

# ADAM TECH

ADAM TECHNOLOGIES INC.

## INTRODUCTION:

Adam Tech HPH Series Half Pitch Pin Headers are designed for applications where space and weight are key factors. They provide a fast, simple one-step installation of multiple posts to PC boards. Both single and dual row types are available. Custom pin lengths are available to suit specific applications.

## FEATURES:

- Half pitch .050" centerline increases board density
- Single and dual row types
- Breakaway style insulator for added versatility
- Molded in standoffs enable easy cleaning

## MATING OPTIONS:

Mates with Adam Tech HRS and HFCS Socket Series and all other industry standard compatible connectors

## SPECIFICATIONS:

### Material:

Insulator: Polybutylene Terephthalate (PBT), glass reinforced thermoplastic, rated UL 94V-0

Contacts: Phosphor Bronze

### Plating:

U = 5  $\mu$ m gold nom. (optional 30  $\mu$ m) to MIL-G-45204, Type II, Grade C over 50  $\mu$ m nickel underplate to QQ-N-290, Class 2, Grade C

SG = 5  $\mu$ m gold nom. (optional 30  $\mu$ m) on mating length to MIL-G-45204, Type II, Grade C, 100  $\mu$ m tin-lead to MIL-P-81728 on solder-tails

T = 100  $\mu$ m tin-lead to MIL-P-81728, Type 1 with 50  $\mu$ m copper underplate to MIL-C-14550

### Electrical:

Operation voltage: 250 VAC max

Current rating: .5 Amp max

Contact resistance: 20 m $\Omega$  max

Insulation resistance: 1000 M $\Omega$  min @ 1000 VDC between adjacent contacts (75° F and 50% R.H.)

Dielectric withstanding voltage: 1000 VAC min rms (sea level)

### Mechanical:

Pin push out force: 4 lbs. min

Soldering process: Wave, Vapor-phase or IR Reflow

Environmental: Operating temperature: -65°C to +125°C

## PACKAGING:

Anti-static plastic bags

## APPROVALS AND CERTIFICATIONS:

Recognized under the component program

of Underwriters Laboratories, Inc. No. E167232

Certified by Canadian Standards Association No. LR75112



**Hi-TEMP**  
OPTION

## OPTIONS:

Add as suffix to basic part number

15 = 15  $\mu$ m gold plating

30 = 30  $\mu$ m gold plating

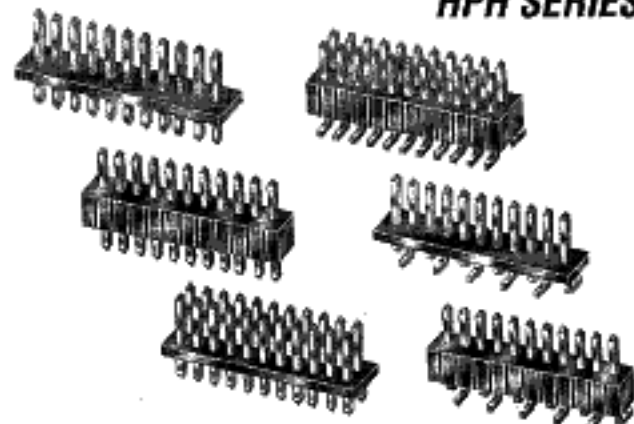
SMT = Surface mount leads

HT = Hi-Temp insulator for IR reflow or Vapor Phase soldering process

# .050" PIN HEADERS

.050" [1.27] CENTERLINE

HPH SERIES



## ORDERING INFORMATION

HPH2 B 100 SG A

### SERIES

#### INDICATOR

HPH1 = .050" Single row pin header

HPH2 = .050" Dual row pin header

### INSULATOR SIZE

A = 1 mm insulator thickness single or dual row (dual row .050"x.050")

B = .100" insulator thickness single or dual row (dual row .050"x.100")

### POSITIONS

1 thru 32 (single row)  
4 thru 100 (dual row)

### MATING/ SOLDER-TAIL LENGTH

A = Standard length  
B = Special length, customer specified, defined as tail length/total length

### PLATING

SG = Selective gold plating in contact area  
Tin-Lead plating on solder tails

U = Gold Plated

T = Tin Plated

## ORDERING INFORMATION

DHPH 2 50 SG .XXX"/.XXX"/.XXX"  
(C DIM) (D DIM) (E DIM)

