SUCOFLEX®126

The low loss, phase stable assembly up to 26.5 GHz

Edition 2016

Advantages of SUCOFLEX 126 versus SUCOFLEX 104 P

- 30 % lower loss
- 20 % higher power
- Improved return loss
- Same phase/loss stability
- Same flexibility
- Same connectors
- Same price

HUBER+SUHNER
Excellence in Connectivity Solutions

SUCOFLEX® 126

The high performance microwave cable assembly working up to 26.5 GHz

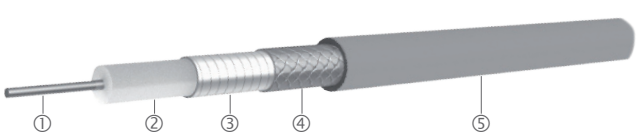
Product features

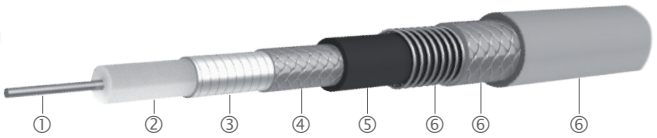
- Optimised inner conductor construction
- Extremely precise measurements with highest phase stability combined with low loss and excellent return loss up to 26.5 GHz
- Excellent reliability with A-ruggedisation, that withstand flexure and crushing
- Reduced downtime because of increased intervals between calibrations
- Comprehensive connector portfolio
- Available from stock

Recommended connectors

SF126	BNC, DV, N, PC3.5; PC7, SMA, TNC, 7/16
	Other connectors available on request

Construction





Cable	Inner conductor ①	Dielectric ②	Outer conductor ③④	Jacket ⑤	Ruggedisation ⑥	Outer diameter mm
SUCOFLEX_126	CuAg strand	LD-PTFE	CuAg tape/braid	FEP, blue	no	5.5
SUCOFLEX_126_E	CuAg strand	LD-PTFE	CuAg tape/braid	PUR, blue	no	5.5
SUCOFLEX_126_EA	CuAg strand	LD-PTFE	CuAg tape/braid	PUR	stainless steel/PUR, blue	10.3

Available connectors

Connector	Series, pattern	HUBER+SUHNER connector type	SF126 SF126E	SF126EA	Operating frequency (GHz)	VSWR per connector	Remarks
BNC	Straight cable plug	11_BNC-452	•	•	4.0	1.14	
DV	Straight cable plug	11_DV-41	•	•	26.5	1.16	3.5 mm connector for Agilent Technologies instrument
N	Straight cable plug	11_N-47	•	•	15.0	1.12	
	Straight cable plug	11_N-452	•	•	18.0	1.12	
	Straight cable plug	11_N-454	•	•	15.0	1.12	Hexagonal nut w. safety holes
	Right angle cable plug	16_N-457	•	•	12.4	1.14	
	Straight cable jack	21_N-452	•	•	18	1.12	
	Straight panel bulkhead cable jack	24_N-452	•	•	18	1.12	Mounting hole size 12
PC 3.5	Straight cable plug	11_PC3.5-43	•	•	18 26.5	1.12 1.16	
	Straight cable jack	21_PC3.5-43	•	•	18 26.5	1.12 1.16	
PC 7	Straight cable plug	11_PC7-42	•	•	18	1.10	
SMA	Straight cable plug	11_SMA-451	•	•	18	1.12	
	Straight cable plug	11_SMA-452	•	•	18	1.16	Phase matching connector
	Straight cable plug	11_SMA-456	•	•	18	1.12	Hexagonal nut w. safety holes
	Straight cable plug	11_SMA-468	•	•	18	1.12	Quick lock nut
	Right angle cable plug	16_SMA-452	•	•	18	1.12	
	Straight cable jack	21_SMA-451	•	•	18	1.12	
	Straight panel bulkhead cable jack	24_SMA-451	•	•	18	1.12	Mounting hole size 35
TNC	Straight cable plug	11_TNC-456	•	•	18	1.12	
	Straight panel bulkhead cable jack	24_TNC-456	•	•	18	1.12	Mounting hole size 4
7/16	Straight cable plug	11_716-402	•	•	7.5	1.12	
	Straight cable jack	21_716-402	•		7.5	1.12	

