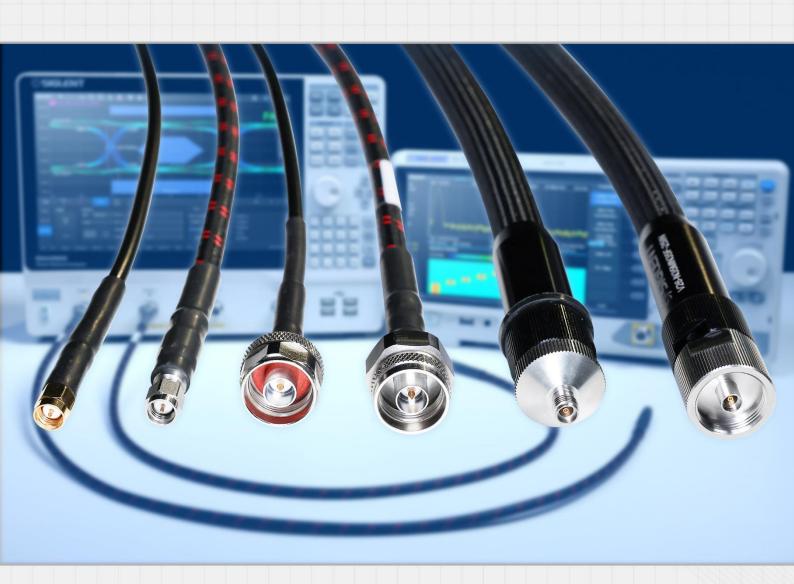


射频线缆&连接器

RF Cable & Adaptor 数据手册 (CN02B)



深圳市鼎阳科技股份有限公司 SIGLENT TECHNOLOGIES CO..LTD

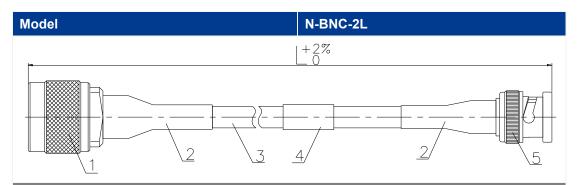


鼎阳科技射频线缆&连接器数据手册

在射频领域中,各种接口类型及工作频段的线缆和连接器让人眼花缭乱,作为测试环节中连接被测物与测量仪器的重要一环,其质量好坏对测试结果影响巨大。鼎阳科技根据实际测试需求提供多种材质、接口类型以及工作频率的高质量射频线缆及连接器。

类型	型号	接口类型	频率范围	长度(mm)	特性阻抗
	N-BNC-2L	N (Male) – BNC (Male)	DC ~ 2 GHz	700	50Ω
	N-N-6L	N (Male) – N (Male)	DC ~ 6 GHz	700	50Ω
	N-SMA-6L	N (Male) – SMA (Male)	DC ~ 6 GHz	700	50Ω
	S06-NMSF-1M	N (Male) – SMA (Female)	DC ~ 6 GHz	1000	50Ω
	N-N-18L	N (Male) – N (Male)	DC ~ 18 GHz	1000	50Ω
	N-SMA-18L	SMA-18L N (Male) – SMA (Male)		1000	50Ω
	S18-NMSF-1M	N (Male) – SMA (Female)	DC ~ 18 GHz	1000	50Ω
	SMA-SMA-18L	SMA (Male) – SMA (Male)	DC ~ 18 GHz	1000	50Ω
	SMA-SMA-26L	SMA (Male) – SMA (Male)	DC ~ 26.5 GHz	1000	50Ω
射频线缆	SMAF-SMA-26L	SMA (Male) – SMA (Female)	DC ~ 26.5 GHz	1000	50Ω
71 9V = X = X	V26-N35MN35F- 25IN	NMD 3.5 mm (Female) – NMD 3.5 mm (Male)	DC ~ 26.5 GHz	635	50Ω
25 S4 V5	V26-N35FA35F- 25IN	NMD 3.5 mm (Female) – APC 3.5 mm (Female)	DC ~ 26.5 GHz	635	50Ω
	S40-29M29F-1M	2.92 mm (Male) – 2.92 mm (Female)	DC ~ 40 GHz	1000	50Ω
	V50-N24MN24F- 25IN	NMD 2.4 mm (Female) - NMD 2.4 mm (Male)	DC ~ 50 GHz	635	50Ω
	V50-N24FA24F- 25IN	NMD 2.4 mm (Female) – APC 2.4 mm (Female)	DC ~ 50 GHz	635	50Ω
2.92F-2.92F-40A	2.92F-2.92F-40A	2.92 mm (Female) - 2.92 mm (Female)	DC ~ 40 GHz		50Ω
连接器	1.85F-2.92F-40A	1.85 mm (Female) - 2.92 mm (Female)	DC ~ 40 GHz		50Ω
	1.85F-1.85F-67A	1.85 mm (Female) - 1.85 mm (Female)	DC ~ 67 GHz		50Ω
		N(M)-SMA(M) 线缆	DC ~ 6 GHz	700	50Ω
\Z m P	UkitSSA3X	N(M)-N(M) 线缆	DC ~ 6 GHz	700	50Ω
通用工具		N(M)-BNC(F) 连接器 x2	DC ~ 2 GHz		50Ω
套件		N(M)-SMA(F) 连接器 x2	DC ~ 6 GHz		50Ω
		N-N 10 dB 1W 衰减器	DC ~ 6 GHz		50Ω





