

2.2mm SCuNi/CuNi cryogenic Cable Assemblies

G2CNCN /SMA Male / SMA Male/DC-18 GHz

Model: G2CNCN-SMAMSMAM-L



Features:

- Max Frequency 18 GHz
- VSWR max of 1.35

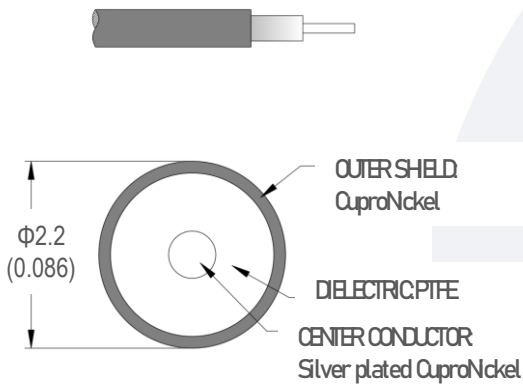
Applications:

- Dilution refrigerators/Cryogenic devices
- Quantum Computing
- Vacuum Chambers

Electrical Characteristics:

Parameter	Min	Typ	Max	Units
Frequency Range	DC		18	GHz
VSWR		1.25	1.35	:1
Shielding Effectiveness		110		dB
Capacitance			98	pF/m
Impedance		50		ohm

Cable Cross Section:



Environmental And Physical Characteristics:

Description	Parameter	Units
Cable Diameter	2.2	mm
Min. Bending Radius	10	mm
Thermal conductivity@4-20K	61	μw/k
Operating Temperature	10mK to +200	°C
Storage Temperature	-55 to +200	°C

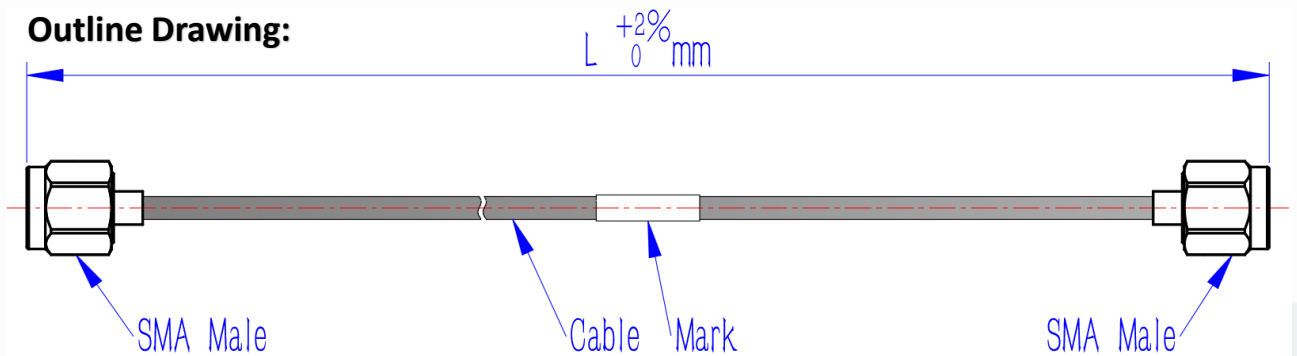
Cable Performance By Frequency

Frequency	0.5 GHz	1 GHz	5 GHz	10 GHz	20 GHz
Insertion Loss (dB/m)@300K	0.8	1.17	2.58	3.7	5.23
Insertion Loss (dB/m)@4K	0.4	0.6	1.3	1.8	2.6

Connectors:

Description	Connector 1	Connector 2
Type	SMA Straight Male	SMA Straight Male
Contact Material And Plating	Brass,Gold	Brass,Gold
Dielectric Type	PTFE	PTFE
Body Material And Plating	SS304	SS304
Insertion Loss (dB Max)	$0.05 * \sqrt{f_GHz}$	$0.05 * \sqrt{f_GHz}$

Outline Drawing:



Ordering Information:

Base Number	Length (Unit mm)	Custom Design Services
G2CNCN-SMAMSMAM	-L	LEAVE BLANK (NOT REQUIRED) -CB (Precision CNC Bends)