SUCOFLEX® 126

Assembly types

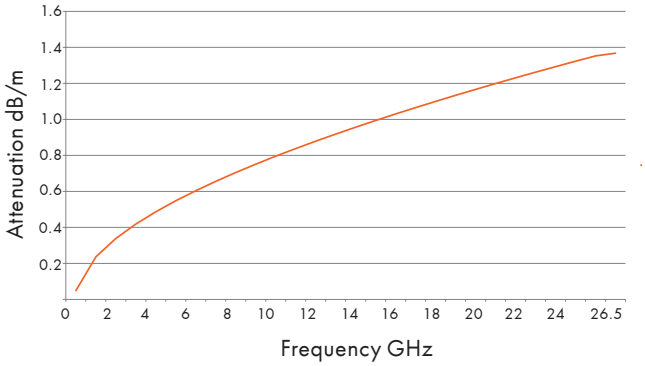
		SUCOFLEX 126	SUCOFLEX 126E	SUCOFLEX 126EA
Max. operating frequency	GHz	26.5	26.5	26.5
Application		dynamic	dynamic	dynamic
Velocity of propagation	%	77	77	77
Weight	g/m	70	66	171
Min. bending radius static	mm	16	16	30
Min. bending radius repeated	mm	25	25	50
Temperature range	°C	–55 to +125	–40 to +85	–40 to +85
Crush resistance	kN/m	8	8	80
Tensile load	N	250	250	500
Inner conductor		stranded	stranded	stranded
Dielectric		LD-PTFE	LD-PTFE	LD-PTFE
Outer conductor		tape/braid	tape/braid	tape/braid
Jacket		FEP	PUR	PUR
Ruggedisation		no	no	stainless steel/PUR
Outer diameter	mm	5.5	5.5	10.3
Screening effectiveness (up to 18 GHz)	dB	> 90	> 90	> 90
Phase stability vs. flexure (360°, diameter 55 mm)	°el/GHz	< 0.9	< 0.9	< 0.9
Phase stability vs. temperature (–40 to +85 °C)	ppm	< 1500	< 1500	< 1500
Assembly phase matching tolerances	°el/GHz	± 0.5	± 0.5	± 0.5
Cable attenuation at 25 °C	dB/m	see graph	see graph	see graph
Insertion loss stability vs. bending	dB	± 0.2	± 0.2	± 0.2
Insertion loss stability vs. temperature	%/°C	< 0.2	< 0.2	< 0.2
Insertion loss stability vs. shaking	dB	± 0.1	± 0.1	± 0.1
Power handling	watt	see graph	see graph	see graph

Stock assemblies

Item no.	Type	Length	Frequency	Max. insertion loss at 25 °C	Max. VSWR	RoHS compliant
		mm	GHz	dB		
SUCOFLEX_126_E						
85072824	SF126E/SMAm/SMAm/500mm	500	18.0	0.82	1.25	yes
85072825	SF126E/SMAm/SMAm/1000mm	1000	18.0	1.43	1.25	yes
85072826	SF126E/PC35m/PC35m/1000mm	1000	26.5	1.77	1.35	yes
SUCOFLEX_126_EA (armoured)						
85072828	SF126EA/Nm/Nm/1000mm	1000	18.0	1.43	1.25	yes
85072827	SF126EA/SMAm/SMAm/1000mm	1000	18.0	1.43	1.25	yes
85072829	SF126EA/Nm/Nf/1500mm	1500	18.0	2.03	1.25	yes
85072830	SF126EA/Nm/Nm/1500mm	1500	18.0	2.03	1.25	yes

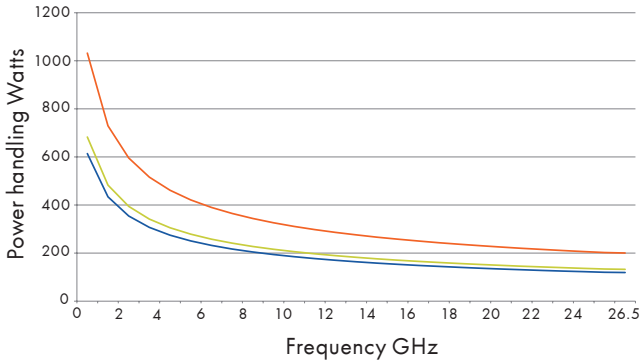
SUCOFLEX® 126

Attenuation
(nominal values at +25 °C ambient temperature)



