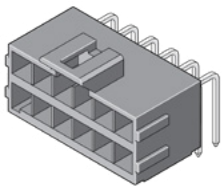
Ultra-Fit Power Connectors
3.50mm Pitch

molex

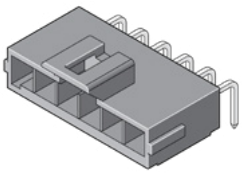
Ultra-Fit Tangless Connectors is a wire-to-board system that offers a 3.50mm pitch, a higher-current rating of 14.0A, and superior design options for flexibility and efficient assembly

Features and Advantages

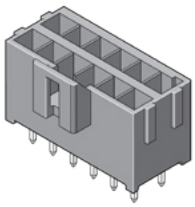
Multiple mechanical keying and color-coded options	Allow same-circuit, multiple connector use with virtually no chance of cross mating. Color coding provides visual indication of the proper mating connector — enabling faster assembly
17% reduction in pitch over similar power connectors	Current-dense design saves PCB space. Allows for smaller packaging without sacrificing current-carrying capabilities
Optional TPA (Terminal Position Assurance) retainer	Guarantees the terminal is fully seated in the housing to reduce terminal back-out. Retains terminal if main retention feature fails
Ultra low mating force terminal	Reduces operator fatigue and improves assembly compliance for high-circuit applications
Positive-lock housing with anti-snag design	Ensures mated connector assemblies will not accidentally disengage. Provides an audible click while mating. Protects latch from damage due to wire snags
Fully isolated terminals	Protect against potential damage of the header and receptacle terminals during handling and mating
Terminal interface with six independent points of contact (split-box terminal design)	Offers redundant, secondary current paths for long-term performance and reliability



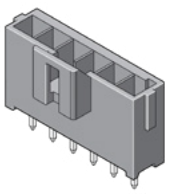
Dual-Row
Right-Angle Header
172316 Series



Single-Row
Right-Angle Header
172310 Series



Dual-Row
Vertical Header
172298 and
172299 Series

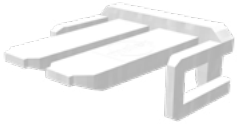


Single-Row
Vertical Header
172286 and
172287 Series

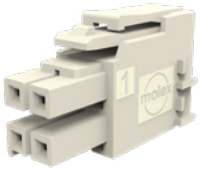
















Ultra-Fit Tangless Connector

Ultra-Fit Power Connectors
3.50mm Pitch

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Applications

Consumer / Home Appliance
- Washers
- Refrigerators

Telecommunications/Networking
- Hubs
- Servers

Transportation
- Infotainment
- Interior

Lighting
- Ballasts
- Home Lighting Fixtures

Aerospace and Defense
- C4ISR

Industrial
- Food and Beverage
- Assembly Line Equipment

Medical
- Patient Care Equipment
- Healthcare IT







Specifications

REFERENCE INFORMATION
Packaging: Bag, Tray, Reel
UL File No.: E29179
CSA File No.: LR19980
Mates With:
Series: 172258 Series: 172298
Series: 172256 Series: 172286
Use With:
Series: 172253 Series: 172258, 172256
Series: 172264 Series: 172258, 172256
Terminal Used:
Series: 172253
Designed In: Millimeters
RoHS: Yes
Halogen Free: Yes
Glow Wire Capable: Yes

ELECTRICAL
Voltage (max.): 600V AC (RMS) or DC
Current (max.): 14.0A
Contact Resistance (max.): 7 milliohms
Dielectric Withstanding Voltage: 1800 VAC
Insulation Resistance (min.): 1000 Megohms

MECHANICAL
Pitch: 3.50mm
Contact Insertion Force (max.): 14.7 N (3.3 lbf)
Contact Retention to Housing: 24.5N
Insertion Force to PCB: 35N MAX
Mating Force: 4.5N MAX
Un-mating Force: 7 milliohms
Durability (min.): Mate connectors up to 25 cycles at a maximum rate of 10 cycles per minute

PHYSICAL
ousing: 94 V-/Glow Wire Combo
Contact: High copper alloy
Plating: Tin over nickel overall
PCB Thickness: Standard 1.57mm
Operating Temperature: -40 to +105°C

Ordering Information

Series No.	Component	Orientation	Rows	Termination Style
172253	Crimp Terminal	---	---	---
172256	Receptacle Housing		Single	
172258			Dual	
172286	Header	Vertical	Single	Kinked Pin
172287				Solder Clip
172298			Dual	Kinked Pin
172299				Solder Clip
172310		Right-Angle	Single	Through Hole
172316			Dual	

TPA

Series	Description	Circuit	Color
172264	TPA	2 to 8	Black and Natural

www.molex.com/link/ultrafit.html

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