

Technical Specification

Cable Type: M17/169-00001 (RG-178) 50 Ohm High-Temp Coaxial Cable

Western Wire Part Number: WRG17800

Revision: 03/11 Date: 21 April 2011



Physical Description

Inner Conductor	Stranded Silver-coated Copper-clad steel (SCCS) 7x0.10±0.002 mm, 30AWG.
Conductor OD	0.305±0.025 mm
Dielectric	Solid extruded PTFE (Type F-1)
Dielectric OD	0.85±0.05 mm
Outer conductor	Silver plated copper (SPC) braid, 16x3x0.10mm, 95.9% nominal coverage. Lay: 8.3mm nom.
Outer conductor OD	1.25 mm nom. 1.37mm max.
Outer Jacket	FEP (Type IX) colored white. 0.28mm nom. thickness.
Outer Jacket OD	1.80±0.10 mm OD.
Marking	WESTERN WIRE WRG17800 M17/169-00001 (RG178) 50 OHM COAXIAL CABLE CE 2002/95/EC (RoHS)
Notes	<p>1. Marking shall be clear and legible and will not be erased after 5 finger rubbing.</p> <p>2. Marking may be done by a printed tape, made of flame-retardant material, inserted under the jacket.</p> <p>The jacket shall be transparent enough to permit the reading of marking tape through the jacket.</p>

Mechanical Properties

Minimum Bend Radius	25 mm
Elongation of center conductor	10% min.
Tensile strength of inner conductor	343 N/mm ² min.
Inner conductor adhesion to core	4.4N min. 17.8N max.
Operating temperature	-55 to +200C
Cold bend	-55C.
Total Weight	9.3 Kg/Km max.

Electrical Properties

Operating frequency	3 GHz max.
Characteristic Impedance	50±2 Ohm
Capacitance	105 pF/m max. @ 1 KHz
Velocity of Propagation	69.5% nom.
DC Resistance of inner conductor	802 Ohm/Km max. @ 20C
Continuous working voltage	750 V rms max. @ 20C
Dielectric strength	2000 V rms min.
SRL	NS
Attenuation	108dB/100m max. @ 400MHz.

This cable fully conforms to EU Directive 2002/95/EC (RoHS)