

INTERFACE DESIGN STANDARD		The PHOENIX Company of Chicago, Inc. 22 GREAT HILL RD., NAUGATUCK, CT 06770 WWW.PHOENIXOFCHICAGO.COM PHONE: (800) 323-9562 FAX: (630) 206-1801	REV.	DESCRIPTION	DATE	APPR.
IDS-09J-STRAIGHT			B	PER ECN 12823	04/02/18	JEM
SHEET 1 OF 1			C	PER ECN 13001	6/21/18	JEM
DATE: 11/14/07			D	PER ECN 13033	7/23/18	JEM
DRAWN: EK	APPROVED: JEM		E	PER ECN 14215	11/26/24	DW

Description: 09J Series, SMB, Non-Magnetic Straight Connector

MATERIALS

<u>BODIES</u> Plug: Non-Magnetic Brass Receptacle: Non-Magnetic Brass	<u>INSULATORS</u> Virgin Teflon (PTFE) Per ASTM D1710
<u>CONTACTS</u> Male Contact: Non-Magnetic Brass Or Beryllium Copper Per ASTM B196 Female Contact: Beryllium Copper Per ASTM B196 Residual Magnetism < 1.0000 mu	<u>PLATING</u> Gold Per MIL-DTL-45204 (Electro Deposited) Copper Per SAE AMS 2418 (Electro Deposited)

FINISH (Ending Letter of Part Number)

Bodies: .000020" Min. Gold Over Copper	Center Contacts: Pin And Socket Per MIL-PRF-39012
Contacts: .000030" Min. Gold Over Copper	Engagement/ Disengagement Force: 40 oz. (2.5 lbs.) Max. Insertion 1 oz. (0.063 lbs.) Min. Withdrawal Per MIL-PRF-39012
Other Metal Parts: Gold Plated To Meet The Environmental Requirements	Engagement: Initial 224 oz. (14 lbs.) Max. After 500 Cycles 32 oz. (2 lbs.) Min.

ELECTRICAL

Frequency Range: DC To 4 GHz	Contact Resistance: 6.0 Milliohms
Voltage Rating Straight: 335 VRMS	VSWR: RG-178 Or Equivalent 1.30 + .04*f (GHz) RG-316 Or Equivalent 1.25 + .04*f (GHz)
Insulation Resistance: 1000 Megohms Min.	Corona Level: 70,000 ft.- 185 Volts (RG-178), 250 Volts (RG-316)
Insertion Loss: 0.3dB Max. 1.5 (GHz)	RF Leakage: -55 dB Min. @ 2-3 GHz
Impedance: 50 Ohms	RF High Potential: Solder Pot 600 VRMS RG-178 Or Equivalent 500 VRMS RG-316 Or Equivalent 700 VRMS

ENVIRONMENTAL

Operating Temperature: -65°C To +165°C
Vibration: MIL-STD-202, Method 204, Test Condition D
Shock: MIL-STD-202, Method 213, Test Condition A
Thermal Shock: MIL-STD-202, Method 107, Test Condition C
Durability: 500 Cycles
Corrosion: MIL-STD-202, Method 101, Test Condition B