Parts

- L Cable length (L=0.7M)
- 1 N Male connector (nickel plated copper)
- 2 High temperature Shrinking tube
- 3 RG223 cable (outer diameter 5.3 mm)
- 4 Tag
- 5 BNC Male connector (nickel plated copper)

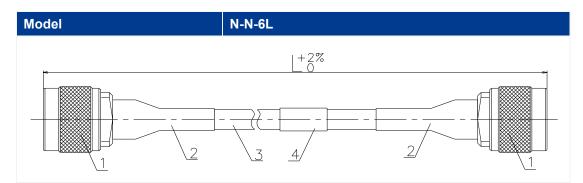
Specifications		
Frequency	DC ~ 2 GHz	
Impedance	50 Ω	
VSWR	≤1.20@DC~2GHz	
Insertion loss	≤1.0dB@2GHz	
Velocity of propagation	66%	
Dielectric withstand voltage	≥1000V	
Insulation resistance	≥5000MΩ	
Minimum bending radius	25mm	
Temperature range(Operation)	-55°C∼+85°C	
Length	700 mm	

Package and storage

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C $^{\circ}$ +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





Parts

- L Cable length (L=0.7M)
- 1 N Male connector (nickel plated copper)
- 2 High temperature Shrinking tube
- 3 RG223 cable (outer diameter 5.3 mm)
- 4 Tag

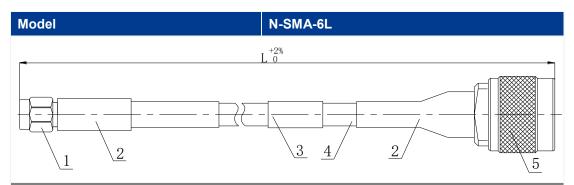
Specifications		
Frequency	DC ~ 6 GHz	
Impedance	50 Ω	
VSWR	≤1.25:1@6GHz	
Insertion loss	≤1.8dB@6GHz	
Velocity of propagation	66%	
Dielectric withstand voltage	≥1000V	
Insulation resistance	≥5000MΩ	
Minimum bending radius	25mm	
Temperature range(Operation)	-55℃~+85℃	
Length	700 mm	

Package and storage

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C $^{\circ}$ +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





Parts

- L Cable length (L=0.7M)
- 1 SMA Male connector (nickel plated gold)
- 2 High temperature Shrinking tube
- 3 RG223 cable (outer diameter 5.3 mm)
- 4 Tag
- 5 N Male connector (nickel plated copper)

