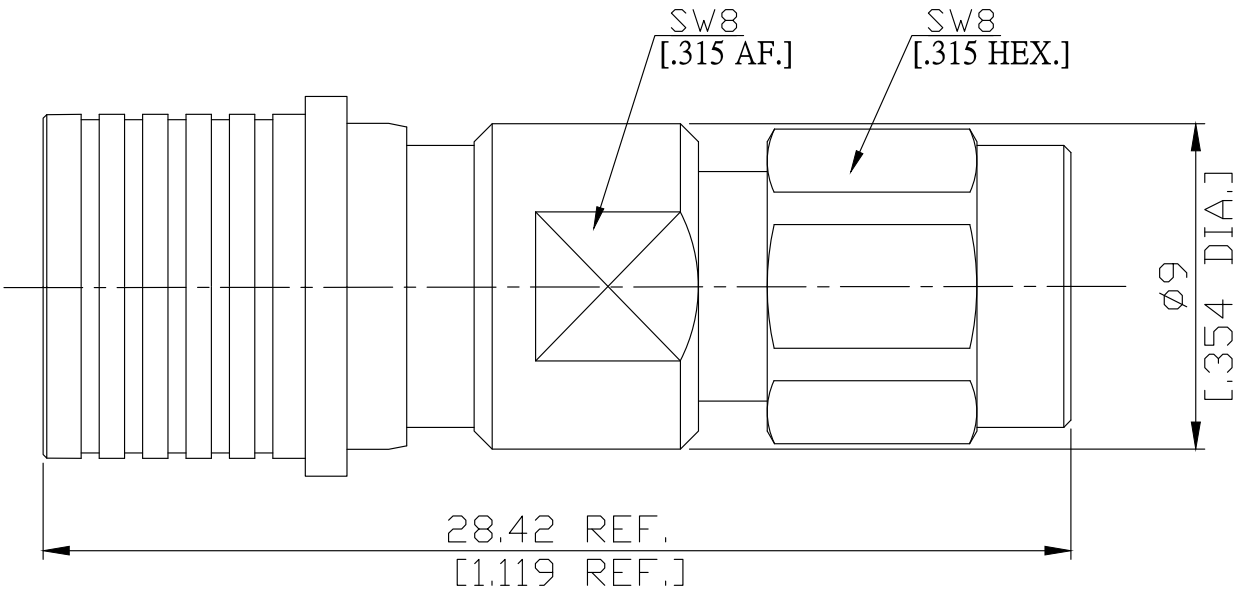
ROSNOL
RF/Microwave Interconnect

Technical Data Sheet

QMA Plug (Male) to SMA Plug (Male) Adapter
DC-18GHz VSWR 1.20

AD-QA1A15A / 944-944



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

Interface

	QMA Side	SMA Side
According to	IEC 61169-50	IEC 60169-15; MIL-STD-348B/310

Electrical Data

Impedance	50 Ω	
Frequency	DC to 18 GHz	
VSWR (Return Loss)	≤ 1.20 (≥ 20.83 dB)	
Insertion Loss	≤ 0.05 x √F (GHz) dB	
Insulation Resistance	≥ 5 GΩ	
Center Contact Resistance	≤ 3.0 mΩ, QMA Side	≤ 3.0 mΩ, SMA Side
Outer Contact Resistance	≤ 2.5 mΩ, QMA Side	≤ 2.0 mΩ, SMA Side
Test Voltage (at sea level)	1000 V rms	
Working Voltage (at sea level)	480 V rms	

Material And Plating

Piece Parts (QMA)	Material	Plating
Centre Contact	Beryllium Copper	Gold plating, 3 μinch (Non-magnetic nickel-phosphorus underplating, 80 μinch)
Body	Brass	Copper-Tin-Zinc Alloy
Insulator	PTFE	
Coupling nut	Brass	Copper-Tin-Zinc Alloy
Piece Parts (SMA)	**Material**	**Plating**
Centre Contact	Beryllium Copper	Gold plating, 3 μinch (Non-magnetic nickel-phosphorus underplating, 80 μinch)
Body	Brass	Copper-Tin-Zinc Alloy
Insulator	PTFE	
Coupling nut	Brass	Copper-Tin-Zinc Alloy

The facts and figures herein are carefully compiled to the best of our knowledge, but they are intended for general informational purposes only. In the effort to improve our products, we reserve the right to make changes judged to be necessary.

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Mechanical Data

	QMA Side	SMA Side
Coupling mechanisms	Quick-lock	Screw-lock
Mating Cycles	≥ 100	≥ 500
Coupling Nut Retention	N/A	N/A
Center Contact Captivation: axial	≥ 20 N	≥ 20 N
Weight	N/A	
Coupling Test Torque	N/A	0.5 Nm
Recommended Torque	N/A	0.56 Nm

Environmental Data

Temperature Range	-40°C to +85°C
Thermal shock	IEC 60169-1 16.4 (-40 / +85°C)
Corrosion	IEC 60169-1 16.7 (48 hours)
Vibration	IEC 60068-2-64 (random)
Damp heat, steady state	IEC 60169-1 16.3 (96 hours)
RoHS	compliant

Packing

Single or 100

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