

INTRODUCTION

Smallest pitch Wire-to-Board connector with positive lock.

The new 1.00mm (.039") pitch wire-to-board connector system from Molex was developed for various connections in Flat Panel Displays (FPD). The compact, small-circuit size features of this system also make it ideal for other applications such as Notebook PCs and other compact devices.

The system is offered in both single and dual row versions. Friction and positive locks are offered for various application needs. Other features include mating guides, solder tabs and footprint compatibility with some competitive versions.



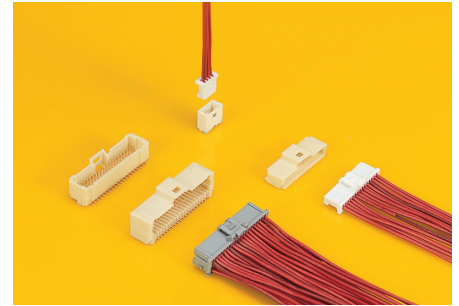
1.00mm (.039") Pitch Pico-Clasp™ Single and Dual Row Wire-to-Board Connectors

Specifications:

■ **Reference Information**
Designed In: mm

■ **Electrical**
Voltage: 50V
Current: 1.0A (28, 30 AWG), 0.8A (32 AWG)
Contact Resistance: 20 milliohms max.
Insulation Resistance: 100 Megohms min.
Dielectric Strength: 250V AC/1 minute
Terminal Retention Force: 4.9N (0.5kgf) min.
Durability: 30 cycles

■ **Physical**
Operating Temperature:
-40 to +85°C



FEATURES AND BENEFITS

FEATURES

■ Smallest pitch for positive lock Wire-to-Board crimp system

■ Inner positive lock (6-50 circuit sizes)

■ Outer positive lock (3-5 circuit sizes)

■ Low mating and unmating forces

■ Wide header variations

BENEFITS

■ Provides space saving for mounting other components

■ Prevents wire hooking

■ Blocks direct wire weight and prevents lock lever leaning

■ Strong mating retention and clear click feeling

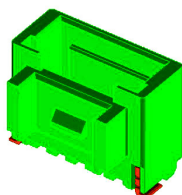
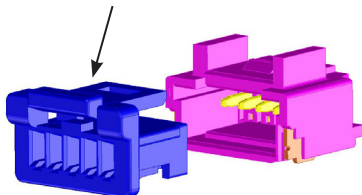
■ Strong mating retention and clear click feeling

■ Easy connector insertion and extraction

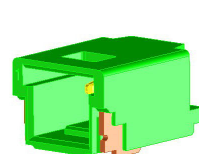
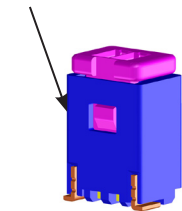
■ Provides customers with many choices and design flexibility

■ Three Types of Locks

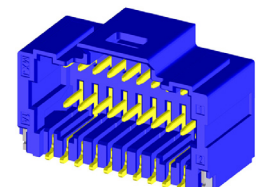
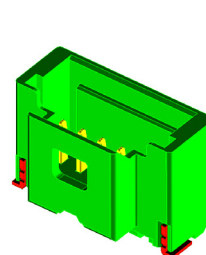
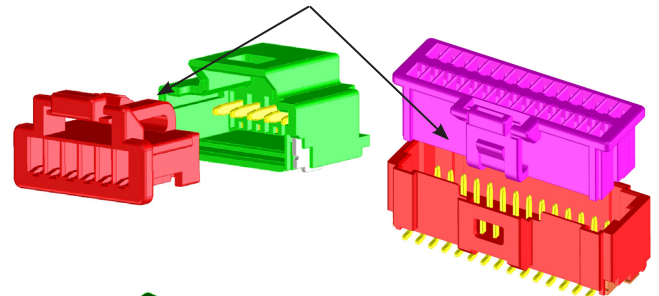
Outer Positive Lock



Inner Friction Lock



Inner Positive Lock



APPLICATIONS

- Plasma Display Panel (PDP) TV
- Liquid Crystal Display (LCD) TV
- Note PC
- Other Compact Devices



1.00mm (.039") Pitch Pico-Clasp™ Single and Dual Row Wire-to-Board Connectors

SECTION MATRIX

	Description	Order No.	Circuits	Lock	Housing Material	Terminal Material / Plating	Packaging
	Terminal for Single Row	501334-0000	-	-	-	Phosphor Bronze / Pre-Tin	Reel
	Terminal for Dual Row	501193-0000				Phosphor Bronze / Gold over Nickel	
	Single Row Inner Lock Receptacle Housing	501330-XX00	2-5	Inner Friction	66 Nylon, UL 94V-0, White	-	Bag
			6-15	Inner Positive			
	Single Row Inner Lock Straight Header	501331-XX07	2-5	Inner Friction	46 Nylon, UL 94V-0, Off White	Phosphor Bronze / Tin over Nickel	Embossed Tape
			6-15	Inner Positive	6T Nylon, UL 94V-0, Off White		
	Single Row Inner Lock Right-Angle Header	501568-XX07	2-5	Inner Friction	Heat Resistance Nylon, UL 94V-0, Off White	Phosphor Bronze / Tin over Nickel	Embossed Tape
			6-15	Inner Positive			
	Single Row Outer Lock Receptacle Housing	501939-XX00	3-5	Outer Positive	66 Nylon, UL 94V-0, White	-	Bag
	Single Row Outer Lock Straight Header	501940-XX07			6T Nylon, UL 94V-0, Off White	Phosphor Bronze / Tin over Nickel	Embossed Tape
	Single Row Outer Lock Right-Angle Header	501953-XX07					
	Dual Row Inner Lock Housing Receptacle	501189-XX10	20, 30, 40, 50	Inner Positive	66 Nylon, UL 94V-0, White	-	Bag
	Dual Row Inner Lock Housing Receptacle (With Side Friction Lock)	501189-XX21			66 Nylon, UL 94V-0, Grey		
	Dual Row Inner Lock Straight Header (With Tape)	501190-XX17			6T Nylon, UL 94V-0, White	Phosphor Bronze / Gold over Nickel	Embossed Tape
	Dual Row Inner Lock Straight Header	501190-XX27					
	Dual Row Inner Lock Right-Angle Header	501571-XX07			Heat Resistance Nylon, UL 94V-0, Off White		

*XX = Circuit size