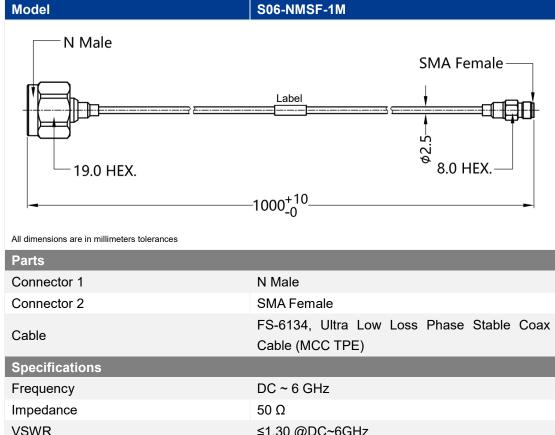
Specifications		
Frequency	DC ~ 6 GHz	
Impedance	50 Ω	
VSWR	≤1.25:1@6GHz	
Insertion loss	≤1.8dB@6GHz	
Velocity of propagation	66%	
Dielectric withstand voltage	≥1000V	
Insulation resistance	≥5000MΩ	
Minimum bending radius	25mm	
Temperature range(Operation)	-55℃~+85℃	
Length	700 mm	

Package and storage

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C $^{\circ}$ +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





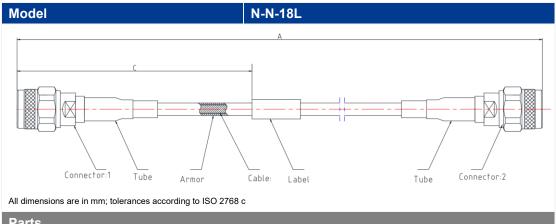
	casio (Mee 11 L)
Specifications	
Frequency	DC ~ 6 GHz
Impedance	50 Ω
VSWR	≤1.30 @DC~6GHz
Insertion loss	≤2.30dB @DC~6GHz
Velocity of propagation	76%
Voltage rating	335V (rms)
Dielectric withstanding voltage	500V (DC)
Insulation resistance	500ΜΩ
Minimum bending radius static	13 mm
Minimum bending radius dynamic	25 mm
Recommended coupling torque	7-10 in-lbs
Coupling nut retention force	≥60 lbs
Durability	≥500 cycles
Temperature range(Operation)	-40℃~+85℃
RoHS & REACH	compliant

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The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10° C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





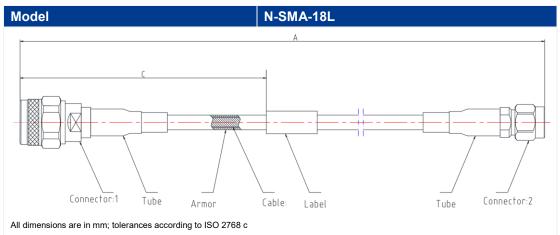
Parts		
Connector 1	N Male	
Connector 2	N Male	
Cable	RTK Flex 402-YB Low IL(or equivalent type)	
Label	Label Stick	
Tube High temperature Shrinking tube		
Armor	Stainless steel interlocked hose with PTFE	
Allioi	wire(black+red) jacket	
Nominal values @20°C ambient temperature		

Specifications	
Frequency	DC ~ 18 GHz
Impedance	50 Ω
VSWR	≤1.35 to 18 GHz
Insertion loss	≤2.3dB@DC~18GHz
Velocity of propagation	76%
Phase stability vs. Flexure	≤±10°@18 GHz (Wrapped around a 50mm diameter mandrel)
Amplitude stability vs. Flexure	≤±0.1 dB@18 GHz (Wrapped around a 50mm diameter mandrel)
Minimum bending radius	50.8 mm
Cable Diameter(with armor)	6.6 mm
Temperature range(Operation)	-40°C∼+125°C
RoHS	compliant
Length A	1000±10 mm
Length C	100±10 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C $^{\circ}$ +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





