



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

Interface

According to IEC 61169-16, MIL-PRF-39012, CECC 22210

Documents

Assembly instruction 53 T1

Material and plating

Connector parts

Center contact	Brass
Outer contact	Brass
Body	Brass
Dielectric	PTFE
Gasket	Silicone

Plating

AuroDur®, gold plated
Silver, 3-6 µm
Silver, 3-6 µm

Technical Data Sheet

Rosenberger

N 50 Ω

Straight Plug

53S101-273B5

Electrical data

Impedance	50 Ω
Frequency	DC to 11 GHz
Return loss	≥ 35 dB, DC to 2 GHz ≥ 30 dB, 2 to 5 GHz ≥ 25 dB, 5 to 8 GHz ≥ 18 dB, 8 to 11 GHz
Insertion loss	≤ 0.05 dB
Insulation resistance	≥ 5 x10 ³ MΩ
Center contact resistance	≤ 1 mΩ
Outer contact resistance	≤ 0.25 mΩ
Working voltage	500 V rms
Power handling (at 20 °C, sea level, VSWR 1.0)	1000 W @ 1 GHz 700 W @ 2 GHz
RF-leakage	≥ 128 dB up to 1 GHz

- Limitations are possible due to the used cable type -

Mechanical data

Mating cycles	min. 500
Coupling nut retention	≥ 450 N
Coupling test torque	max. 1.7 Nm
Recommended torque	0.7 Nm to 1.1 Nm

Environmental data

Temperature range	-55°C to +155°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. B
Shock	MIL-STD-202, Meth. 213, Cond. I
Moisture resistance	MIL-STD-202, Meth. 106
RoHS	compliant

Tooling

N/A

Suitable cables

RG 401/U, UT 250, Flexiform 401

Weight

Weight 33.1 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.

For the installation of the electrotechnical equipment, particular electrotechnical expertise is required.



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