

Standard Analog Video Cable

75 Ohm Miniature Coax



Belden standard video cables are typically used in non-critical video applications such as video equipment rack wiring, closed circuit TV (CCTV), master antenna TV(MATV) and color or monochrome video monitor hook-ups. Applications such as these do not require Precision Video coaxes which have extremely tight electrical tolerances. (See Precision Video cables, pages 19.49 through 19.58.)

Standard video coaxes are available in both solid and stranded designs. Stranded designs are recommended for flexing applications such as interconnection of CCTV cameras with pan and tilt capabilities, or remote camera hook-ups where the cable is constantly being spooled and despoiled from a reel. Belden's Brilliance high-flex part no. 8241F is ideal for these types of applications.

Video coax cables have a characteristic impedance of 75 ohms. This value was not chosen arbitrarily. Physics shows that optimum attenuation characteristics occur at 77 ohms. Materials and design lead to the selection of 75 ohms as the optimum compromise for low power applications.

| Description | Part No. | UL NEC/ C(UL) CEC Type | Standard Lengths | | Standard Unit Weight | | Conductor (stranding) Diameter Nom. DCR | Insulation Diameter | | Shielding Materials Nom. DCR | Nominal OD | | Nom. Imp. (Ω) | Nom. Vel. of Prop. | Nominal Capacitance | | Nominal Attenuation | | |
|---|-------------|------------------------------|------------------|---------|----------------------|-----|--|---------------------|------|--|------------|------|------------------|-----------------------|---------------------|------|---------------------|----------------|-------------|
| | | | Ft. | m | Lbs. | kg | | Inch | mm | | Inch | mm | | | pF/Ft. | pF/m | MHz | dB/ 100 Ft. | dB/ 100m |
| 30 AWG Stranded (7x38) .012" Tinned Copper Conductor • Tinned Copper Braid Shield (89% Coverage) | | | | | | | | | | | | | | | | | | | |
| Foam HDPE Insulation • Black PVC Jacket | | | | | | | | | | | | | | | | | | | |
| UL AWM Style 1375 (30V 60°C) | 9221 | — | 100 | 30.5 | 1.5 | 1.0 | 30 AWG (7x38) .012" | .058 | 1.47 | TC Braid 89% Shield Coverage TC 11.7Ω/M' | .097 | 2.46 | 75 | 78% | 17.3 | 56.8 | 1 | .7 | 2.3 |
| | | | U-500 | U-152.4 | 4.0 | 1.8 | | | | | | | | | | | 4 | 1.3 | 4.3 |
| | | | 500 | 152.4 | 4.0 | 1.8 | | | | | | | | | | | 5 | 1.6 | 5.2 |
| | | | | | | | | | | | | | | | | | 10 | 2.2 | 7.2 |
| | | | | | | | | | | | | | | | | | 50 | 5.1 | 16.7 |
| | | | | | | | | | | | | | | | | | 100 | 7.3 | 23.9 |
| | | | | | | | | | | | | | | | | | 200 | 10.5 | 34.4 |
| | | | | | | | | | | | | | | | | | 400 | 15.5 | 50.9 |
| | | | | | | | | | | | | | | | | | 1000 | 26.6 | 87.3 |

| | | | | | | | | | | | | | | | | | | | |
|---|-------------|---|--------|---------|------|-----|---------------------------|------|------|---|------|------|----|-----|------|------|------|------|------|
| 27 AWG Stranded (7x35) .017" Bare Copper-covered Steel Conductor • Tinned Copper Braid Shield (93% Coverage) | | | | | | | | | | | | | | | | | | | |
| Polyethylene Insulation • Black PVC Jacket | | | | | | | | | | | | | | | | | | | |
| UL AWM Style 1354 (30V 60°C) (1700V non-UL) | 8218 | — | U-500 | U-152.4 | 8.5 | 3.9 | 27 AWG (7x35) .017" | .100 | 2.54 | TC Braid 93% Shield Coverage BCCS 5.7Ω/M' | .150 | 3.81 | 75 | 66% | 20.5 | 67.3 | 1 | 1.2 | 3.9 |
| | | | 500 | 152.4 | 8.0 | 3.6 | | | | | | | | | | | 10 | 2.4 | 7.9 |
| | | | U-1000 | U-304.8 | 16.0 | 7.3 | | | | | | | | | | | 50 | 4.2 | 13.8 |
| | | | 1000 | 304.8 | 14.0 | 6.4 | | | | | | | | | | | 100 | 5.7 | 18.7 |
| | | | | | | | | | | | | | | | | | 200 | 8.3 | 27.2 |
| | | | | | | | | | | | | | | | | | 400 | 12.1 | 39.7 |
| | | | | | | | | | | | | | | | | | 700 | 16.5 | 54.1 |
| | | | | | | | | | | | | | | | | | 900 | 19.0 | 62.3 |
| | | | | | | | | | | | | | | | | | 1000 | 20.0 | 65.6 |