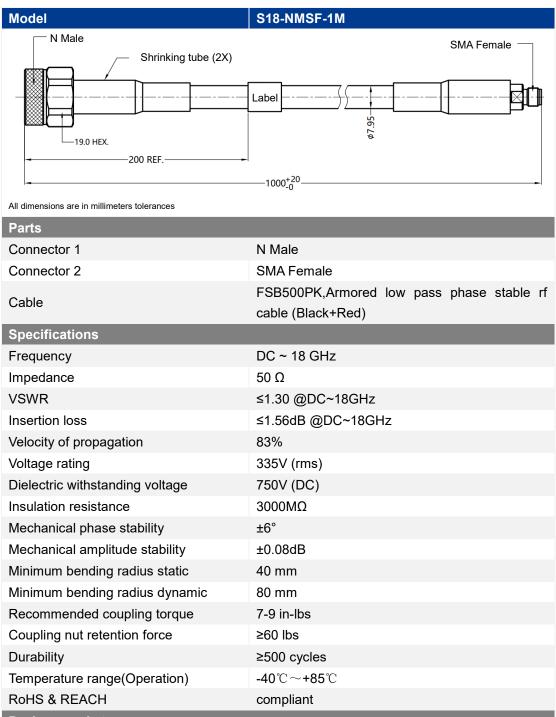
Parts	
Connector 1	N Male
Connector 2	SMA male
Cable	RTK Flex 402-YB Low IL(or equivalent type)
Label	Label Stick
Tube	High temperature Shrinking tube
Armor	Stainless steel interlocked hose with PTFE
	wire(black+red) jacket
Nominal values @20°C ambient temperature	

Specifications		
Frequency	DC ~ 18 GHz	
Impedance	50 Ω	
VSWR	≤1.35 to 18 GHz	
Insertion loss	≤2.3dB@DC~18GHz	
Velocity of propagation	76%	
Phase stability vs. Flexure	≤±10°@18 GHz (Wrapped around a 50mm diameter mandrel)	
Amplitude stability vs. Flexure	≤±0.1 dB@18 GHz (Wrapped around a 50mm diameter mandrel)	
Minimum bending radius	50.8 mm	
Cable Diameter(with armor)	6.6 mm	
Temperature range(Operation)	-40℃~+125℃	
RoHS	compliant	
Length A	1000±10 mm	
Length C	100±10 mm	
Package and storage		

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.

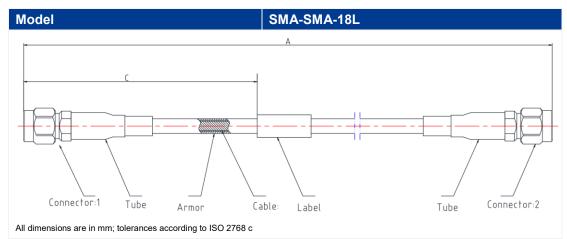




The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: $-10^{\circ}\text{C} \sim +40^{\circ}\text{C}$, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





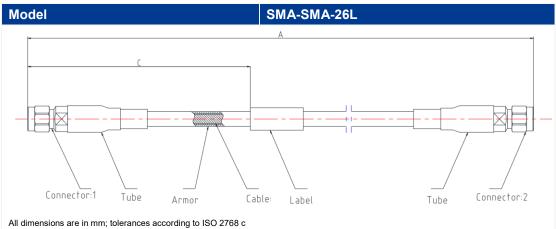
Parts	
Connector 1	SMA Male
Connector 2	SMA Male
Cable	RTK Flex 402-YB Low IL(or equivalent type)
Label	Label Stick
Tube	High temperature Shrinking tube
Armor	Stainless steel interlocked hose with PTFE
Allioi	wire(black+red) jacket
Nominal values @20°C ambient temperature	

Specifications	
Frequency	DC ~ 18 GHz
Impedance	50 Ω
VSWR	≤1.25 to 18 GHz
Insertion loss	≤2.3dB@DC~18GHz
Velocity of propagation	76%
Phase stability vs. Flexure	≤±10°@18 GHz (Wrapped around a 50mm diameter mandrel)
Amplitude stability vs. Flexure	≤±0.1 dB@18 GHz (Wrapped around a 50mm diameter mandrel)
Minimum bending radius	50.8 mm
Cable Diameter(with armor)	7.7 mm
Temperature range(Operation)	-40℃~+125℃
RoHS	compliant
Length A	1000±10 mm
Length C	100±10 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





