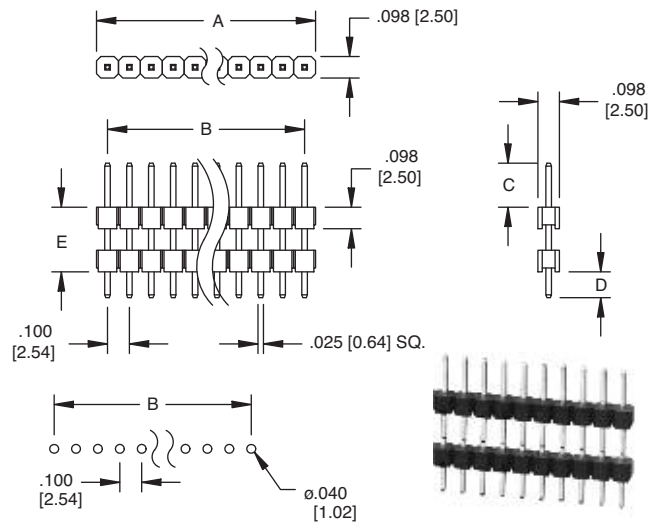
PH3RA
TRIPLE ROW

PH3RA-48-UA

Recommended PCB Layout

<p>PIN 1 TYPE B</p> <p>PIN 1 TYPE A</p> <p>A = .100 [2.54] X No. of Positions. B = .100 [2.54] X No. of Spaces.</p>	<p>PH1 SMT-SINGLE ROW</p> <p>PH1-15-UA-SMT-B</p> <p>Recommended PCB Layout</p> <p>SMT-A SMT-B</p>
<p>PIN 2</p> <p>PIN 1</p> <p>A = .100 [2.54] X No. of Positions per row. B = .100 [2.54] X No. of Spaces.</p>	<p>PH2 SMT-DUAL ROW</p> <p>PH2-26-UA-SMT</p> <p>Recommended PCB Layout</p>
<p>PIN 1</p> <p>A = .100 [2.54] X No. of Positions. B = .100 [2.54] X No. of Spaces.</p>	<p>PH1RB SMT-SINGLE ROW</p> <p>PH1RB-10-UA-SMT</p> <p>Recommended PCB Layout</p>
<p>PIN 2</p> <p>PIN 1</p> <p>A = .100 [2.54] X No. of Positions per row. B = .100 [2.54] X No. of Spaces.</p>	<p>PH2RA SMT-DUAL ROW</p> <p>PH2-20-UA-SMT</p> <p>Recommended PCB Layout</p>

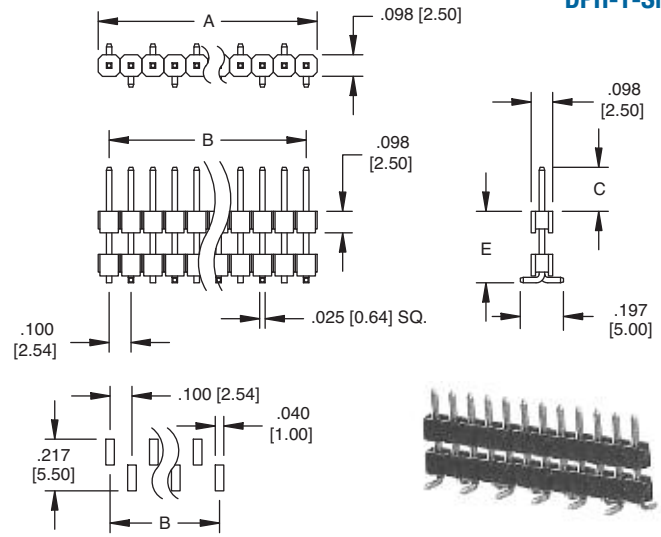
DPH-1



Recommended PCB Layout

DPH-1-10-U-.220/.100/.350

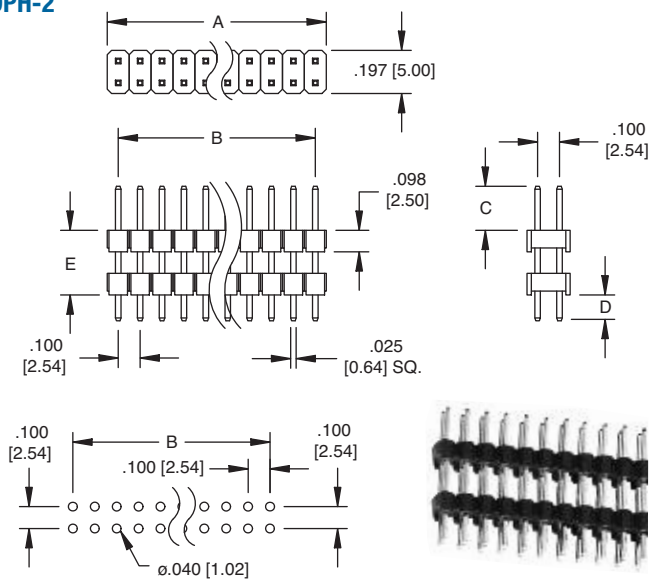
DPH-1-SMT



Recommended PCB Layout

DPH-1-12-U-.200/SMT/.220-A

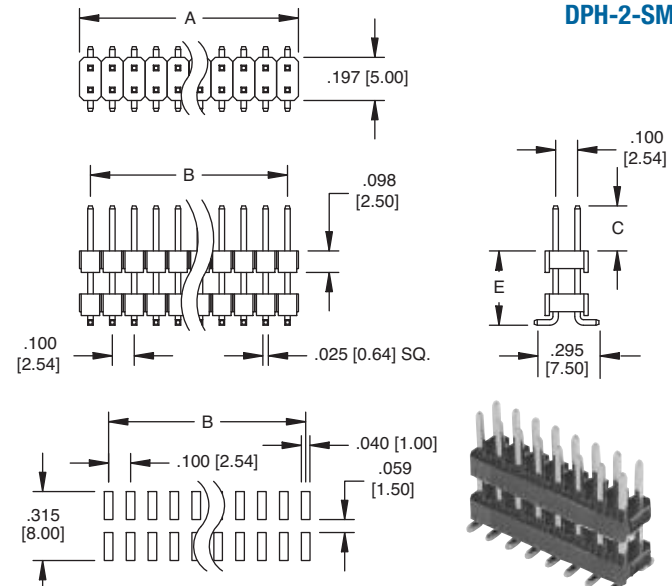
DPH-2



Recommended PCB Layout

DPH-2-22-U-.220/.100/.350

DPH-2-SMT



Recommended PCB Layout

DPH-2-16-U-.250/SMT/.300

ORDERING INFORMATION

DPH

SERIES INDICATOR
DPH = Dual insulator
.100" centerline

2

NO. OF ROWS
1 = Single row
2 = Dual row
3 = Triple row

20

POSITIONS
1 thru 40 (single row)
4 thru 80 (dual row)
3 thru 120 (triple row)

SG

PLATING
U = Gold plated
T = Tin plated
SG = Gold plating in contact area, tin plating on solder tails

.XXX"/.XXX"/.XXX"
(C DIM) (D DIM) (E DIM)

SPECIFIED IN INCHES AS:
C Dim. / D Dim. / E Dim.
(replace D Dim. with SMT for surface mount option)

A = .100 [2.54] x No. of Positions.
B = .100 [2.54] x No. of Spaces.