



■ Stripline Phase-adjustable Adapters

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Application

System Use: "Set the electrical length with no locking needed due to the design."

- Precision Phase Adjusters, DC to 8.0 GHz
- Small housing, flat pack configuration.
- Two mounting locations are provided. Other mounting positions are offered on request.
- Impedance of 50 Ohms is maintained over the full adjustment range.
- Smooth continuous phase adjustment.
- The electrical length change does not require an external physical length change.
- Rugged construction: housing is made from aluminum, connector outer conductors from stainless steel.
- Captivated connector center contacts.
- Operating temperature range: -10°C to +115°C.
- Differences of the designs to the right are: round vs. square housing and 4-hole flanged connector vs. 2-hole flange.
- Different connector configurations may be offered on request. The Housing height may change.

The design shall be such that the outline dimensions are met. In addition, the connectors shall meet the interface dimensions per MIL-PRF-39012.

Materials

Aluminum	AlMg4.5Mn per DIN 1725, AlMgSi0.5 per DIN 1725, AlMgSi1 per DIN 1725 (6061-T6 per QQ-A-225/8)
Steel	corrosion resistant 1.4305 per DIN 17440 (QQ-S-764, class 303 or ASTM-A-582-80)
Brass	CuZn39Pb3 per DIN 17660 (QQ-B-626, half hard)
Copper Beryllium	33-25 CuBe2Pb H per DIN 17666 (QQ-C-530)
PTFE	Fluorocarbon per DIN 52900 (MIL-P-19468 and L-P403)
Silicone Rubber	per DIN 3771 (MIL-R-5847 and ZZ-R-765, Class II B,) Grade 50 - 75
Stripline	per in-house specification

Surface Treatments

Center Contacts	shall be gold plated to a minimum thickness of .00005 inch (1.27 μm) in accordance with MIL-G-45204, Type II, Grade C.
Stainless Steel	connector housings shall be passivated per QQ-P-35.

Product Overview

Part No.	Connectors/ Sex	Frequency Range (GHz)	VSWR max.	Insertion Loss max. (dB)	Phase Shift min.	Turn Angle approx.	Insertion Phase typ. min. - max.	Material/ Weight
LS-L108-2121	SMA female/female	DC - 8.0 GHz	1.30:1	0.8	22° @ 1.0 GHz 65° @ 3.0 GHz 130° @ 6.0 GHz 175° @ 8.0 GHz	55°	1.0 GHz: 110 - 130 3.0 GHz: 325 - 390 6.0 GHz: 650 - 780 8.0 GHz: 865 - 1040 Electrical Length typ.: 9.0 cm min. 10.8 cm max.	Aluminum, iridite finish 45 g (1.56 oz)
LS-L208-2121								
LS-L308-2121								
LS-L408-2121								
LS-K108-2121								Aluminum, iridite finish 50 g (1.76 oz)
LS-K208-2121								
LS-K308-2121								
LS-K408-2121								

Phase Shift vs. Frequency

