

SPECIFICATION CONTROL DRAWING

2020F8421

CHEMINAX

120 OHM, AWG 20, 19 STRANDS OF AWG 32, TWINAXIAL CABLE

Date

6-10-13

Revision

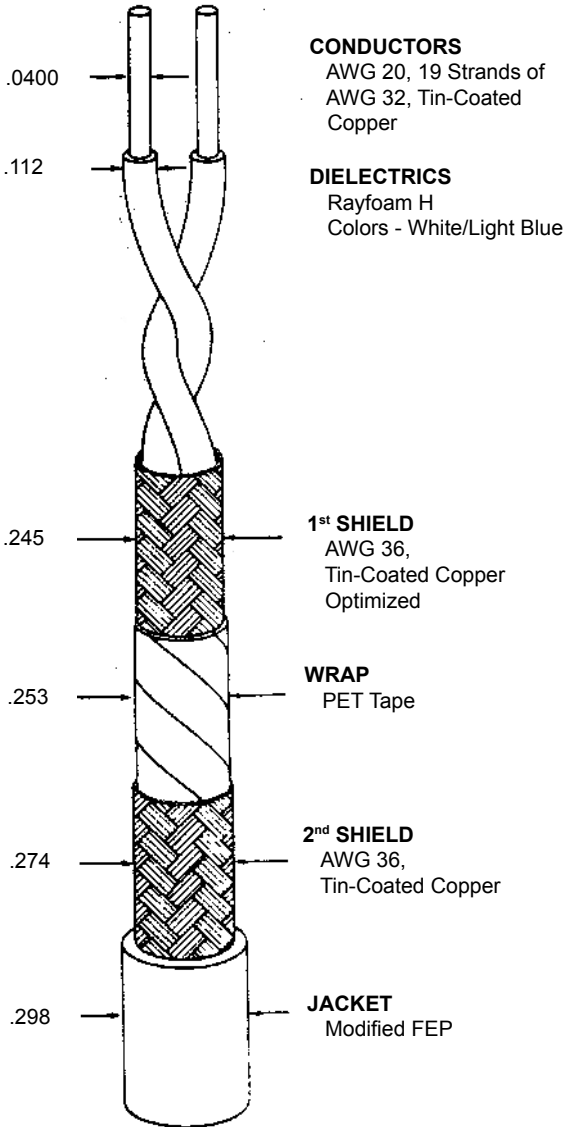
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THIS SPECIFICATION SHEET FORMS A PART OF THE LATEST ISSUE OF RAYCHEM SPECIFICATION 1200.

CONSTRUCTION DETAILS

ELECTRICAL CHARACTERISTICS

DIMENSIONS ARE NOMINAL VALUES IN INCHES UNLESS OTHERWISE DESIGNATED.



CONDUCTORS
AWG 20, 19 Strands of
AWG 32, Tin-Coated
Copper

DIELECTRICS
Rayfoam H
Colors - White/Light Blue

1st SHIELD
AWG 36,
Tin-Coated Copper
Optimized

WRAP
PET Tape

2nd SHIELD
AWG 36,
Tin-Coated Copper

JACKET
Modified FEP

CHARACTERISTIC IMPEDANCE	120 ± 12 ohms, Method D at 1 MHz (with shield grounded)
MUTUAL CAPACITANCE	10.5 pF/ft. (nominal)
VELOCITY OF PROPAGATION	78% (nominal)
SURFACE TRANSFER IMPEDANCE	20 milliohms/meter (maximum) at 100 kHz to 20 MHz (Per MIL-DTL-85485)

ADDITIONAL REQUIREMENTS

ELECTRICAL

CONDUCTOR RESISTANCE (prior to cabling)	9.53 ohms/1000 ft. (nominal)
INSULATION RESISTANCE	10,000 megohms (minimum) for 1000 ft.
JACKET FLAWS	
SPARK TEST	1.0 kV (rms)
IMPULSE TEST	6.0 kV (peak)
VOLTAGE WITHSTAND CONDUCTOR TO SHIELD	1000 volts (rms) (minimum)

ENVIRONMENTAL

FLAMMABILITY	Method B
HEAT SHOCK	225°C
LOW TEMPERATURE-COLD BEND	-55°C/8.00 inch mandrel
VOLTAGE WITHSTAND (Post Environmental)	1000 volts (rms), 1 minute

PHYSICAL

INSULATION (DIELECTRIC) (Prior to Cabling)	
ELONGATION	50% (minimum)
TENSILE STRENGTH	600 lbf/in ² (minimum)
JACKET	
ELONGATION	200% (minimum)
TENSILE STRENGTH	2000 lbf/in ² (minimum)
JACKET THICKNESS	.012 inch (nominal)
2 nd SHIELD COVERAGE	85% (minimum)
WRAP	.002 inch thick (nominal), 25% overlap (minimum)
WEIGHT	60.4 lbs/1000 ft. (nominal)

Outer jacket color will be translucent white (designated by a "-9X" appended to the part number, e.g. 2020F8421-9X) unless otherwise specified.

Designate outer jacket color with a dash number in accordance with MIL-STD-681. Other codes and suffixes may be added to the part number, as necessary, to capture any additional requirements imposed by the purchase order.

Users should evaluate the suitability of this product for their application. Specifications are subject to change without notice. Tyco Electronics Corporation also reserves the right to make changes in materials or processing, which do not affect compliance with any specification, without notification to Buyer.

