





PLATING

**OPTION** 

and Ground Plane.

Matte Tin on tails (QTH only)

—F

= Gold Flash on

Signal Pins and

Ground Plane,

Matte Tin on tails

(QTH only)

# 0,50mm HI-SPEED HEADER QTH, CQTH

#### **SPECIFICATIONS**

For complete specifications and recommended PCB layouts see www.samtec.com?QTH

### **QTH**

Insulator Material: Liquid Crystal Polymer Terminal Material: US Phosphor Bronze Plating:

Au over 50μ" (1,27μm) Ni Current Rating: Contact: 1.0A @ 30°C Temperature Rise Ground Plane: 7.8A @ 30°C Temperature Rise Operating Temp Range: -55°C to +125°C Voltage Rating: 125 VAC (5mm Stack Height) Max Cycles: 100 Unmating Force (-RT1 option): -RT1 option increases unmating force up to 50% RoHS Compliant: Yes

## **Processing:**

Max Processing Temp: 230°C for 60 seconds, or 260°C for 20 seconds 3x Lead-Free Solderable: Yes SMT Lead Coplanarity: (0,10mm) .004" max (030-060) (0,15mm) .006" max (090-120)

Board Stacking:
For applications requiring more than two connectors per board or 120 positions or higher. contact ipg@samtec.com

#### **SPECIFICATIONS**

For complete specifications and recommended PCB layouts see www.samtec.com?CQTH

### **CQTH**

Same as QTH except: UL & CSA certification pending Plating: Electro-Polished Selective Max Cycles: 25

#### Integral metal plane for power or ground (0,50mm)Mates with: .0197 QSH, CQSH, HFHM, pitch HFHM2, HQCD Retention (See Application Option Specific note) SAMTEC Standard Note: Some lengths, Stack Heights styles and options are non-standard, non-returnable. from 5mm to 25mm Polarized ALSO AVAILABLE 5mm Stack Height Rated @ -3dB Insertion Loss Differential Pair version. Single-Ended Signaling 9 GHz / 18 Gbps See QTH-DP Series. Differential Pair Signaling 8 GHz / 16 Gbps Board Spacing Standoffs. See SO Series. Performance data for other stack heights available at www.samtec.com?QTH

030, –060, –090, –120 (60 total positions per bank)

QTH

(Requires -L or -F plating)

CQTH

(Requires -C plating)

**STRIP** 

NO. OF POSITIONS

**PER ROW** 

LEAD **STYLE** from chart.

**LEAD** 

STYLE

QTH LEAD STYLE	Α	HEIGHT WITH QSH
-01	(4,27) .168	(5,00) .198
-02	(7,26) .286	(8,00) .316
-03	(10,27) .404	(11,00) .433
-04	(15,25) .600	(16,00) .630
-05	(18,24) .718	(19,00) .748
-07	(24,24) .954	(25,00) .984
or Pow/30) v (20 00) 7875 -		

**QTH Series Only** = 10µ" (0,25µm) Gold on Signal Pins

= (7,00mm) .275" DIA Polyimide film Pick & Place Pad

**OTHER** 

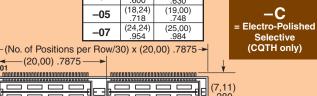
**OPTION** 

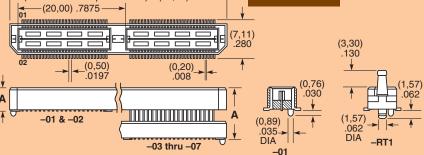
-TR = Tape & Reel (–090 positions maximum)

-RT1 = Retention Option (-01 Lead Style only & 090 positions maximum)

#### **APPLICATION SPECIFIC OPTION**

- 14mm, 15mm, 22mm and 30mm stack height (Caution: Some automatic placement/inspection machines may have component height restrictions. Please consult machinery specifications.)
- 30µ" (0,76µm) Gold (Specify -H plating for Data Rate cable mating applications.
- Edge Mount & Guide Posts (QTH only)
- 150 positions per row (QTH only) Call Samtec.





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