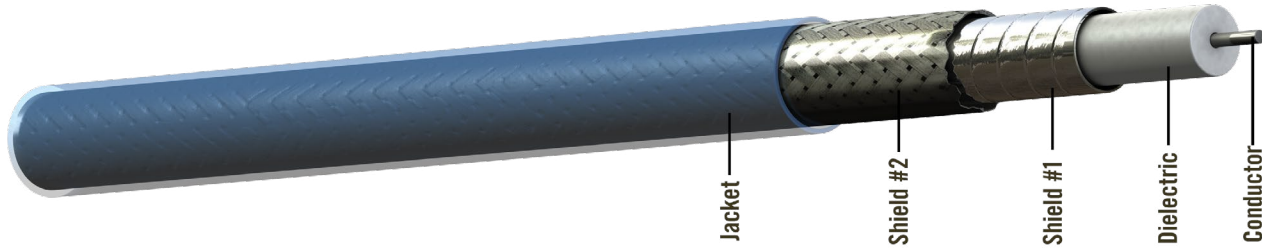


S40501



CABLE CONSTRUCTION

Conductor: Silver-Plated Copper-Clad Steel

Dielectric: PTFE

Shield #1: Silver-Plated Copper Flat Spiral Braid

Shield #2: Silver-Plated Copper Braid

Jacket: Extruded FEP, Solid Blue

S40501 is a 50 Ohm coaxial cable and the industry's workhorse, with decades of proven performance in the aerospace and defense markets. The S40501 coax cable features dual shielding, the inner spiral shield providing a close-conforming shield similar to that of a semi-rigid tubing. When compared to RG405, S40501 has comparable attenuation figures and a considerably higher temperature rating. Impedance is precisely controlled for low VSWR's.

PHYSICAL DATA

Conductor:	24 AWG Solid SPCCS
Temperature Range:	-55 to +200°C
Outer Diameter: in (mm)	0.104 (2.64)
Minimum Bend Radius: in (mm)	0.625 (16)
Weight: lbs/100 ft (kg/100 m)	1.4 (2.1)

ENVIRONMENTAL DATA

Skydrol Resistant:	SAE AS4373E, Method 601
RoHS Compliant:	RoHS Directive 2002/95/EC
Flame / Smoke Requirements:	FAR Part 25.869 (a) App. F, Part 1, (a)(3)
Berry Specialty Metals Compliance:	DFARS 252.225-7014, Alt 1

ELECTRICAL DATA

Impedance:	50 ohms
Capacitance: pF/ft (m)	29.4 (96.5)
Velocity of Propagation:	70%
Time Delay: ns/ft (m)	1.45 (4.76)
Shielding Effectiveness: dB/min	-110
DC Resistance: ohms/1000 ft (m)	24.2 (79.4)

ATTENUATION DATA

Frequency	Nom / Max dB/100 ft	Nom / Max dB/100 m
@0.4 GHz	12.1/13.3	(39.7/43.6)
@1.0 GHz	19.4/21.4	(63.6/70.2)
@1.6 GHz	24.8/27.4	(81.4/89.9)
@5.0 GHz	45.7/50.3	(149.9/165.0)

Formula for Attenuation:
 $(K1 \times \sqrt{F(\text{MHz})}) + (K2 \times F(\text{MHz}))$

K Values (nom loss):
 K1 = 0.589 K2 = 0.00081

All values nominal, unless otherwise noted

**S40501
50 OHM COAXIAL CABLE**

