



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

Interface

| | | |
|--------------|-----------|---|
| According to | QMA side: | Rosenberger 28S000-000, series QMA |
| | SMA side: | Rosenberger is an authorised QLF® manufacturer IEC 60169-15; EN 122110; MIL-STD-348A, Fig. 310 |

Documents

N/A

Material and plating

Connector parts

Center contact
Outer contact QMA side
Outer contact SMA side
Dielectric
Unlocking sleeve
Coupling nut SMA side
Gasket

Material

Brass
Spring bronze
Brass
PTFE
Brass
Brass
Silicone

Plating

AuroDur®, gold plated
White bronze(e.g. Optalloy®)
Flash white bronze over silver(e.g. Optargen®)

White bronze(e.g. Optalloy®)
White bronze(e.g. Optalloy®)

Electrical data

| | | |
|---------------------------|----------------------------------|------------------|
| Impedance | 50 Ω | |
| Frequency | DC to 18 GHz | |
| Return loss | ≥ 32 dB, DC to 3 GHz | |
| | ≥ 28 dB, 3 to 6 GHz | |
| Insertion loss | ≤ 0.03 x √f(GHz) dB, DC to 6 GHz | |
| Insulation resistance | ≥ 5 x10 ³ MΩ | |
| Center contact resistance | ≤ 3 mΩ, QMA side | ≤ 3 mΩ, SMA side |
| Outer contact resistance | ≤ 2.5 mΩ, QMA side | ≤ 2 mΩ, SMA side |
| Test voltage | 1000 V rms | |
| Working voltage | 480 V rms | |
| RF-leakage | ≥ 95 dB up to 2 GHz | |
| | ≥ 80 dB up to 4 GHz | |
| | ≥ 70 dB up to 6 GHz | |

Mechanical data

| | | |
|-----------------------------------|-----------|-------------|
| | QMA side | SMA side |
| Mating cycles | min. 100 | min. 100 |
| Coupling nut retention | N/A | ≥ 180 N |
| Center contact captivation: axial | ≥ 20 N | ≥ 20 N |
| Coupling test torque | N/A | 0.5 Nm |
| Recommended torque | N/A | max. 0.6 Nm |
| Engagement force | typ. 25 N | N/A |
| Disengagement force | typ. 20 N | N/A |
| Retention force for interface | 60 N min. | N/A |

Environmental data

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

Weight

| | |
|--------|------------|
| Weight | 9.21 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.

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|--|----------|-------------------|----------|------|--|-----------|---------------|
| Draft | Date | Approved | Date | Rev. | Engineering change number | Name | Date |
| Rong Fang | 26/02/07 | Sa. Krautenbacher | 13.03.14 | d00 | 14-0352 | T. Krojer | 13.03.14 |
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