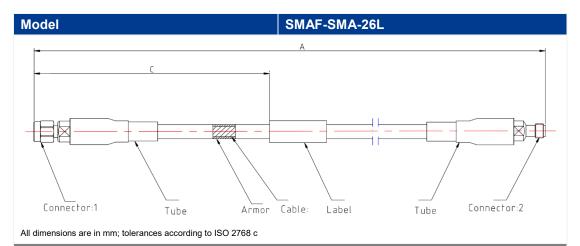
Parts	
Connector 1	SMA Male
Connector 2	SMA Male
Cable	RTK Flex 402-YB Low IL(or equivalent type)
Label	Label Stick
Tube	Shrinking tube
Armor	Stainless steel interlocked hose with PTFE
Allioi	wire(black+red) jacket
Specifications	
Frequency	DC ~ 26.5 GHz

Specifications	
Frequency	DC ~ 26.5 GHz
Impedance	50 Ω
VSWR	≤1.3 to 26.5 GHz
Insertion loss	≤2.0 dB@DC~18 GHz
Velocity of propagation	76%
Phase stability vs. Flexure	≤±8°@26.5 GHz (Wrapped around a 50mm diameter mandrel)
Amplitude stability vs. Flexure	≤±0.2 dB@26.5 GHz (Wrapped around a 50mm diameter mandrel)
Minimum bending radius	50.8 mm
Cable Diameter(with armor)	7.7 mm
Temperature range(Operation)	-40℃~+100℃
RoHS	compliant
Length A	1000±10 mm
Length C	200±10 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





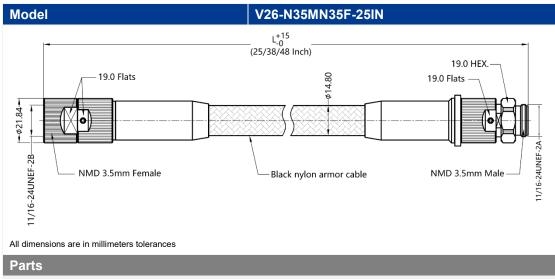
Parts	
Connector 1	SMA Male
Connector 2	SMA Female
Cable	RTK 161-YB (or equivalent type)
Label	Label Stick
Tube	Shrinking tube
Armor	Stainless steel interlocked hose with PTFE
	wire(black+red) jacket

Specifications	
Frequency	DC ~ 26.5 GHz
Impedance	50 Ω
VSWR	≤1.3 to 26.5 GHz
Insertion loss	≤1.6dB@DC~18GHz, 2.0dB@18~26.5GHz
Velocity of propagation	76%
Phase stability vs. Flexure	≤ $\pm 8^{\circ}$ @26.5 GHz (Wrapped around a 50mm diameter mandrel)
Amplitude stability vs. Flexure	≤±0.2 dB@26.5 GHz (Wrapped around a 50mm diameter mandrel)
Minimum bending radius	38.5 mm
Cable Diameter(with armor)	7.7 mm
Temperature range(Operation)	-40°C∼+125°C
RoHS	compliant
Length A	1000±10 mm
Length C	200±10 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





All dimensions are in millimeters tolerances	
Parts	
Coupling nut	Stainless steel, passivated
Body	Stainless steel, passivated
Contact pin	Beryllium copper, gold plated
Insulator	PEI & PEEK, natural
Cable	Stainless steel double buckle black nylon armor
Specifications	
Frequency	DC ~ 26.5 GHz
Impedance	50 Ω
VSWR	≤1.25
Insertion loss	≤2.16 dB
Velocity of propagation	76%
Mechanical phase stability	≤±2.7°
Mechanical amplitude stability	≤±0.08 dB
Min. bending radius static	74 mm
Min. bending radius dynamic	148 mm
Recommended coupling torque	9-14 in-lbs
Coupling nut retention force	100 lbs
Durability	50,000 Cycles(FLEX)
Voltage rating	325 Vrms

Insulation resistance

RoHS & REACH

Length

Dielectric withstanding voltage

Temperature range(Operation)

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

750V(DC)

