

Harsh Environment Connectivity Solutions



1/4" MIL- Type Open Frame Jack

MIL jacks mate with MIL-type phone plugs with .25 inch (6.35mm) or .21 inch (5.34mm) diameter bushings. Numbers C11 and C12B have a non-turn locating pin which keys the jack to the mounting surface. For low contact resistance applications, jack number C12A has fine silver contacts on shunts and tip springs.

MECHANICAL

Life: Commercial Jacks - 10,000 insertion/withdrawal cycles, minimum. Military Jacks - 20,000 insertions/withdrawals, minimum.

Mechanical Shock: Military Jacks - Per MIL-STD 202, method 213, Test Condition H (75g).

Vibration: Military Jacks - Per MIL-STD-202, method 213, (10-55 Hz).

Insertion/Withdrawal Forces: (see charts below)

Military Jacks			
Part Number	C11	C12A	C12B
Insertion (maximum)	6 lb.	7 lb.	6 lb.
Withdrawal (minimum)	2 lb.	3 lb.	1.5 lb.
Withdrawal (maximum)	7 lb.	7 lb.	5 lb.

ELECTRICAL

Contact Resistance: Commercial Jacks - .030 ohms maximum (initial), .050 ohms maximum (after humidity, durability exposure). Per MIL-STD-202E. Military Jacks - .010 ohms maximum (initial), .020 ohms maximum (after life), .10 ohms maximum (after salt spray).

Insulation Resistance: Commercial Jacks - 10,000 M(omega) minimum (initial), 1,000 M(omega) minimum (after humidity). Military Jacks - 10,000 M(omega) minimum (initial), 1,000 M(omega) minimum (after humidity, durability exposure).

Dielectric Withstanding Voltage: 500 V, 60 Hz (rms) AC.

Contact Rating: 1 A, 25 V DC.

ENVIRONMENTAL

Thermal Range: Commercial Jacks; -55°C to +85°C (non-operating); -20°C to +65°C (operating). Military Jacks; -55°C to +85°C (non-operating); -40°C to +65°C (operating).

Thermal Shock: Commercial Jacks - Per MIL-STD 202, method 107. Military Jacks - Per MIL-STD 202, method 107.

Humidity: Commercial Jacks - Per MIL-STD 202, method 106. Military Jacks - 0% to 95% operating and non-operating.

Salt Spray: Commercial Jacks - Per MIL-STD 202, method 101. Military Jacks - Per MIL-STD 202, method 101 (48 hours).

Moisture Resistance: Military Jacks - Per MIL-STD 202, method 106 (240 hours).

MATERIAL

Mounting Bushing: Nickel-plated copper alloy.

Insulation: Rigid plastic.

Springs: Special copper alloy. Integral contacts are standard in the isolated switching circuits; fine silver contacts in C12A switching circuit.

Sleeve Terminal: Copper alloy.

Hardware: Supplied with one Number P10001 copper alloy nickel-plated hex nut, and one Number S1022 steel nickel-plated washer - except copper alloy nickel-plated

washer Number S10451 supplied on C11, C12A and C12B.

* Commercial jacks feature integral contacts. Integral contacts should not be used where low contact resistance is a requirement.