

QFS-026-04.25-L-D-A-GP

QFS-032-04.25-L-D-DP-A

(0.635 mm) .025"

QFS SERIES

# RUGGED GROUND PLANE SOCKET

## SPECIFICATIONS

For complete specifications and recommended PCB layouts see [www.samtec.com/QFS](http://www.samtec.com/QFS)

### Insulator Material:

Liquid Crystal Polymer

Contact & Ground

Plane Material:

Phosphor Bronze

### Plating:

Au over 50  $\mu$ " (1.27  $\mu$ m) Ni

(Tin on Ground Plane Tail)

### Current Rating:

Contact:

2.6 A per pin

(2 pins powered)

Ground Plane:

15.7 A per ground plane

(1 ground plane powered)

### Voltage Rating:

300 VAC mated with QMS

### Operating Temp:

-55 °C to +125 °C

### RoHS Compliant:

Yes

### Board Mates:

QMS

### Cable Mates:

6QCD

### Standoffs:

SO, JSOM

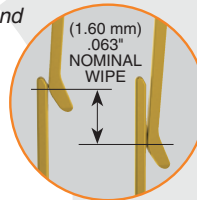
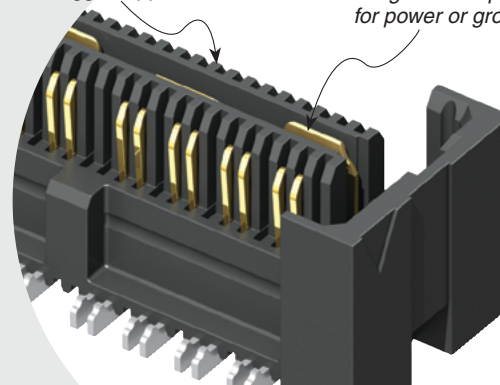
## POWER/SIGNAL APPLICATION



Compatible with UMPT/UMPS for flexible two-piece power/signal solutions

Increased insertion depth for rugged applications

Integral metal plane for power or ground



## HIGH-SPEED CHANNEL PERFORMANCE

QMS-DP/QFS-DP @ 10 mm Mated Stack Height

Rating based on Samtec reference channel.

For full SI performance data visit [Samtec.com](http://Samtec.com) or contact [SIG@samtec.com](mailto:SIG@samtec.com)

25  
Gbps

## ALSO AVAILABLE (MOQ Required)

- Other platings
- Without PCB Alignment Pins
- Hot Pluggable
- 4 banks (104 -SE, 64 -DP)

## PROCESSING

### Lead-Free Solderable:

Yes

### SMT Lead Coplanarity:

(0.10 mm) .004" max (026-078)

### Board Stacking:

For applications requiring more than two connectors per board contact [ipg@samtec.com](mailto:ipg@samtec.com)

## RECOGNITIONS

For complete scope of recognitions see

[www.samtec.com/quality](http://www.samtec.com/quality)



## STANDARDS

- SUMIT™
- PCI/104-Express™
- PCI/104-Express™ OneBank

Visit [www.samtec.com/standards](http://www.samtec.com/standards) for more information.

QFS — PINS PER ROW NO. OF PAIRS — LEAD STYLE — PLATING OPTION — TYPE — A — OTHER OPTION

—026, —052, —078  
(52 total pins per bank = —D)

—016, —032, —048  
(16 pairs per bank = —D-DP)

Specify LEAD STYLE from chart

—L

(—04.25 lead style only)  
= 10  $\mu$ " (0.25  $\mu$ m) Gold on Signal Pins and Ground Plane (Tin on Signal Pin tails, and Ground Plane tails)

—SL

(—06.25 lead style only)  
= 10  $\mu$ " (0.25  $\mu$ m) Gold on Signal Pins and Ground Plane (Tin on Signal Pin tails, and Ground Plane tails)

—D

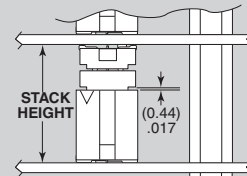
= Single-Ended

—D-DP

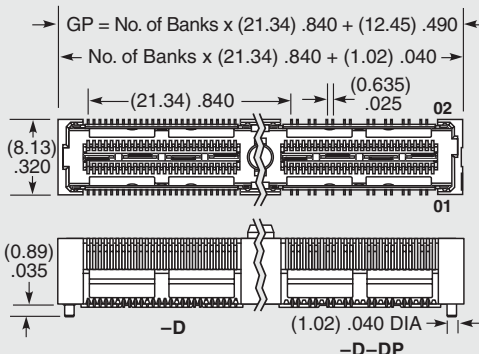
= Differential Pair (—04.25 lead style only)

—GP  
= Guide Holes (—04.25 lead style only)

## APPLICATION



Requires Standoff  
SO-1524-03-01-01-L or  
JSOM-1524-02 for 15.24 mm  
or SO-2215-02-01-01-L for 22 mm  
board spacing. Connectors designed to not fully seat when mated.



| MATED HEIGHT* |             |                |        |        |  |
|---------------|-------------|----------------|--------|--------|--|
| LEAD STYLE    | A           | QMS LEAD STYLE |        |        |  |
|               |             | —05.75         | —06.75 | —09.75 |  |
| —04.25        | (7.44) .293 | 10 mm          | 11 mm  | 14 mm  |  |
| —06.25        | (9.42) .371 | 12 mm          | 13 mm  | 16 mm  |  |

\*Processing conditions will affect mated height. See SO Series for board space tolerances.

| INDUSTRY STANDARD | INTERCONNECTS |               |       |              |
|-------------------|---------------|---------------|-------|--------------|
|                   | TERMINAL      | SOCKET        | BANKS | STACK HEIGHT |
| SUMIT™            | ASP-129637-01 | ASP-129646-01 | 1     | 15.24 mm     |
| PCI/104-Express™  | ASP-129637-03 | ASP-129646-03 | 3     | 15.24 mm     |
| PCI/104-Express™  | ASP-129637-13 | ASP-129646-22 | 1     | 15.24 mm     |
| PCI/104-Express™  | ASP-142781-01 | ASP-129646-01 | 1     | 22 mm        |
| PCI/104-Express™  | ASP-142781-02 | ASP-129646-02 | 2     | 22 mm        |
| PCI/104-Express™  | ASP-142781-03 | ASP-129646-03 | 3     | 22 mm        |

### Note:

Some lengths, styles and options are non-standard, non-returnable.

Due to technical progress, all designs, specifications and components are subject to change without notice.

[WWW.SAMTEC.COM](http://WWW.SAMTEC.COM)

All parts within this catalog are built to Samtec's specifications.

Customer specific requirements must be approved by Samtec and identified in a Samtec customer-specific drawing to apply.