 $5000\;\text{M}\Omega$

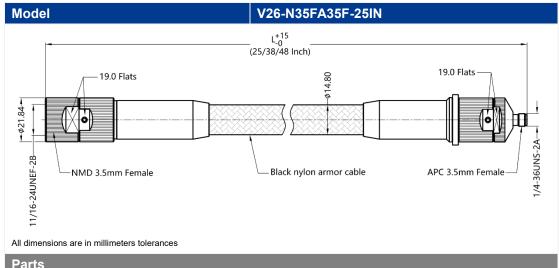
compliant

635 mm

-40℃~+85℃

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





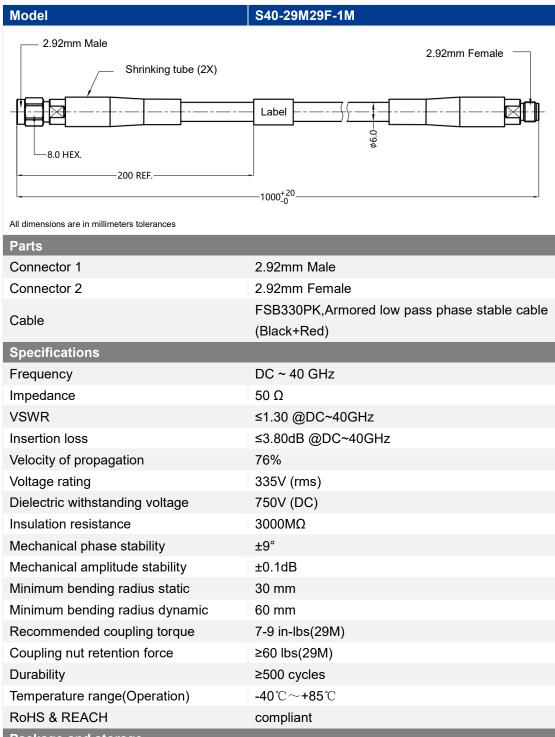
Parts	
Coupling nut	Stainless steel, passivated
Body	Stainless steel, passivated
Contact pin	Beryllium copper, gold plated
Insulator	PEI & PEEK, natural
Cable	Stainless steel double buckle black nylon armor

Specifications	
Frequency	DC ~ 26.5 GHz
Impedance	50 Ω
VSWR	≤1.25
Insertion loss	≤2.16 dB
Velocity of propagation	76%
Mechanical phase stability	≤±2.7°
Mechanical amplitude stability	≤±0.08 dB
Min. bending radius static	74 mm
Min. bending radius dynamic	148 mm
Recommended coupling torque	9-14 in-lbs
Coupling nut retention force	100 lbs
Durability	50,000 Cycles(FLEX)
Voltage rating	325 Vrms
Dielectric withstanding voltage	750V(DC)
Insulation resistance	5000 ΜΩ
Temperature range(Operation)	-40℃~+85℃
RoHS & REACH	compliant
Length	635 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10°C \sim +40°C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.

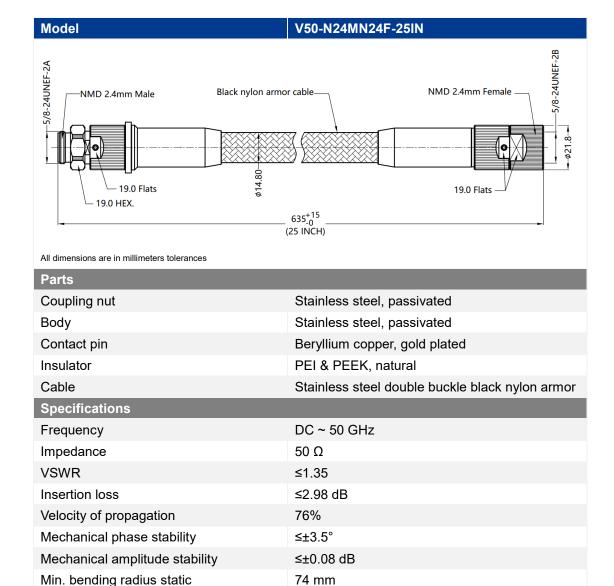




The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: $-10^{\circ}\text{C} \sim +40^{\circ}\text{C}$, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





