

QR320M Messenger Aluminum Tube Cable

QR320M figure-8 messenger aluminum tube cable for aerial CATV distribution networks.

IMPEDANCE	OUTER DIAMETER
75 ± 2 Ω	**10.03 mm**

QR320M | 75Ω | 75Ω QR Series Aluminum Tube Coaxial Cable

Custom lengths, connectors and pre-assembled jumpers are available. Send us your specification for a quotation.

TECHNICAL DATA

Technical parameters

Source: 2026 Technical Selection Manual

STRUCTURE

Inner conductor	CCA wire (CCA) 1.80 mm
Dielectric	foam PE 7.47 mm
Outer conductor	welded (longitudinal argon-arc) smooth aluminum tube 8.13 mm
Jacket	PE or LSZH LSZH 10.03 mm

ELECTRICAL

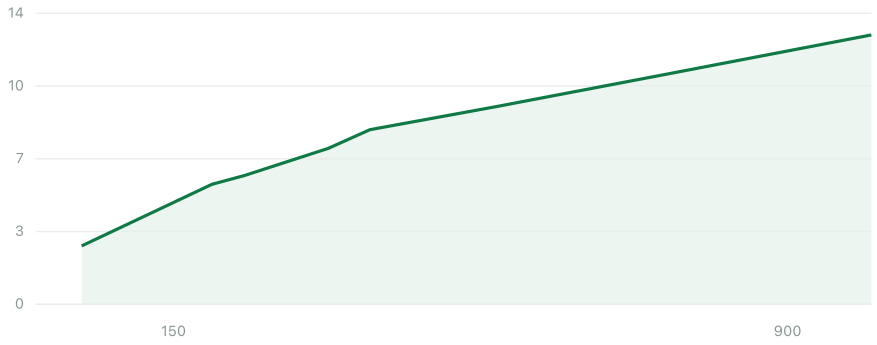
Characteristic impedance	75 ± 2 Ω

Nominal capacitance	52 ± 3 pF/m
Velocity of propagation	86 % return loss ≥ 24 dB (5–300 MHz); ≥ 22 dB (300–1000 MHz) shielding attenuation ≥ 100 dB (55 MHz); ≥ 110 dB (211–1000 MHz) inner conductor DC resistance ≤ 10.49 Ω/km (20 °C)
Insulation resistance	≥ 5000 MΩ·km jacket spark test ≥ 4000 V AC

MECHANICAL & ENVIRONMENT

Min. bending radius	≈ 100 mm (10 × cable OD) max. tensile force ≈ 45 kgf self-supporting strand optional (QR320M, for aerial installation)
Operating temperature	PE –40 ~ +85 °C; PVC –25 ~ +70 °C
Standards	GY/T 135, SJ/T 11138
Applications	CATV trunk line / distribution trunk, HFC long-distance bidirectional HFC transmission

ATTENUATION & POWER



Attenuation in dB/100 m at 20 °C, nominal values (±5%).

MHz	dB/100m	MHz	dB/100m
55	2.76	400	8.27
211	5.68	550	9.35
250	6.1	750	10.86
350	7.38	1000	12.76

Product description

QR320M figure-8 messenger aluminum tube cable for aerial CATV distribution networks.