Data Sheet

Brugg Strain Cable (BRUsens Strain V1)

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## Brugg Strain Cable (BRUsens Strain V1)

## Description

|  |  |
| --- | --- |
| 1 | LSZH (FRNC) outer sheath |
| 2 | Plastic protection layer with interlocking system |
| 3 | Multilayer buffer and strain transfer layer with interlocking system |
| 4 | Single mode optical fibre with 250 µm primary coating |

## Physical characteristics

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Cable construction | Number of fibres | Cable colour | Cable diameter  (mm) | Weight (kg/km) | Max. pulling tension (N)  IEC 60794-1-2 | | Min. bending radius (mm) | | Max. crush resistance (N/cm) |
| Short term | Long term | Short term | Long term |
| Tight buffer | 1 | Blue | 3.2 | 7.5 | 10 | 27 | 64(20x | 48(15x | 150 |

## Fibre characteristics

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Fibre type | Mode Field Diameter (µm) @ 1550nm | Refractive Index n @ 1550nm | Max. attenuation (dB/km)  @ 1550nm | Numerical aperture (-) |
| SMF  ITU-T G.652.D & G.657.A1&A2 | 9.4 – 10.4 µm | 1.467 | 0.5 |  |

## Brillouin parameters

|  |  |  |  |
| --- | --- | --- | --- |
|  | Cε (Mhz/%) | CT (MHz/°C) | Central Brillouin frequency (GHz)  @ 1550nm @ 20 ºC |
| Manufacturer | 500 | 1.1 | 10.6 |
| CSIC |  |  |  |

Preferred supplier: Direct from manufacturer Brugg Cables Price: ~ £3.75-4.00 + VAT per meter