

SSMC Plug to SSMC Plug Right Angle Low Loss Cable 48 Inch Length Using LMR-100 Coax

## **RF Cable Assemblies Technical Data Sheet**

## Configuration

- Connector 1: SSMC Plug
- Connector 2: SSMC Plug Right Angle
- Cable Type: LMR-100A

## **Features**

- SSMC Cable Assembly Max. Operating Frequency of 5.8 GHz
- Small SSMC cable connection form factor (50% smaller than SMA, radially)
- · Reliable threaded coupling
- · In stock and ready to ship

## **Applications**

- SSMC Cable General Purpose Test
- Data Acquisition Systems
- A/D Conversion Systems
- Ultra Wideband Digital Receivers
- Software defined radio (SDR)

## Description

Ebeestock's SSMC cable assemblies are part of our full line of RF components available for same-day shipping. These SSMC cable assemblies are designed to connect SSMC system components and test connections, delivering signal frequen-cies as high as 12.4 GHz. Our family of SSMC cables can also be used to connect SSMC ports on data acquisition systems, A/D modules or SSMC coax patch panels. If none of our standard options fit your application, you can specify your own cus-tom SSMC cable assembly using Ebeestock's online Cable Creator.

Our SSMC cable assembly datasheet specifications and drawing with dimensions are shown below in this PDF. Ebeestock's broad catalog of RF, microwave and millimeter wave cable assemblies allow designers to configure and customize their signal connections however they like. Whether the need is to provide SSMC cabling for a data acquisition system, or simply create a custom cable assembly configuration, Ebeestock has the right cable assemblies for the job. Ebeestock can also expertly build custom cable assemblies for you and arrange fast shipping.

### **Electrical Specifcations**

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		5.8	GHz
VSWR			1.6:1	
Velocity of Propagation		66		%
RF Shielding	90			dB
Group Delay		1.54 [5.05]		ns/ft [ns/m]
Capacitance		30.8 [101.05]		pF/ft [pF/m]
Inductance		0.077 [0.25]		uH/ft [uH/m]
DC Resistance Inner Conductor		81 [265.75]		Ω/1000ft [Ω/Km]
DC Resistance Outer Conductor		9.5 [31.17]		Ω/1000ft [Ω/Km]

8th Floor, Building 1, Yongfu Science and Technology Center Industrial Park, Nanzha District 5, Humen,523900,Dongguan, Guangdong, China Website: www.ebeestock.com Email: sales@ebeestock.com ET32838



SSMC Plug to SSMC Plug Right Angle Low Loss Cable 48 Inch Length Using LMR-100 Coax

# **RF Cable Assemblies Technical Data Sheet**

Description	F1	F2	F3	F4	F5	Un	
Frequency	0.25	0.5	1	2.5	5.8	GF	
Insertion Loss (Typ.)	0.68	0.88	1.16	1.8	2.77	d	
				5.1			
echanical Specificatio	ns			X			
Cable Assembly			10				
Length* Diameter	Length*			48 in [121.92 cm] 0.156 in [3.96 mm]			
Diameter			0.	150 11 [5.90 ]	liili		
0-11-							
<b>Cable</b> Cable Type				/IR-100A			
Impedance				) Ohms			
Inner Conductor Type				blid			
Inner Conductor Materia	al and Plating			opper Clad St	eel		
Dielectric Type	and hanning		PE				
Number of Shields			2				
Shield Layer 1			Al	uminum Tape	•		
01111			Tir	nned Copper	Braid		
Shield Layer 2				/C, Black			
Shield Layer 2 Jacket Material			-		ml		
			0.7	11 in [2.79 m	]		
Jacket Material	d Radius			-	-		
Jacket Material Jacket Diameter One Time Minimum Ben			0.2	- 25 in [6.35 m	-		
Jacket Material Jacket Diameter			0.2 1 i	-	m]		
Jacket Material Jacket Diameter One Time Minimum Ben Repeated Minimum Ben			0.2 1 i 0.7	- 25 in [6.35 mi in [25.4 mm]	m] N-m]		

8th Floor, Building 1, Yongfu Science and Technology Center Industrial Park, Nanzha District 5, Humen,523900,Dongguan, Guangdong, China Website: www.ebeestock.com Email: sales@ebeestock.com



**ET32838** 



SSMC Plug to SSMC Plug Right Angle Low Loss Cable 48 Inch Length Using LMR-100 Coax

# 

# **RF Cable Assemblies Technical Data Sheet**

## ET32838

### Connectors

Description	Connector 1	Connector 2	
Туре	SSMC Plug	SSMC Plug Right Angle	
Impedance	50 Ohms	50 Ohms	
Mating Cycles	500	500	
Contact Material and Plating	Beryllium Copper, Gold	Beryllium Copper, Gold	
Contact Plating Specification	MIL-G-45204	MIL-G-45204	
Dielectric Type	Teflon	Teflon	
Body Material and Plating	Beryllium Copper, Gold	Brass, Gold	
Body Plating Specification	MIL-G-45204	MIL-G-45204	
Coupling Nut Material and Plating	Beryllium Copper, Gold	Beryllium Copper, Gold	
Coupling Nut Plating Specification	MIL-G-45206	MIL-G-45204	
Torque	1.75 in-lbs [0.2 Nm]	1.75 in-lbs [0.2 Nm]	

Mechanical Specification Notes:

\*All cable assemblies have a length tolerance of 1.5% or  $\pm 3/8$ °, whichever is greater.

#### Environmental Specifications Temperature

Operating Range

-40 to +85 deg C

Compliance Certifications (see product page for current document)

# Plotted and Other Data

Notes:

ET32838 CAD Drawing SSMC Plug to SSMC Plug Right Angle Low Loss Cable

48 Inch Length Using LMR-100 Coax

