

# **CASTHERMCOAXTM**

# Style RG142 U

-55°C to +200°C, 50 Ohms





#### **Construction**

Type: coaxial cable

**Core:** Silver Plated Copper Coated Steel (SPCCS)

Dielectric: PTFE

Shielding: silver-plated copper braid

Sheath: FEP

# **Production**

**Standard:** nominal diameter 4.95mm

**Options:** Please consult us for any special requirements

### Application

**Aerospace and Defense:** radio frequency communications, data transmission, wireless communication in extreme conditions



### **General characteristics**

**Operating environment:** protection from electromagnetic interference **Chemical behavior:** excellent resistance to chemical environments **Humidity:** excellent resistance to humidity

#### Thermal characteristics

Operating temperature: -55°C to +200°C

#### **Electrical characteristics**

Operating Voltage: 1400V Impedance: 50 Ohms

## Approvals – Standards

Aeronautic and defense: MIL-DTL-17

Conductor structure		Conductor Diameter		<u>Dielectric Diameter</u>		Duter Shield Diameter		Final O.D.		
# Strands	Diam. Of St (in)	rands (mm) (mm)	(in)	(mm)	(in)	(mm)	(in)	(mm)	(in)	(mm)
7	0.037	0.93	0.110	2.79	0.118	3	0.156	3.95	0.195	4.95

DATA TRANSMISSION CHARACTER	ISTICS
Impedance	50Ω
Capacitance max	96.45 pF / m
Use frequency max	12.4 GHz
Velocity of propagation	69.5%
Operating voltage	1400V

SIGNAL ATTENUATION						
Frequency	Nominal attenuation					
(MHz)	(dB / 100 m)	(dB / 100 ft)				
100	<b>12</b> .5	3.8				
400	25.6	7.8				
1000	42	12.8				



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