

# 3106A Paired - RS-485



### **Description:**

22 awg stranded (7X30) tinned copper, Datalene insulation, twisted pairs, overall 100% Beldfoil shield + 90% tinned copper braid, 22 awg stranded TC drain wire, UV resistant PVC jacket.

## PHYSICAL CHARACTERISTICS:

## **CONDUCTOR:**

| Number of Pairs            | 1                  |
|----------------------------|--------------------|
| Number of Conductors       | 1                  |
| Total Number of Conductors | 3                  |
| AWG                        | 22                 |
| Stranding                  | 7x30               |
| Conductor Diameter         | .030 in.           |
| Conductor Material         | TC - Tinned Copper |

## **INSULATION:**

| Insulation Material Trade Name | Datalene®                              |
|--------------------------------|--|
| Insulation Material            | FHDPE - Foam High Density Polyethylene |
| Lay Length                     | 3.0 in.                                |

### **OVERALL CABLING:**

#### Overall Cabling Color Code Chart :

| Number | Color          |
|--------|----------------|
| 1      | White & Orange |
| 2      | Orange & White |
| 3      | Blue & White   |

## **OUTER SHIELD:**

| Outer Shield Material Trade Name |                         | Beldfoil®  |                                 |                  |  |
|----------------------------------|-------------------------|------------|---------------------------------|------------------|--|
| Outer Shield Type                |                         | Tape/Braid |                                 |                  |  |
| Outer Shield Material :          | Outer Shield Material : |            |                                 |                  |  |
| Laver Number                     | Material Trade Name     | Туре       | Material                        | % Coverage (%)   |  |
| Bujer i tannoei                  | material fraue fame     | Турс       | Matchiai                        | 70 Coverage (70) |  |
| 1                                | Beldfoil®               | Таре       | Aluminum Foil-Polyester<br>Tape | 100              |  |

Outer Shield %Coverage



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| <b>OUTER SHIELD DRAIN WIRE :</b>                 |                           |  |  |  |  |
|--|---------------------------|--|--|--|--|
| Outer Shield Drain Wire AWG                      | 22                        |  |  |  |  |
| Outer Shield Drain Wire Stranding                | 7x30                      |  |  |  |  |
| Outer Shield Drain Wire Diameter                 | .030 in.                  |  |  |  |  |
| Outer Shield Drain Wire Conductor Material       | TC - Tinned Copper        |  |  |  |  |
| OUTER JACKET:                                    |                           |  |  |  |  |
| Outer Jacket Material                            | PVC - Polyvinyl Chloride  |  |  |  |  |
| OVERALL NOMINAL DIAMETER:                        |                           |  |  |  |  |
| Overall Nominal Diameter                         | .300 in.                  |  |  |  |  |
| MECHANICAL CHARACTERISTICS:                      |                           |  |  |  |  |
| Operating Temperature Range                      | -20°C To +60°C            |  |  |  |  |
| Non-UL Temperature Rating                        | 60°C                      |  |  |  |  |
| Bulk Cable Weight                                | 48 lbs/1000 ft.           |  |  |  |  |
| Max. Recommended Pulling Tension                 | 65 lbs.                   |  |  |  |  |
| Min. Bend Radius (Install)                       | 3 in.                     |  |  |  |  |
| APPLICABLE SPECIFICATIONS AND AGENCY COMPLIANCE: |                           |  |  |  |  |
| APPLICABLE STANDARDS:                            |                           |  |  |  |  |
| NEC/(UL) Specification                           | CM, PLTC OIL RES II       |  |  |  |  |
| CEC/C(UL) Specification                          | СМ                        |  |  |  |  |
| FLAME TEST:                                      |                           |  |  |  |  |
| UL Flame Test                                    | UL1581 Vertical Tray      |  |  |  |  |
| CSA Flame Test                                   | FT1                       |  |  |  |  |
| SUITABILITY:                                     |                           |  |  |  |  |
| Sunlight Resistance                              | Passes UL 1581, 720 Hours |  |  |  |  |
| PLENUM/NON-PLENUM:                               |                           |  |  |  |  |
| Plenum (Y/N)                                     | Ν                         |  |  |  |  |
| ELECTRICAL CHARACTERISTICS:                      |                           |  |  |  |  |
| Input/Unfitted Impedance :                       |                           |  |  |  |  |
|  |                           |  |  |  |  |

| Description                                      | Frequency (MHz) | Start Frequency (MHz) | Stop Frequency (MHz) | Input/Unfitted<br>Impedance (Ohms) |
|--|-----------------|-----------------------|----------------------|------------------------------------|
|  | 1               |                       |                      | 120                                |
| Nom. Capacitance Conductor to Conductor @ 1 KHz  |                 | 11.0 pF/ft            |                      |                                    |
| Nom. Cap. Cond. to Other Cond. & Shield @ 1 KHz  |                 | 20.9 pF/ft            |                      |                                    |
| Nominal Velocity of Propagation                  |                 | 78 %                  |                      |                                    |
| Nom. Conductor DC Resistance of Pair @ 20 Deg. C |                 | 14.7 Ohms/1000 ft     |                      |                                    |
| Nominal Outer Shield DC Resistance @ 20 Deg. C   |                 | 2.8 Ohms/1000 ft      |                      |                                    |
| Nom. Attenuation (dB/100 f                       | ít) :           |                       |                      |                                    |



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| Description                 | Frequency (MHz) | Start Frequency (MHz)                                     | Stop Frequency (MHz) | Nom. Attenuation<br>(dB/100 ft.) |  |
|-----------------------------|-----------------|---|----------------------|----------------------------------|--|
|                             | 1               |   |                      | .5                               |  |
| Max. Operating Voltage - UL |                 | 300 V RMS   |                      |                                  |  |
| Max. Recommended Curren     | ıt              | 2.7 Amps per conductor @ 25°C                             |                      |                                  |  |
| NOTES:                      |                 |   |                      |                                  |  |
| Notes                       |                 | Oil Resistance: Passes Oil Res II Per UL1277, Table 10.17 |                      |                                  |  |
| Notes (Cont'd.)             |                 | CPE Jacket Optional                                       |                      |                                  |  |

### **PUT-UPS AND COLORS:**

| Item          | Description                    | Put-Up (ft.) | Ship Weight (lbs.) | Jacket Color | Notes |
|---------------|--------------------------------|--------------|--------------------|--------------|-------|
| 3106A 0101000 | #22 FS<br>PR,1#22PVCBRDPV<br>C | 1000         | 51                 | BLACK        | C D   |
| 3106A 010500  | #22FSPR,1#22PVCB<br>RDPVC      | 500          | 27                 | BLACK        | C D   |
| 3106A 0105000 | #22 FS<br>PR,1#22PVCBRDPV<br>C | 5000         | 260                | BLACK        | C D   |

#### C = CRATE REEL PUT-UP.

D = FINAL PUT-UP LENGTH MAY VARY -0% TO +20% FROM LENGTH SHOWN.

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