# **Detailed Specifications & Technical Data**



ENGLISH MEASUREMENT VERSION

### 9100 Coax - 75 Ohm Coax

For more Information please call

1-800-Belden1



#### **General Description:**

Series 59, 20 AWG solid .032" bare copper-covered steel conductor, gas-injected foam polyethylene insulation, Duobond® II (100% coverage) plus an aluminum braid (40% coverage), PVC jacket.

| Phy | sical (             | Chara    | actoristic              | s (Overall)                                       |   |  |  |  |  |  |
|-----|---------------------|----------|-------------------------|---|---|--|--|--|--|--|
| -   | ducto               |          | 101011311               |   |   |  |  |  |  |  |
|     | WG:                 |          |                         |   |   |  |  |  |  |  |
|     | # Coa               | x AWG    | Solid                   | Conductor Material BCCS - Bare Copper Covered Ste | Dia. (in.)                              |  |  |  |  |  |
|     |                     |          |                         |   |   |  |  |  |  |  |
| _   |                     |          | of Conduc               | tors:   | 1                                       |  |  |  |  |  |
|     | Ilation<br>sulatior |          | ial:                    |   |   |  |  |  |  |  |
|     | Insula              |          |                         | Dia. (in.)  |   |  |  |  |  |  |
|     | Gas-in              | jected I | FPE - Foam              | Polyethylene .144                                 |   |  |  |  |  |  |
|     | er Shie             |          |                         |   |   |  |  |  |  |  |
| 0   | uter Shi            |          |                         | ade Name Type Outer Shield Ma                     | terial Coverage (%)                     |  |  |  |  |  |
|     | 1                   |          | ded Duofoil@            |   | m Foil-Polyester Tape-Aluminum Foil 100 |  |  |  |  |  |
|     | 2                   |          |                         | Braid AL - Aluminum                               | 40                                      |  |  |  |  |  |
|     | er Jacl             |          |                         |   |   |  |  |  |  |  |
| 0   | uter Jac            |          |                         |   |   |  |  |  |  |  |
|     |                     |          | Material<br>yl Chloride |   |   |  |  |  |  |  |
| Ovo | rall Ca             | ablo     |                         |   |   |  |  |  |  |  |
| 0.6 |                     |          | nal Diamete             | ır:   | 0.237 in.                               |  |  |  |  |  |
| -   |                     |          |                         |   |   |  |  |  |  |  |
| Мес |                     |          |                         | stics (Overall)                                   |   |  |  |  |  |  |
| _   | •                   |          | nperature l             | Range:  | -40°C To +80°C                          |  |  |  |  |  |
| _   | UL Ten              | nperatu  | ure Rating:             |   | 80°C                                    |  |  |  |  |  |
| _   | Bulk C              | able W   | eight:                  |   | 21 lbs/1000 ft.<br>80 lbs.              |  |  |  |  |  |
| _   | Max. R              | ecomn    | nended Pul              | ling Tension:                                     |   |  |  |  |  |  |
| _   | Min. Be             | end Ra   | dius/Minor              | Axis:   | 2.500 in.                               |  |  |  |  |  |
| Арр | licabl              | e Spe    | cificatio               | ns and Agency Complian                            | ice (Overall)                           |  |  |  |  |  |
|     |                     | -        |                         | invironmental Programs                            |   |  |  |  |  |  |
| _   | NEC/(U              | JL) Spe  | cification:             |   | CM, CATV                                |  |  |  |  |  |
|     | CEC/C               | (UL) Sp  | pecification            | :   | СМ                                      |  |  |  |  |  |
|     | EU Dire             | ective 2 | 2011/65/EU              | (ROHS II):  | Yes                                     |  |  |  |  |  |
|     | EU CE               | Mark:    |                         |   | Yes                                     |  |  |  |  |  |
| _   | EU Dire             | ective 2 | 2000/53/EC              | (ELV):  | Yes                                     |  |  |  |  |  |
| -   | EU Dire             | ective 2 | 2002/95/EC              | (RoHS):   | Yes                                     |  |  |  |  |  |
| -   | EU Rol              | HS Con   | npliance Da             | ate (mm/dd/yyyy):                                 | 01/01/2004<br>Yes<br>Yes                |  |  |  |  |  |
| -   | EU Dire             | ective 2 | 2002/96/EC              | (WEEE):   |   |  |  |  |  |  |
| -   | EU Dire             | ective 2 | 2003/11/EC              | (BFR):  |   |  |  |  |  |  |
| -   |                     |          | CJ for Wire             |   | Yes                                     |  |  |  |  |  |
| -   |                     |          | (China Rol              |   | Yes                                     |  |  |  |  |  |
| -   |                     |          | ification:              | -,  | P-MSHA-SC-182/4                         |  |  |  |  |  |
| -   | Series              | -        |                         |   | Series 59                               |  |  |  |  |  |
|     | 201103              | · ypc.   |                         |   |   |  |  |  |  |  |

