

## 8312 Multi-Conductor - Low Capacitance Computer Cable for EIA RS-232 Applications



For more Information  
please call

1-800-Belden1

**Description:**

22 AWG stranded (7x30) tinned copper conductors, semi-rigid PVC insulation, twisted pairs, overall Beldfoil® (100% coverage) + tinned copper braid shield (65% coverage), PVC jacket.

**Physical Characteristics (Overall)****Conductor****AWG:**

| # Conductors | # Pairs | AWG | Stranding | Conductor Material |
|--------------|---------|-----|-----------|--------------------|
| 1            | 12      | 22  | 7x30      | TC - Tinned Copper |

**Insulation****Insulation Material:**

| Insulation Material                     |
|-----------------------------------------|
| S-R PVC - Semi-Rigid Polyvinyl Chloride |

**Outer Shield****Outer Shield Material:**

| Layer # | Outer Shield Trade Name | Type  | Outer Shield Material        | Coverage (%) |
|---------|-------------------------|-------|------------------------------|--------------|
| 1       | Beldfoil®               | Tape  | Aluminum Foil-Polyester Tape | 100          |
| 2       |                         | Braid | TC - Tinned Copper           | 65           |

**Outer Jacket****Outer Jacket Material:**

| Outer Jacket Material    |
|--------------------------|
| PVC - Polyvinyl Chloride |

**Overall Cable**

**Overall Nominal Diameter:** 0.455 in.

**Pair****Pair Color Code Chart:**

| Number           | Color          |
|------------------|----------------|
| 1                | Black & Red    |
| 2                | Black & White  |
| 3                | Black & Green  |
| 4                | Black & Blue   |
| 5                | Black & Yellow |
| 6                | Black & Brown  |
| 7                | Black & Orange |
| 8                | Red & White    |
| 9                | Red & Green    |
| 10               | Red & Blue     |
| 11               | Red & Yellow   |
| 12               | Red & Brown    |
| Single Conductor | Gray           |

**Pair Lay Length & Direction:**

| Lay Length (in.) | Twists/ft. (twist/ft) |
|------------------|-----------------------|
| 1.000            | 12.000                |

**Mechanical Characteristics (Overall)**

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|                                        |                          |
|----------------------------------------|--------------------------|
| Operating Temperature Range:           | -30°C To +80°C           |
| UL Temperature Rating:                 | 80°C (UL AWM Style 2464) |
| Bulk Cable Weight:                     | 129 lbs/1000 ft.         |
| Min. Bend Radius (Install)/Minor Axis: | 4.500 in.                |

## Applicable Specifications and Agency Compliance (Overall)

## Applicable Standards &amp; Environmental Programs

|                                       |                            |
|---------------------------------------|----------------------------|
| NEC/(UL) Specification:               | CMG                        |
| CEC/C(UL) Specification:              | CMG                        |
| AWM Specification:                    | UL Style 2464 (300 V 80°C) |
| EU CE Mark:                           | Yes                        |
| EU Directive 2000/53/EC (ELV):        | Yes                        |
| EU Directive 2002/95/EC (RoHS):       | Yes                        |
| EU RoHS Compliance Date (mm/dd/yyyy): | 10/01/2005                 |
| EU Directive 2002/96/EC (WEEE):       | Yes                        |
| EU Directive 2003/11/EC (BFR):        | Yes                        |
| CA Prop 65 (CJ for Wire & Cable):     | Yes                        |
| MII Order #39 (China RoHS):           | Yes                        |

## Flame Test

|                   |     |
|-------------------|-----|
| C(UL) Flame Test: | FT4 |
|-------------------|-----|

## Plenum/Non-Plenum

|               |    |
|---------------|----|
| Plenum (Y/N): | No |
|---------------|----|

## Electrical Characteristics (Overall)

## Nom. Characteristic Impedance:

Impedance (Ohm)

70

## Nom. Capacitance Conductor to Conductor:

Capacitance (pF/ft)

35

## Nom. Capacitance Cond. to Other Conductor &amp; Shield:

Capacitance (pF/ft)

63

## Nominal Velocity of Propagation:

VP (%)

60

## Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft)

15.0

## Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/1000 ft)

4.2

## Max. Operating Voltage - UL:

Voltage

300 V RMS (UL AWM Style 2464)

## Max. Recommended Current:

Current

1.5 Amps per conductor @ 25°C

**8312 Multi-Conductor - Low Capacitance Computer Cable for EIA RS-232 Applications****Related Documents:**

No related documents are available for this product

**Put Ups and Colors:**

| Item #       | Putup    | Ship Weight | Color  | Notes | Item Desc                |
|--------------|----------|-------------|--------|-------|--------------------------|
| 8312 060100  | 100 FT   | 12.900 LB   | CHROME | C     | 12 PR, 1#22 PVC SHLD PVC |
| 8312 0601000 | 1,000 FT | 137.000 LB  | CHROME | C     | 12 PR, 1#22 PVC SHLD PVC |
| 8312 060500  | 500 FT   | 72.000 LB   | CHROME | C     | 12 PR, 1#22 PVC SHLD PVC |

**Notes:**

C = CRATE REEL PUT-UP.

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