

Technical Data Sheet		Rosenberger
Mini-SMP	Calibration Adaptor Jack/Jack	18K121-K20D3
All dimensions are in mm; tolerances according to ISO 2768 m-H		
Interface		
According to		MIL-STD-348 Mateable with GPPO™ (Gilbert Engineering Co., Inc.) and SSMP™ (Connectors Devices, Inc.)
Documents		
Application note		AN001 "Calibration Services"
Material and plating		
Connector parts		
Center conductor		Material CuBe
Outer conductor		CuBe
Dielectric		Plating Gold, min. 1.27 µm, over nickel
		PEEK
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 1 / 3

Electrical data

Frequency range	DC to 40 GHz
Return loss	≥ 24 dB, DC to 18 GHz ≥ 16 dB, 18 GHz to 40 GHz

Mechanical data

Mating cycles	
if mating part is Smooth bore	≥ 500
if mating part is Full detent	≥ 100
Engagement force	
- Smooth bore	11 N typical
- Full detent	19 N typical
Disengagement force	
- Smooth bore	11 N typical
- Full detent	29 N typical
Gauge	0.00 mm to 0.08 mm

General standard definition

For proper operation the vector network analyzer (VNA) needs a model describing the electrical behaviour of this calibration standard. The different models, units, and terms used will depend on the VNA type and they will have to be entered into the VNA. All values are based on typical geometry and plating.

Offset Z_0 / Impedance / Z_0	50 Ω
Offset Delay	50.0346 ps
Length (electrical) / Offset Length	15.00 mm
Offset Loss	4.00 G Ω /s
Loss	0.0348 dB/ $\sqrt{\text{GHz}}$

Environmental data

Operating temperature range ¹	+ 20 °C to +26 °C
Rated temperature range of use ²	0 °C to +50 °C
Storage temperature range	- 40 °C to +85 °C

RoHS	compliant
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¹ Temperature range over which these specification are valid.

² This range is underneath and above the operating temperature range, within the calibration adaptor is fully functional and could be used without damage.

Technical Data Sheet

Rosenberger

Mini-SMP

Calibration Adaptor
Jack/Jack

18K121-K20D3

Declaration of calibration options

Factory Calibration

Standard delivery for this calibration standard includes a Factory Calibration. The Calibration Certificate issued reports individual calibration results, **traceable to Rosenberger standards**, national / international standards are not available. Model based standard definitions are reported in an Agilent/Keysight, Rohde & Schwarz and Anritsu compatible VNA format.

Accredited Calibration

Not available.

For further, more detailed information see application note AN001 on the Rosenberger homepage.

Calibration interval

Recommendation 12 months

Packing

Standard 1 pce in box
Weight 4.0 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
Marcel Panicke	12.10.09	Markus Müller	07.11.16	d00	15-1674	Marion Striegler	07.11.16
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