



All dimensions are in mm; tolerances according to ISO 2768 m-H

Interface

According to SMA side: IEC 60169-15; EN 122110; MIL-STD-348
TNC side: IEC 60169-17, MIL-PRF-39012, DIN EN 122200

Documents

N/A

Material and plating

Connector parts	Material	Plating
Center contact	CuBe	AuroDur®, gold plated
Outer contact SMA	CuBe or equivalent	AuroDur®, gold plated
Outer contact TNC	Brass	Nickel, 2.5-5 µm
Dielectric	PTFE	
Gasket	Silicone	
Coupling nut SMA side	CuBe or equivalent	Gold, 0.1 µm

Electrical data

Impedance	50 Ω	
Frequency	DC to 10 GHz	
VSWR	$\leq 1.05 + 0.005 \times f$ [GHz]	
Insertion loss	$\leq 0.04 \times \sqrt{f(\text{GHz})}$ dB	
Insulation resistance	$\geq 5 \times 10^3$ MΩ	
Center contact resistance	≤ 3 mΩ, SMA side	≤ 1.5 mΩ, TNC side
Outer contact resistance	≤ 2 mΩ, SMA side	≤ 1 mΩ, TNC side
Test voltage	1000 V rms	
Working voltage	480 V rms	
Power handling (at 20 °C, sea level, VSWR 1.0)	≤ 80 W @ 2 GHz	

Mechanical data

	SMA side	TNC side
Mating cycles	min. 500	min. 500
Coupling nut retention	≥ 270 N	N/A
Center contact captivation: axial	≥ 27 N	≥ 27 N
Coupling test torque	max. 1.7 Nm	max. 1.7 Nm
Recommended torque	0.8 Nm to 1.1 Nm	0.46 Nm to 0.69 Nm

Environmental data

Temperature range	-65°C to +165°C
Thermal shock	MIL-STD-202, Meth. 107, Cond. B
Corrosion	MIL-STD-202, Meth. 101, Cond. B
Vibration	MIL-STD-202, Meth. 204, Cond. D
Shock	MIL-STD-202, Meth. 213, Cond. I
Moisture resistance	MIL-STD-202, Meth. 106
RoHS	compliant

Tooling

N/A

Suitable cables

N/A

Weight

Weight 10.2 g/pce

While the information has been carefully compiled to the best of our knowledge, nothing is intended as representation or warranty on our part and no statement herein shall be construed as recommendation to infringe existing patents. In the effort to improve our products, we reserve the right to make changes judged to be necessary.

Draft	Date	Approved	Date	Rev.	Engineering change number	Name	Date
Rong Fang	21/09/04	J_Krautenbacher	21.07.16	h00	15-1629	I_Wallner	21.07.16
Rosenberger Hochfrequenztechnik GmbH & Co. KG P.O.Box 1260 D-84526 Tittmoning Germany www.rosenberger.de					Tel.: +49 8684 18-0 email: info@rosenberger.de		Page 2 / 2