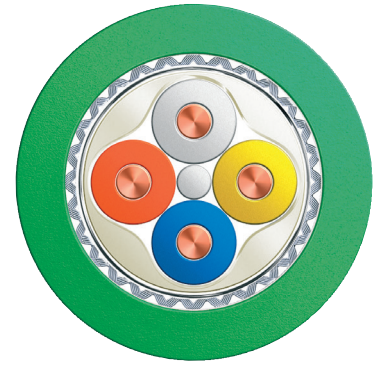


PROFINET

Type A Industrial Ethernet Cat 5e ES (LSZH)



Cable Design

Wire

| | | |
|------------|--------------------------------|-----------|
| Conductor | Solid bare copper wire (22awg) | Ø 0,65 mm |
| Insulation | Polyethylene (PE) | Ø 1,50 mm |

Core

| | | |
|------------------|--|-----------|
| Central Element | Filler | |
| 1° Layer | 4 wires twisted (WH-YE-BU-OG) | |
| Tape | Plastic tape overlapped | |
| Easystrip Jacket | Soft Thermoplastic copolymer | Ø 4,0 mm |
| Screen | Alulminate foil overlapped | |
| Braid | Tinned copper wire braid, 85% coverage | Ø 4,60 mm |

| | | |
|----------------|--------------------------------------|-----------------|
| Outer Jacket | LSZH (Low Smoke Zero Halogen), Green | Ø 6,5 ± 0,20 mm |
| Wall thickness | 0,9 mm | |



Characteristics

- Flame retardant acc. to IEC 60332-3 Cat. A/F,
- Halogen free acc. to IEC 60754,
- Sunlight resistant,
- UL-Style 21279 (600 V)

Specification

| Part Number | Type |
|-----------------|---|
| L45467-J16-B136 | Industrial Ethernet Cat 5e, PROFINET cable for permanent installation, 2x2x22AWG1, UL listed: CMG, LSZH |

PROFINET

Type A Industrial Ethernet Cat 5e ES (LSZH)

Electrical Data @ 20 °C

| | | | | |
|---|------------------|---|--------|------------|
| Loop resistance | | ≤ | 124 | Ohm/km |
| Resistance Difference | | | 5 | % |
| Signal run time | | ≤ | 5,3 | ns/m |
| Insulation resistance | | ≥ | 500 | MΩm*km |
| Characteristic Impedance | 1-100 MHz | | 100±15 | Ohm |
| Ground unbalance attenuation | 64 kHz | > | 43 | dB |
| Capacity unbalanced to ground | 1 MHz | ≤ | 3300 | pF/m |
| Return Loss (dB) | 1 ≤ f ≤ 10 MHz | | 20+5 | log (f) |
| Return Loss (dB) | 10 ≤ f ≤ 20 MHz | | 25 | |
| Return Loss (dB) | 20 ≤ f ≤ 100 MHz | | 25-7 | log (f/20) |
| Surface Transfer Impedance | 10 MHz | ≤ | 10 | mΩm/m |
| UL-Rating | | | 600 | V |
| Test Voltage (wire/wire/screen rms 50Hz min.) | | | 2000 | V |

| Frequency (MHz) | 0,256 | 0,512 | 0,772 | 1 | 4 | 10 | 16 | 20 | 31,25 | 62,5 | 100 |
|----------------------------------|-------|-------|-------|------|-----|-----|-----|-----|-------|------|------|
| Attenuation typ. Value (dB/100m) | 0,8 | 1,0 | 1,1 | 1,6 | 3,2 | 5,2 | 6,9 | 7,8 | 10,5 | 15 | 19,5 |
| NEXT typ. Value (dB/100m) | - | - | ≥ 80 | ≥ 80 | 75 | 70 | 65 | 63 | 60 | 55 | 50 |
| FEXT typ. Value (dB/100m) | - | - | ≥ 80 | ≥ 80 | 75 | 65 | 59 | 55 | 50 | 47 | 45 |

Mechanical & Thermal Characteristics

| | | | |
|-------------------------------|----------|-----------|-------|
| Permissible temperature range | | -25 ~ +75 | °C |
| Min. Bending radius allowed | repeated | 10 | x Ø |
| Min. Bending radius allowed | single | 5 | x Ø |
| Weight (approx.) | | 65 | kg/km |

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