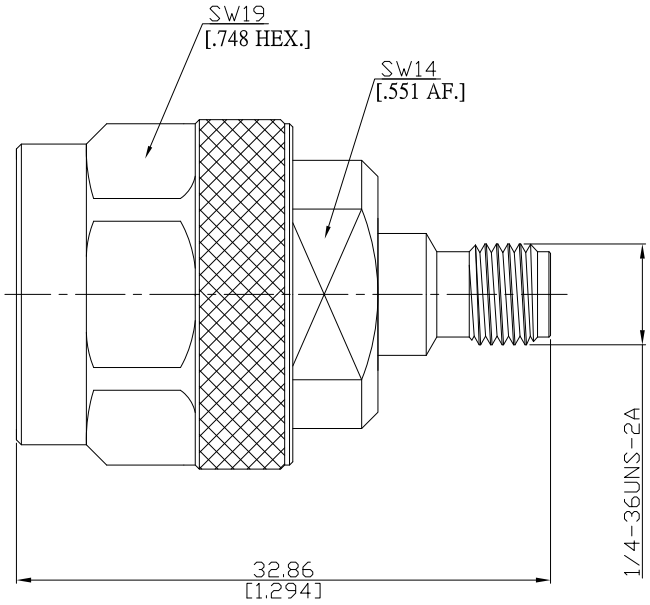
ROSNOL
RF/Microwave Interconnect

Technical Data Sheet

Precision N Plug (Male) to SMA Jack (Female) Straight Adapter DC-18 GHz VSWR≤ 1.15

AD-PCN1A25B / 9XX-91



All dimensions are in mm [inch]
Tolerances according to DIN ISO 2768-mH

Interface

Precision N according to	IEC 60169-16;MIL-STD-348/304;CECC 22 210
SMA according to	IEC 60169-15;CECC 22110; MIL-PRF-39012 SMA; MIL-STD-348/310

Electrical Data

Impedance	50 Ω	
Frequency	DC to 18 GHz	
VSWR	≤ 1.15 (≥ 23.13 dB)	
Insertion loss	≤ 0.1 x √F (GHz) dB	
Insulation resistance	≥ 5 GΩ	
Center contact resistance	≤ 1 mΩ, Precision N side;	≤ 3 mΩ, SMA side
Outer contact resistance	≤ 0.25 mΩ, Precision N side;	≤ 2 mΩ, SMA side
Test voltage	1000 V rms	
Working voltage	480 V rms	
RF-leakage	≥ 90 dB up to 1 GHz	

Material And Plating

Piece Parts (Precision N)	Material	Plating
Centre contact	Beryllium Copper	Gold plating, 3 µinch (Non-magnetic nickel-phosphorus underplating, 100 µinc)
Body	Stainless Steel	Passivated
Insulator	PTFE	
Gasket	Silicone Rubber	
Coupling nut	Stainless Steel	Passivated
Piece Parts (SMA)	**Material**	**Plating**
Centre contact	Beryllium Copper	Gold plating, 3 µinch (Non-magnetic nickel-phosphorus underplating, 100 µinc)
Body	Brass	Gold plating, 3 µinch (Non-magnetic nickel-phosphorus underplating, 100 µinc)
Insulator	PTFE	

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Mechanical Data

	Precision N side	SMA side
Coupling mechanisms	Screw-lock	Screw-lock
Mating cycles	min. 500	min. 500
Center contact captivation	≥ 28 N	≥ 28 N
Coupling test torque	1.70 Nm	1.70 Nm
Recommended torque	0.70 Nm to 1.10 Nm	0.80 Nm to 1.10 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

Packing

Single or 100

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