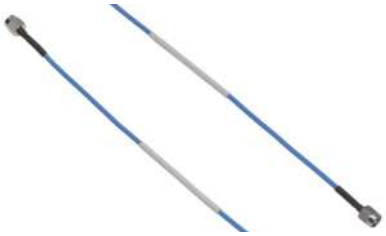
Flexible Microwave Cable Assemblies

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Flexible Microwave Cable Assemblies deliver high performance with proven cable technology and connector termination expertise

High-performance, Flexible Microwave Cable Assemblies replace stiff and difficult-to-install semi-rigid assemblies. Constructed from Temp-Flex coaxial cables and Molex RF connectors, the Flexible Microwave Cables offer excellent electrical properties and are assembled using proprietary techniques to minimize Voltage Standing Wave Ratio (VSWR) and insertion loss for the ideal cable and connector combination.

The cables come standard with silver-plated conductors, fluoropolymer (PFA) dielectric, double shields and FEP jacket. The solid-core low-loss cables use proprietary low-loss PFA dielectric with 70% velocity of propagation (VoP). The air-dielectric ultra-low-loss cables use a unique air-enhanced design with up to 87% VoP. Connector options include SMA, 2.92mm, SMP, SMPM and many others.



Flexible Microwave Cable Assemblies with Temp-Flex Solid-Core Low-Loss and Air-Dielectric Ultra-Low-Loss Cables

Features and Benefits

Cable impedance of 50 ± 1 Ohms
Provides consistent electrical performance

Solid-core low-loss fluoropolymer (PFA)
Provides assemblies with low voltage standing wave ratio (VSWR)

Dual shielded using helically wrapped foil covered by a braided shield
Delivers excellent shielding effectiveness greater than 100 dB



Air-dielectric, ultra-low-loss assemblies
Used for assemblies with lowest possible attenuation

Propriety air-dielectric, ultra-low-loss connector-to-cable termination expertise
Ensures optimized cable assembly performance

Ordering Information

*Temp-Flex Cable Performance Characteristics**

Cable Part No.*	Impedance (Ohms)	VOP (%)	Capacitance	Static Bend Radius (min.)	Center Conductor	Insulation	Jacket	Outside Diameter	Cut-Off Frequency
100067-1047	50+/-1	70	29 pF/ft	0.20"	0.0113"	PFA	FEP	.061"	112 GHz
100067-1086				0.30"	0.0201"			.101"	62 GHz
100067-1141				0.50"	0.036"			.158"	41 GHz
100054-0007		87	23.0 pF/ft	0.30"	0.0126"			.056"	143 GHz
100054-0006		87	23.4 pF/ft	0.38"	0.0253"			.101"	72 GHz
100054-0008		87	23.3 pF/ft	0.75"	0.0453"			.158"	42 GHz
100054-0027		87	23.3 pF/ft	1.00"	0.0571"			.210	31 GHz
100054-0028		87	23.3 pF/ft	1.60"	0.0907"			.310	19 GHz

*Part numbers are for design reference only; not published on molex.com

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Ordering Information

Temp-Flex Air-Dielectric Ultra-Low-Loss cables

Order No.	Connector-to-Connector	Cable Type	Length (mm/inches)	Voltage Standing Wave Ratio (VSWR)	Insertion Loss (dB)
89762-1320	2.92mm ST Plug to 2.92mm ST Plug	086 Ultra-Low-Loss	152.40 / 6.00	1.50 max. to 35 GHz	0.9
89762-1321			228.60 / 9.00		1.2
89762-1322			304.80 / 12.00		1.6
89762-1323			381.00 / 15.00		2.0
89762-1324			457.20 / 18.00		2.4
89762-1370	SMA ST Plug to SMA ST Plug	141 Ultra-Low-Loss	152.40 / 6.00	1.35 max. to 26 GHz	0.4
89762-1371			304.80 / 12.00		0.70
89762-1400	SMA ST Plug to SMP ST Jack	086 Ultra-Low-Loss	152.40 / 6.00	1.50 max. to 26 GHz	0.70
89762-1401			228.60 / 9.00		1.07
89762-1402			304.80 / 12.00		1.45
89762-1420	SMP ST Jack to SMP ST Jack		152.40 / 6.00	1.70 max. to 40 GHz	1.15
89762-1421			228.60 / 9.00		1.50
89762-1422			304.80 / 12.0		1.80
73419-8310	SMA ST Plug to SMA ST Plug	210 Ultra-Low-Loss	914.4 / 36	1.50 max. to 18 GHz	1.35
73419-8311			1828.8 / 72		2.55
73419-8320	N ST Plug to N ST Plug	310 Ultra-Low-Loss	914.4 / 36	1.60 max. to 11 GHz	1.2
73419-8321			1828.8 / 72		1.8

Ordering Information

Temp-Flex Solid-Core Low-Loss cables

Order No.	Connector-to-Connector	Cable Type	Length (mm/inches)	Voltage Standing Wave Ratio (VSWR)	Insertion Loss (dB)
89762-1540	2.92mm ST Plug to 2.92mm ST Plug	086 Low-Loss	152.40 / 6.00	1.50 max. to 40 GHz	1.00
89762-1541			228.60 / 9.00		1.43
89762-1542			304.80 / 12.00		1.85
89762-1543			381.00 / 15.00		2.15
89762-1544			457.20 / 18.00		2.85
89762-1580		047 Low-Loss	152.40 / 6.00	1.55 max. to 40 GHz	1.65
89762-1581			228.60 / 9.00		2.30
89762-1582			304.80 / 12.00		2.90
89762-1583			381.00 / 15.00		3.60
89762-1584			457.20 / 18.00		4.20

www.molex.com/link/flexiblemicrowavecables.html

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