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Insulation resistance

RoHS & REACH

Length

Min. bending radius dynamic

Coupling nut retention force

Durability

Voltage rating

Recommended coupling torque

Dielectric withstanding voltage

Temperature range(Operation)

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

148 mm

100 lbs

9-14 in-lbs

325 Vrms

750V(DC)

 $5000~M\Omega$

compliant

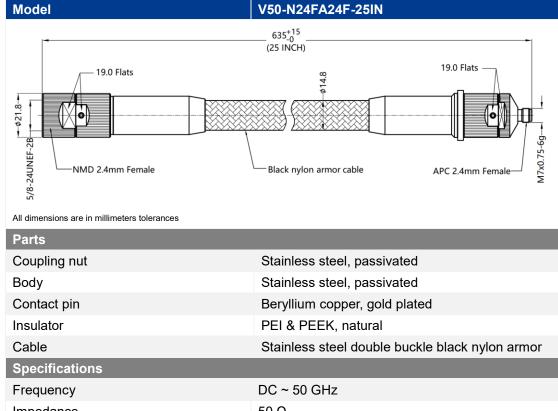
635 mm

-40°C∼+85°C

50,000 Cycles(FLEX)

The storage conditions of the product are: -10° C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.



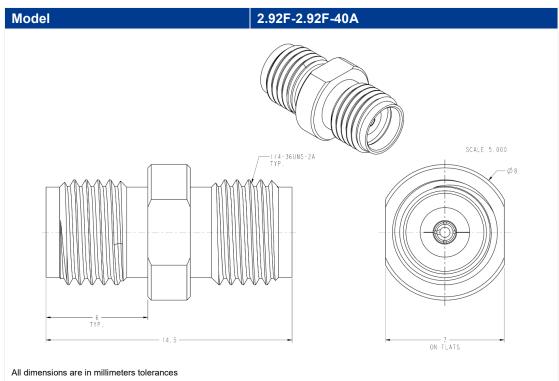


Cable	Stainless steel double buckle black nylon armor
Specifications	
Frequency	DC ~ 50 GHz
Impedance	50 Ω
VSWR	≤1.35
Insertion loss	≤2.98 dB
Velocity of propagation	76%
Mechanical phase stability	≤±3.5°
Mechanical amplitude stability	≤±0.08 dB
Min. bending radius static	74 mm
Min. bending radius dynamic	148 mm
Recommended coupling torque	9-14 in-lbs
Coupling nut retention force	100 lbs
Durability	10,000 Cycles
Voltage rating	325 Vrms
Dielectric withstanding voltage	750V(DC)
Insulation resistance	5000 ΜΩ
Temperature range(Operation)	-40°C∼+85°C
RoHS & REACH	compliant
Length	635 mm

The connector is encapsulated with a special dust cap. When the components are bent and packaged, the bending radius should not be less than 5 times the minimum bending radius of the cable.

The storage conditions of the product are: -10 $^{\circ}$ C \sim +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.

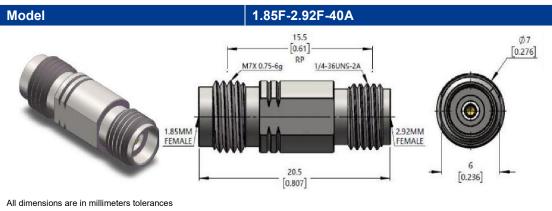




Parts	
Connector	2.92mm Female - 2.92mm Female
Body	Stainless sheet, passivated
Contact	Beryllium copper, gold plated
Insulator	PEI, NATURAL
Specifications	
Frequency	DC ~ 40 GHz
Impedance	50 Ω
VSWR	1.25 Max.
Insertion loss	0.3 dB Max.
Dielectric withstand voltage	1000 VRMS Min.
Temperature range(Operation)	-40℃~+85℃
Durability	2000 cycles

The connector is encapsulated with a special dust cap. The storage conditions of the product are: -10°C \sim +40°C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.

