

FLEXIBLE CABLE RG178

(MIL-C-17/93-RG178)



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Application:

RG178 is one of the most popular PTFE RG cables. This cable has a good flexibility and a better attenuation than RG174.

Usable in severe thermal conditions, this cable is compatible with a large range of connector series.

CONSTRUCTION / DIMENSIONS			
	material	mm	inches
Center conductor	stranded SPCCS(1)	0.3	0.012
Dielectric	solid FEP (2)	0.85	0.033
Inner shield	SPC(3) braid	1.33	0.052
Outer shield	-	-	-
Jacket black	Brown FEP(4)	1.8	0.0315

- (1) SPCCS= Silver Plated Copper clad steel 7x0.1mm
 (2) FEP = Fluoroethylene propylene
 (3) SPC = Silver plated copper
 (4) FEP = Fluorinated Ethylene Propylene

ELECTRICAL CHARACTERISTICS	
characteristic impedance	50Ω ± 2Ω
operating frequency range	DC - 3 GHz
shielding effectiveness	40 dB @1GHz
voltage withstanding	500 V rms
peak power	1.0 kW
capacitance	96 pF / m 29 pF / ft
velocity of propagation	69 % (4.8 ns / m)

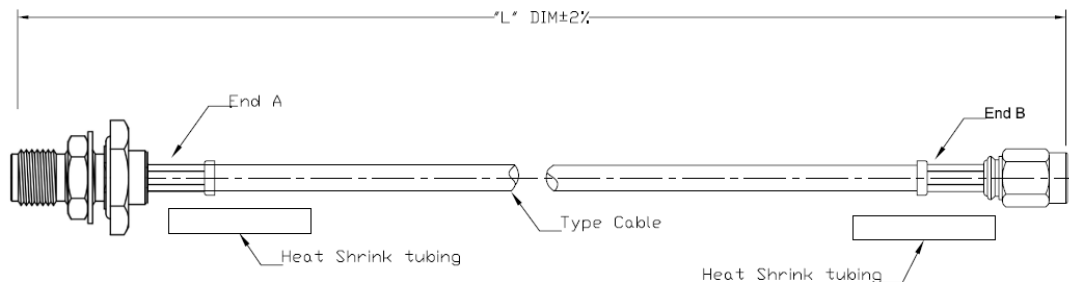
Note: typical VSWR for the cable assembly
VSWR=1.25:1

MECHANICAL CHARACTERISTICS		
recommended minimum bending radius	10 mm inch	0.245
weight	8.4 g / m	0.0060 lbs / ft

FREQUENCY / ATTENUATION MAX POWER (sea level / 25 °C)			
GHz	dB/ m	dB / ft	Watts
0.1	0.5	0.17	134
0.2	0.6	0.18	98
0.3	0.83	0.25	95
0.5	1.06	0.33	78
1.0	1.6	0.46	55
1.5	1.99	0.607	42
2.0	2.35	0.8	36
2.5	2.65	0.81	33
3.0	2.97	0.905	30
attenuation calculation (dB/m)	(1.414 x √f GHz) + (0.17 x f GHz)		
power calculation (W)	52 / √f GHz		

Note: typical attenuation for a couple of connectors
(dB) = 0.075 x √f (GHz)

ENVIRONMENTAL CHARACTERISTICS		
operating temperature range	-55 / +200 °C	-67 / +392 °F
fire resistance	Yes(CSA FT6/IEC332-2)	
halogen free	NO	



- TYPE COAX CABLE
- CONNECTOR ON END A
- CONNECTOR ON END B
- LENGTH: Standard = overall length (or please specify if length between references planes)
 - length tolerance (standard = ±2%)