| | | | | | | | | | | | | | | | | | | | | |
|--|------------------------------------|----------------------------|---|------|-------|-----|-----|---|------|------|--|------|------|----|-----|------|------|------|------|-------|
| Miniature • 25 AWG Solid .018" Tinned Copper Conductors • Duobond® (100% Coverage) + TC Braid Shield (95% Coverage) | | | | | | | | | | | | | | | | | | | | |
| Gas-injected Foam HDPE Insulation • Black PVC Jacket | | | | | | | | | | | | | | | | | | | | |
| | 1281R <small>new</small> | NEC: CMR CEC: CMG | 1 | 1000 | 304.8 | 8.0 | 3.6 | 25 AWG (solid) .018" TC 34.0Ω/M' | .074 | 1.88 | Duobond (100%) + TC Braid 5.4Ω/M' | .114 | 2.90 | 75 | 80% | 17.0 | 55.8 | 1 | .5 | 1.7 |
| | | | | | | | | | | | | | | | | | | 5 | 1.2 | 3.8 |
| | | | | | | | | | | | | | | | | | | 50 | 3.7 | 12.1 |
| | | | | | | | | | | | | | | | | | | 100 | 4.9 | 16.1 |
| | | | | | | | | | | | | | | | | | | 200 | 6.7 | 22.0 |
| | | | | | | | | | | | | | | | | | | 400 | 9.5 | 31.2 |
| | | | | | | | | | | | | | | | | | | 700 | 13.4 | 44.0 |
| | | | | | | | | | | | | | | | | | | 900 | 15.0 | 49.2 |
| | | | | | | | | | | | | | | | | | | 1000 | 15.8 | 51.8 |
| | | | | | | | | | | | | | | | | | | 3000 | 31.2 | 102.4 |

| | | | | | | | | | | | | | | | | | | | | |
|--|------------------------------------|--------------------------------|---|------|-------|------|-----|---|------|------|--|------|------|----|-----|------|------|------|------|-------|
| Plenum • FPFA Insulation • Black Flamarrest® Jacket | | | | | | | | | | | | | | | | | | | | |
| | 1282P <small>new</small> | NEC: CMP CEC: CMP FT6 | 1 | 1000 | 304.8 | 10.0 | 4.5 | 25 AWG (solid) .018" TC 31.8Ω/M' | .074 | 1.88 | Duobond (100%) + TC Braid 5.8Ω/M' | .114 | 2.90 | 75 | 81% | 17.0 | 55.8 | 1 | .4 | 1.3 |
| | | | | | | | | | | | | | | | | | | 5 | .9 | 3.0 |
| | | | | | | | | | | | | | | | | | | 50 | 3.7 | 12.1 |
| | | | | | | | | | | | | | | | | | | 100 | 5.0 | 16.4 |
| | | | | | | | | | | | | | | | | | | 200 | 7.0 | 23.0 |
| | | | | | | | | | | | | | | | | | | 400 | 10.0 | 32.8 |
| | | | | | | | | | | | | | | | | | | 700 | 14.5 | 47.6 |
| | | | | | | | | | | | | | | | | | | 900 | 17.0 | 55.8 |
| | | | | | | | | | | | | | | | | | | 1000 | 17.5 | 57.4 |
| | | | | | | | | | | | | | | | | | | 3000 | 37.0 | 121.4 |

BCCS = Bare Copper-covered Steel • DCR = DC Resistance • FPFA = Foam Perfluoroalkoxy • HDPE = High-density Polyethylene • TC = Tinned Copper