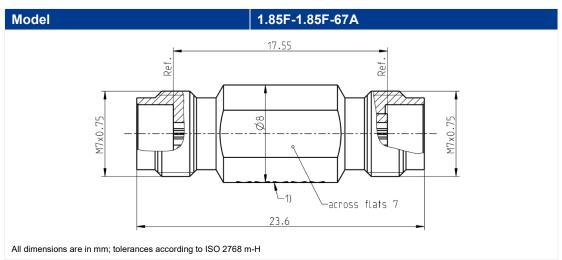




All difficulties are in millimeters tolerances	
Parts	
Connector	1.85mm Female - 2.92mm Female
Body	Stainless sheet, passivated
Contact	Beryllium copper, gold plated
Insulator	PEI
Specifications	
Frequency	DC ~ 40 GHz
Impedance	50 Ω
VSWR	1.15 Typ ; 1.20 Max
Insertion loss	0.05*Sqt(f_GHz)
Insulation Resistance	5000 ΜΩ
Temperature range(Operation)	-55℃~+165℃
Package and storage	

The connector is encapsulated with a special dust cap. The storage conditions of the product are: -10°C \sim +40°C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





Parts	
Connector	1.85mm Female – 1.85mm Female
Body	Stainless sheet, passivated
Contact	CuBe, gold plated
Insulator	PEEK

Specifications	
Frequency	DC ~ 67 GHz
Impedance	50 Ω
Return loss	≥ 17 dB @ DC to 67 GHz
Insertion loss	≤ 0.05*Sqt(f_GHz)
Insulation resistance	≥ 5 GΩ
Center contact resistance	≤ 4 mΩ
Outer contact resistance	≤ 2.5 mΩ
Test voltage	500 V rms
Working voltage	150 V rms
RF-leakage	≥ 100 dB up to 1.0 GHz
Mating cycles RPC-1.85	≥ 500
Center contact captivation	axial: ≥ 20 N, Radial: ≥ 1 Ncm
Coupling test torque	≤ 1.65 Nm
Recommended torque	0.8 Nm to 1.1 Nm
Temperature range	-55℃~+165℃
RoHS	compliant

The connector is encapsulated with a special dust cap. The storage conditions of the product are: -10 $^{\circ}$ C $^{\circ}$ +40 $^{\circ}$ C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.





Parts	
N(M)-SMA(M) Cable	DC ~ 6 GHz, VSWR<1.25, 700 mm
N(M)-N(M) Cable	DC ~ 6 GHz, VSWR<1.25, 700 mm
2* N(M)-BNC(F) Adaptor	DC ~ 2 GHz, VSWR<1.2
2* N(M)-SMA(F) Adaptor	DC ~ 6 GHz, VSWR<1.2
10 dB attenuator N-N	DC ~ 6 GHz, VSWR<1.2, Power:1 W, 50 mm×16
	mm

The connector is encapsulated with a special dust cap. The storage conditions of the product are: -10°C \sim +40°C, the relative humidity is not more than 80%, and the surrounding air is free from acidic, alkaline and other corrosive gases.



关于鼎阳

鼎阳科技(SIGLENT)是通用电子测试测量仪器领域的行业领军企业,A股上市公司。

2002年,鼎阳科技创始人开始专注于示波器研发,2005年成功研制出鼎阳第一款数字示波器。历经多年发展,鼎阳产品已扩展到数字示波器、手持示波表、函数/任意波形发生器、频谱分析仪、矢量网络分析仪、射频/微波信号源、台式万用表、直流电源、电子负载、精密源表等基础测试测量仪器产品,是全球极少数能够同时研发、生产、销售数字示波器、信号发生器、频谱分析仪和矢量网络分析仪四大通用电子测试测量仪器主力产品的厂家之一,国家重点"小巨人"企业。同时也是国内主要竞争对手中极少数同时拥有这四大主力产品并且四大主力产品全线进入高端领域的厂家。公司总部位于深圳,在马来西亚槟城州设有生产基地,在美国克利夫兰、德国奥格斯堡、日本东京成立了子公司,在成都成立了分公司,产品远销全球80多个国家和地区,SIGLENT已经成为全球知名的测试测量仪器品牌。

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