SF 126 / SF 126 E /SF 126 EA

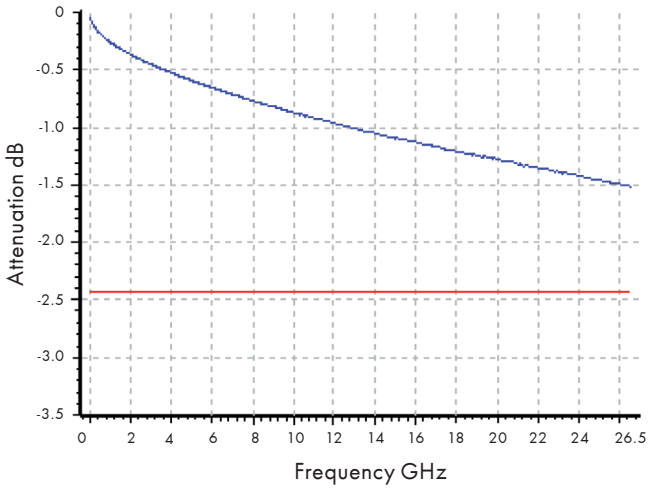
Power handling
(maximum values at +25 °C ambient temperature and sea level)



SF 126
SF 126 E
SF 126 EA

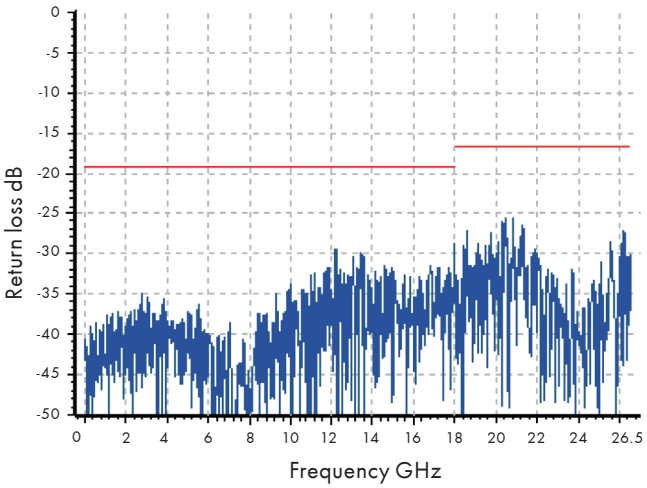
Example
Test report SUCOFLEX126/PC35m/PC35m/1000mm

Attenuation
(nominal values at +25 °C ambient temperature)



SF 10 4 P Specification
SF 126 E Test result

Return loss
(maximum values at +25 °C ambient temperature and sea level)



SF 10 4 P Specification
SF 126 E Test result

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HUBER+SUHNER is certified according to EN 9100, ISO 9001, ISO 14001, ISO/TS 16949 and IRIS.

Waiver
Fact and figures herein are for information only and do not represent any warranty of any kind.

4353/4346/03.2016

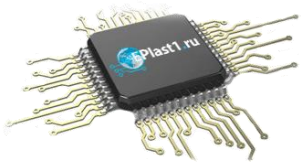
Компания «ЭлектроПласт» предлагает заключение долгосрочных отношений при поставках импортных электронных компонентов на взаимовыгодных условиях!

Наши преимущества:

- Оперативные поставки широкого спектра электронных компонентов отечественного и импортного производства напрямую от производителей и с крупнейших мировых складов;
- Поставка более 17-ти миллионов наименований электронных компонентов;
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- Лицензия ФСБ на осуществление работ с использованием сведений, составляющих государственную тайну;
- Поставка специализированных компонентов (Xilinx, Altera, Analog Devices, Intersil, Interpoint, Microsemi, Aeroflex, Peregrine, Syfer, Eurofarad, Texas Instrument, Miteq, Cobham, E2V, MA-COM, Hittite, Mini-Circuits,General Dynamics и др.);

Помимо этого, одним из направлений компании «ЭлектроПласт» является направление «Источники питания». Мы предлагаем Вам помощь Конструкторского отдела:

- Подбор оптимального решения, техническое обоснование при выборе компонента;
- Подбор аналогов;
- Консультации по применению компонента;
- Поставка образцов и прототипов;
- Техническая поддержка проекта;
- Защита от снятия компонента с производства.



Как с нами связаться

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