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| Flame Test  | +   |           |             |                   |       |           |  |  |  |  |  |
|---|---|-----------|-------------|-------------------|-------|-----------|--|--|--|--|--|
|   | ne Test:  |           | I           | IL1685 UL Loading |       |           |  |  |  |  |  |
|   |   |           |             | 21000 02 2000g    |       |           |  |  |  |  |  |
| Plenum/No   |   |           |             | 10                |       |           |  |  |  |  |  |
| Plenum  | (Y/N):  |           | ľ           | lo                |       |           |  |  |  |  |  |
| Electrical  | Characteristics (   | (Overall) |             |                   |       |           |  |  |  |  |  |
| Nom. Charao   | cteristic Impedance:  |           |             |                   |       |           |  |  |  |  |  |
| Impedane<br>75.000  | Impedance (Ohm) 75.000  |           |             |                   |       |           |  |  |  |  |  |
| Nom. Induct   | Nom. Inductance:  |           |             |                   |       |           |  |  |  |  |  |
| Inductance (µH/ft)<br>.097  |   |           |             |                   |       |           |  |  |  |  |  |
|   | Nom. Capacitance Conductor to Shield:                           |           |             |                   |       |           |  |  |  |  |  |
| -   | Capacitance (pF/ft)   |           |             |                   |       |           |  |  |  |  |  |
| 16.2  |   |           |             |                   |       |           |  |  |  |  |  |
| Nominal Velocity of Propagation:  |   |           |             |                   |       |           |  |  |  |  |  |
| <b>VP (%)</b><br>83   |   |           |             |                   |       |           |  |  |  |  |  |
| Nominal Del   | av:   |           |             |                   |       |           |  |  |  |  |  |
| Delay (ns   | Delay (ns/ft)   |           |             |                   |       |           |  |  |  |  |  |
|   |   |           |             |                   |       |           |  |  |  |  |  |
|   | Nom. Conductor DC Resistance:<br>DCR @ 20°C (Ohm/1000 ft)       |           |             |                   |       |           |  |  |  |  |  |
| 44.5  |   |           |             |                   |       |           |  |  |  |  |  |
| Nominal Out   | ter Shield DC Resistar  | nce:      |             |                   |       |           |  |  |  |  |  |
|   | Nominal Outer Shield DC Resistance:<br>DCR @ 20°C (Ohm/1000 ft) |           |             |                   |       |           |  |  |  |  |  |
| 17  |   |           |             |                   |       |           |  |  |  |  |  |
| Max. Attenua  | ation:  |           |             |                   |       |           |  |  |  |  |  |
| Freq. (MH   | Iz) Attenuation (dB/10  | 00 ft.)   |             |                   |       |           |  |  |  |  |  |
| 5   | 0.89  |           |             |                   |       |           |  |  |  |  |  |
| 55<br>211   | 1.95<br>3.59  |           |             |                   |       |           |  |  |  |  |  |
| 211   | 4.05  |           |             |                   |       |           |  |  |  |  |  |
| 300   | 4.27  |           |             |                   |       |           |  |  |  |  |  |
| 350   | 4.64  | _         |             |                   |       |           |  |  |  |  |  |
| 400   | 4.88  | _         |             |                   |       |           |  |  |  |  |  |
| 450   | 5.30  |           |             |                   |       |           |  |  |  |  |  |
| 550   | 5.90  |           |             |                   |       |           |  |  |  |  |  |
| 750<br>870  | 6.96<br>7.54  |           |             |                   |       |           |  |  |  |  |  |
| 1000  | 8.09  |           |             |                   |       |           |  |  |  |  |  |
|   | ing Voltage - UL:   |           |             |                   |       |           |  |  |  |  |  |
| Voltage   |   |           |             |                   |       |           |  |  |  |  |  |
| 300 V RMS   |   |           |             |                   |       |           |  |  |  |  |  |
| Minimum Return Loss:<br>Description Freq. (MHz) Start Freq. (MHz) Stop Freq. (MHz) Min. RL (dB) |   |           |             |                   |       |           |  |  |  |  |  |
| Descripti   | 5   |           | 000 20      | , (U.             |       |           |  |  |  |  |  |
|   |   |           |             |                   |       |           |  |  |  |  |  |
| Notes (Overall) Notes: Sweep tested 5 MHz to 1 GHz.   |   |           |             |                   |       |           |  |  |  |  |  |
| Put Ups and Colors:   |   |           |             |                   |       |           |  |  |  |  |  |
| Item #  |   | Putup     | Ship Weight | Color             | Notes | Item Desc |  |  |  |  |  |

| Item #        | Putup    | Ship Weight | Color | Notes | Item Desc              |
|---------------|----------|-------------|-------|-------|------------------------|
| 9100 009U1000 | 1,000 FT | 22.000 LB   | WHITE |       | #20 GIFHDLDPE SH FRPVC |
| 9100 010U1000 | 1,000 FT | 22.000 LB   | BLACK |       | #20 GIFHDLDPE SH FRPVC |
| 9100 010U500  | 500 FT   | 12.000 LB   | BLACK |       | #20 GIFHDLDPE SH FRPVC |
| 9100 0101000  | 1,000 FT | 23.000 LB   | BLACK | 1     | #20 GIFHDLDPE SH FRPVC |

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