### SERIES

#### INDICATOR

DHPH = Dual insulator .050" centerline

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

### PLATING

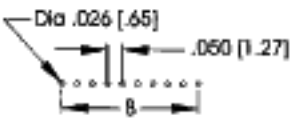
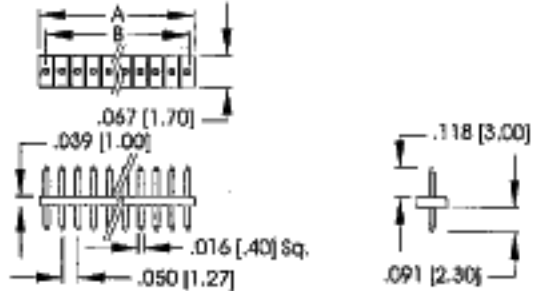

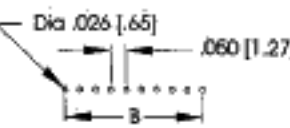



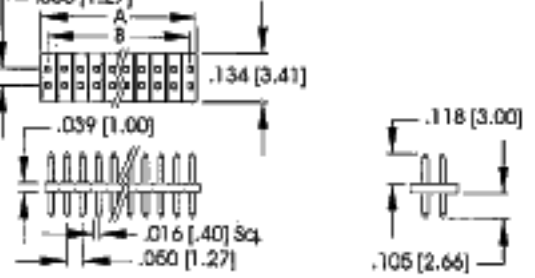

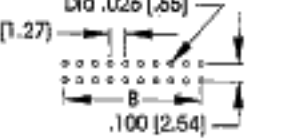
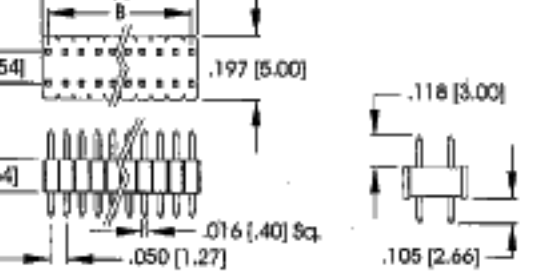


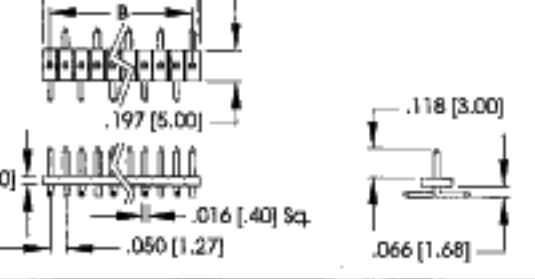


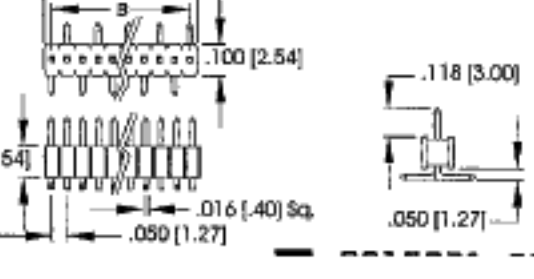

SG = Selective gold plating in contact area and Tin-Lead plating on solder tails

### NO. OF ROWS

1 = Single row  
2 = Dual row .050"x.100"

### POSITIONS

1 thru 32 (single row)  
4 thru 100 (dual row)

<p><b>PC Board Layout</b></p>  <p>Dia .026 [.65] .050 [1.27]</p>		 <p><b>HPH1-A</b></p>
<p><b>PC Board Layout</b></p>  <p>Dia .026 [.65] .050 [1.27]</p>		 <p><b>HPH1-B</b></p>
<p><b>PC Board Layout</b></p>  <p>.050 [1.27] Dia .026 [.65] .050 [1.27]</p>		 <p><b>HPH2-A</b></p>
<p><b>PC Board Layout</b></p>  <p>.050 [1.27] Dia .026 [.65] .100 [2.54]</p>		 <p><b>HPH2-B</b></p>
<p><b>PC Board Layout</b></p>  <p>.094 [2.40] .050 [1.27] .189 [4.80] .030 [.76]</p>		 <p><b>HPH1-A-SMT</b></p>
<p><b>PC Board Layout</b></p>  <p>.050 [1.27] .242 [6.15] .030 [.76]</p>		 <p><b>HPH1-B-SMT</b></p>

<p><b>Solder Pad Layout</b></p>			<p><b>HPH2-A-SMT</b></p>
<p><b>Solder Pad Layout</b></p>			<p><b>HPH2-B-SMT</b></p>
<p><b>PC Board Layout</b></p>			<p><b>HPDH-1</b></p>
<p><b>PC Board Layout</b></p>			<p><b>HPDH-2</b></p>
<p><b>Solder Pad Layout</b></p>			<p><b>HPDH-1-SM1</b></p>
<p><b>Solder Pad Layout</b></p>			<p><b>HPDH-2-SMT</b></p>