OUTDOOR DROP CABLE

Cable structure


## - Featurs \& Application

- Self-supporting FTTH drop cable is constructed with from one to four single-mode fibers (G.657A1). The cable is protected by a dielectic strength member, suitable for direct aerial outdoor installation of FTTH network;
- Small diameter and light weight, water-resistant, soft and bendable, easy to deploy and maintenance.


## | Mechanical \& Environmental Characteristics

| SPECIFICATIONS | PARAMETERS |
| :--- | :--- |
| Number of optical fiber | $01 \mathrm{Fo} \div 04$ Fo |
| Dimension [HxD] mm (not messenger wire) | $[2.0 \mathrm{~mm} \times 3.0 \mathrm{~mm}] \pm 0.1 \mathrm{~mm}$ |
| Dimension $[\mathrm{HxD}] \mathrm{mm}$ (all messenger wire) | $[2.0 \mathrm{~mm} \times 5.0 \mathrm{~mm}] \pm 0.1 \mathrm{~mm}$ |
| Nominal weight (kg/km) | $20 \div 21$ |
| Maximum load (installtion) | 500 N |
| Maximum load (Operation) | 440 N |
| Temperature ranger (installtion) | $-5^{\circ} \mathrm{C} \div 65^{\circ} \mathrm{C}$ |
| Temperature ranger (operation) | $-10^{\circ} \mathrm{C} \div 65^{\circ} \mathrm{C}$ |
| Bending Radius (installtion) | $10^{*} \mathrm{D}$ ( $\mathrm{D}=$ Cable diameter) |
| Bending Radius (operation) | $20^{*} \mathrm{D}$ ( $\mathrm{D}=$ Cable diameter) |
| Longevity | $\geq 10$ Years |

## Identification

## TIAVEIA-598-A Compliance

| Fiber count | Color |
| :--- | :--- |
| 1 | NA (Any color) |
| 2 | Blue; Orange |
| 4 | Blue; Orange; Green; Brown |

## - Optical Characteristics

| Specifications | Unit | Fiber tyle: SM-ITU-T G.652D |
| :---: | :---: | :---: |
| *. Geometrical characterstics |  |  |
| Mode field diameter at 1310 nm | $\mu \mathrm{m}$ | $8.6 \pm 0.4$ |
| Cladding diameter | $\mu \mathrm{m}$ | $125 \pm 0.7$ |
| Core-clad concentricity | $\mu \mathrm{m}$ | $\leq 0.5$ |
| Cladding non-circularity | \% | $\leq 1.0$ |
| Coating diameter | $\mu \mathrm{m}$ | $245 \pm 10$ (none color) <br> $250 \pm 10$ (includding color) |
| *. Transmission characterstics |  |  |
| Attenuation at wavelength: $1310 \mathrm{~nm} \div 1625 \mathrm{~nm}$ | dB/km | $\leq 0.4$ |
| Attenuation at 1310 nm | dB/km | $\leq 0.3$ |
| Attenuation at 1490 nm | dB/km | $\leq 0.4$ |
| Attenuation at 1550 nm | dB/km | $\leq 0.22$ |
| Chromatic dispersion | ps/nm.km | $\begin{aligned} & \leq 3.5 \text { at } 1310 \mathrm{~nm} \\ & \leq 18 \text { at } 1550 \mathrm{~nm} \end{aligned}$ |
| PMD index | ps/km ${ }^{1 / 2}$ | $\leq 0.2$ |
| Zero dispersion wavelength | Nm | $1300 \leq \lambda \mathrm{o} \leq 1324$ |
| Zero dispersion slope | $\mathrm{ps} / \mathrm{nm}^{2}$. km | $\leq 0.092$ |
| Cut-off wavelength | Nm | $\lambda \mathrm{cc} \leq 1260$ |
| Macrobend loss at 1550 nm <br> + Radius $=15 \mathrm{~mm} * 10$ turns <br> + Radius = $10 \mathrm{~mm} * 1$ turns | dB | $\begin{aligned} & \leq 0.25 \\ & \leq 0.75 \end{aligned}$ |
| *. Mechanical characterstics |  |  |
| Proof stress | Gpa | $\geq 0.69$ |

*. Using the optical fiber from Corning, Fujikura, Sumitomo and Furukawa.

## I Informations and parking

- The informations of the cable is printed per meter length complies with IEEE P1222. Other information will be printed as the request of customer.
- Standard length: 1000 m to 2000 m or is packed according to customer's requirements.

