## TECHNICAL DATA SHEET



## CAT 6 UTP CABLE CB21176

### RoHS Compliant

| Part Number | Description               | Packaging     |  |
|-------------|---------------------------|---------------|--|
| CB21176     | CAT 6 UTP CABLE GREY 305M | 305M pull box |  |

ISO/IEC11801 Class E Permanent Link, ANSI/TIA/-568-C.2 Category 6 Permanent Link IEC60332-1-2

| Construction |                |                                 |  |  |  |
|--------------|----------------|---------------------------------|--|--|--|
| Conductor    | Material       | Solid Bare Copper               |  |  |  |
|              | Nom O.D. (mm): | 0.55±0.005mm                    |  |  |  |
| Insulation   | Material       | HDPE                            |  |  |  |
|              | Diameter:      | 1.01±0.04mm                     |  |  |  |
|              | Colour         | Pair 1: Blue and White/Blue     |  |  |  |
|              |                | Pair 2: Orange and White/Orange |  |  |  |
|              |                | Pair 3: Green and White/Green   |  |  |  |
|              |                | Pair 4: Brown and White/Brown   |  |  |  |
| Rip cord:    |                | Yes                             |  |  |  |
| Sheath       | Material       | PVC                             |  |  |  |
|              | Thickness      | 0.55±0.05 mm                    |  |  |  |
|              | External O.D.  | 6.3±0.3 mm                      |  |  |  |
|              | Colour:        | Grey                            |  |  |  |

#### Characteristics at 20°C

| Sheath Physical | Before Aging                       | Tensile Strength (Mpa) ≥13.5  |  |  |
|-----------------|------------------------------------|-------------------------------|--|--|
| Properties      |                                    | Elongation (%): ≥150          |  |  |
|                 | Aging Period (°C×hrs):             | 100°C×24h×7d                  |  |  |
|                 | After Aging                        | Tensile Strength (Mpa): ≥12.5 |  |  |
|                 |                                    | Elongation (%): ≥125          |  |  |
|                 | Cold bend (-20±2°C×4h)             | No visible cracks             |  |  |
| Electrical      | 1.0-100.0MHz, impedance (Ω)        | 100±15                        |  |  |
| Characteristics | 1.0-100.0MHz, Delay Skew (ns/100m) | ≤45                           |  |  |
|                 | DC Resistance (Ω/100m)             | ≤8.0                          |  |  |



Important Notice: This data sheet and its contents (the "Information") belong to pro-ELEC. No licence is granted for the use of it other than for information purposes in connection with the products to which it relates. No licence of any intellectual property rights is granted. The Information is subject to change without notice and replaces all data sheets previously supplied. The Information supplied is believed to be accurate but pro-ELEC assumes no responsibility for its accuracy or completeness, any error in or omission from it or for any use made of it. Users of this data sheet should check for themselves the Information and the suitability of the products for their purpose and not make any assumptions based on information included or omitted. Liability for loss or damage resulting from any reliance on the Information or use of it (including liability resulting from negligence or where pro-ELEC was aware of the possibility of such loss or damage arising) is excluded. This will not operate to limit or restrict pro-ELEC's liability for death or personal injury resulting from its negligence.



# TECHNICAL DATA SHEET



#### Technical Performance (FLUKE Link 90m±3m):

| Frequency | RL   | ATT   | NEXT | DELAY  | PSNEXT | ELFEXT | PSELFEX |
|-----------|------|-------|------|--------|--------|--------|---------|
| MHz       | ≥dB  | ≤dB   | ≥dB  | ≤ns    | ≥dB    | ≥dB    | ≥dTB    |
| 1         | 20.0 | 2.03  | 74.3 | 570.00 | 72.3   | 67.8   | 64.8    |
| 4         | 23.0 | 3.78  | 65.3 | 552.00 | 63.3   | 55.9   | 52.8    |
| 8         | 24.5 | 5.32  | 60.8 | 546.73 | 58.8   | 49.7   | 46.7    |
| 10        | 25.0 | 5.95  | 59.3 | 545.38 | 57.3   | 47.8   | 44.8    |
| 16        | 25.0 | 7.55  | 56.2 | 543.00 | 54.2   | 43.7   | 40.7    |
| 20        | 25.0 | 8.47  | 54.8 | 542.05 | 52.8   | 41.8   | 38.8    |
| 25        | 24.3 | 9.51  | 53.3 | 541.20 | 41.3   | 39.8   | 36.8    |
| 31.25     | 23.6 | 10.67 | 51.9 | 540.44 | 49.9   | 37.9   | 34.9    |
| 62.5      | 21.5 | 15.38 | 47.7 | 538.55 | 45.4   | 31.9   | 28.9    |
| 100       | 20.1 | 19.80 | 44.3 | 537.60 | 42.3   | 27.8   | 24.8    |
| 200       | 18.0 | 28.98 | 39.8 | 536.54 | 37.8   | 21.8   | 18.8    |
| 250       | 17.3 | 32.85 | 38.3 | 536.27 | 36.3   | 19.8   | 16.8    |

