

Mini-Change Connectors >

Delivering optimum conductivity in a compact, rugged and field-proven quick-connect design, Brad Mini-Change Connectors offer the broadest selection of miniature sealed connectors available in the industrial market.



ADVANTAGES AND FEATURES

Ensures optimum electrical conductivity

using the patented Quad Beam socket contact with Stainless Steel sleeve to maintain consistent pressure on the male pin

Maintains low resistance through many mating/unmating cycles with Gold over Nickel-plated contacts that provide high-performance, long-lasting electrical conductivity

Prevents entry of water during temporary submersion at a limited depth due to an IP67-rated seal

Reduces cable stress and improves routing flexibility with tee- and h-connectors that enable direct and efficient cable routing, reduce bending stress, permit shorter cable runs, and facilitate use in space-constrained applications

Current (max.)	Up to 10.0A per pin
Voltage (max.)	600V AC
Locking Style	Threaded
Seal Rating	IP67
Poles	2 through 12, 14, 19
Standard Operating Temperatures	-20 to +80°C

Offers robust performance in harsh conditions

with integral strain relief providing 100 pounds minimum of cable strain relief and radiating stress in side-loaded conditions

Eases alignment and mating of connector

with a molded key indicator that helps guarantee correct mating



MARKETS AND APPLICATIONS

Industrial Automation

Conveyor belts
Safety switches
Auxiliary power for sensors/cameras
Safety devices
I/O applications

Electrical and Power

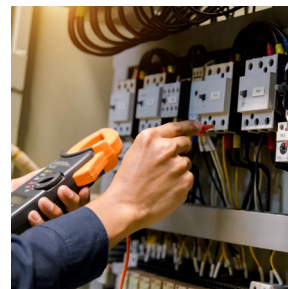
Power distribution equipment
Sensors
Relays

Telecommunications

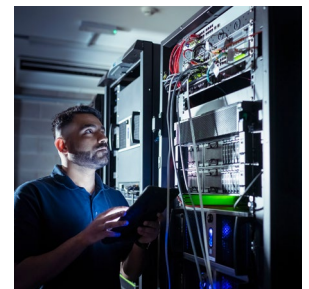
Multiple-component power distribution
Fans
Sensors



Conveyor Belts



Power Distribution Equipment



Multiple-Component Power Distribution

Mini-Change Connectors >

MINI-CHANGE ENGINEERING NUMBER KEY

Number of Pins

A-size pin options: 2, 3, 4, 5, 6

B-size pin options: 6, 7, 8

C-size pin options:

9 = 9 pins

1 = 10 pins

2 = 12 pins

3 = 19 pins

Connector Type

SE = single-ended

DE = double-ended

10 = SE Mini A-size

11 = DE Mini A-size

20 = SE Mini B-size

22 = DE Mini B-size

30 = SE Mini C-size

33 = DE Mini C-size

Configuration

F = female, **M** = male

Str = straight

000 = F str

001 = F 90°

006 = M str

007 = M 90°

020 = F str to M str

021 = F 90° to M str

022 = F str to M 90°

023 = F 90° to M 90°

030 = F str to M str

031 = F 90° to M str

032 = F str to M 90°

033 = F 90° to M 90°

SAMPLE ENGINEERING NUMBER

Search on [molex.com](https://www.molex.com) for this number

10 3 000 A 01 F 060

Additional Cable Detail

Cable types for Asian markets

A01 = yellow PVC,

16 AWG, 2- to 6-wire (STOOW, AC coloring)

B35 = gray WSOR,

1.50mm², 3- or 5-wire (AC or 24V DC control power)

B48 = gray WSOR, 1.50mm², 4-wire (24V DC control power)

B80 = black WSOR, 0.34/0.75mm², 12- or 19-wire (MPIS block)

K12 = yellow TPE, 16 AWG, 4-wire (24V DC control power)

K13 = yellow TPE, 16 AWG, 3-, 5- or 10-wire (AC or 24V DC control power, power + signal)

Length

M050 = 5.0m

M100 = 10.0m

T120 = 120.0m

F150 = 15 feet

Units

M = Meters

F = Feet

T = M x 10

Cable Jacket Material

A = PVC

B = PUR, WSOR

K = TPE

Mini-Change Connectors

SPECIFICATIONS

Reference Information

Designed in: Inches/millimeters

RoHS: Yes

UL File No.:

Mini-Change – E152210

Brad Power Mini-Change – E258922

Electrical

Voltage (max.):

14 and 16 AWG – 600V AC

18 and 22 AWG – 300V AC

Current (max.): Up to 10.0A per pin – varies based on number of conductors and wire gauge

Mechanical

Housing: TPE

Coupling Nut: Epoxy-coated Zinc

Contact: Copper Alloy, Gold-plated

Wire: Varies by cable type

Physical

Seal Rating: IP67

Vibration: Complies with MIL-STD 202F, test method 204, test condition B

Corrosion: 300-hour salt spray protection per MIL-STD 202 method 101

Standard Operating Temperatures: -20 to +80°C

www.molex.com