## TECHNICAL SPECIFICATION

## PLC Splitter

| A |
| :--- |
| Version |
| July 14，2021 |
| Date |
| Prepared |
| Revan |
| Reviewed |
| Approved |

1．Cassette Type PLC Splitter，with LC／APC pigtail，G657A1 fiber， $2.0 \pm 0.2 \mathrm{~mm}$ ，pigtail length 1.5 m at input port and output port，LSZH yellow jacket（pantone 136C），1＊32．

Cassette Type PLC Splitter ，with LC／APC pigtail，G657A1 fiber， $2.0 \pm 0.2 \mathrm{~mm}$ ，pigtail length 2.7 m at input port and output port，LSZH yellow jacket（pantone 136C），1＊32．

## 1．1 General properties：



Note：the picture provides a reference only．
1．2 Technical characteristics for splitter：

| Type | $1 \times 32$ |
| :---: | :---: |
| Channel wavelength（nm） | $1260-1650$ |
| Insertion loss（dB） | $\leq 17.5$ |
| Loss Uniformity（dB） | $\leq 1.7$ |
| Return loss（dB） | $\geq 55$ |
| Polarization dependent loss（dB） | $\leq 0.3$ |
| Directivity（dB） | $\geq 55$ |
| Operating temperature $\left({ }^{\circ} \mathrm{C}\right.$ ） | $-40 \sim+85$ |
| Storage temperature（ ${ }^{\circ} \mathrm{C}$ ） | $-40 \sim+85$ |

Note1：Focus on uniform distribution device；the fiber type is single－mode optical fiber．
Note2：All parameter tests with connectors．

## 1．3 Application

－Installed in optical cross connecting cabinet and splitting box．The color can be adjusted according to customers＇requirements．

## 1．4 Feature

－Small size and aesthetic appearance．
－Installation quick，reliable performance，stability．
－Employ integrated optic production process．
－Wide operating wavelength range．
－Good uniformity，in particular the application of PON．
－Dimension： $120 * 80 * 18 \mathrm{~mm}$ ．

## 1．5 Optical Fiber：

The optical fiber shall be made of high pure silica and germanium doped silica．UV curable acrylate material is applied over fiber cladding as optical fiber primary protective coating．The detail data of optical fiber performance are shown in the following table：

## G657A1 fiber

| Category | Description |  | Specifications |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  | Before cable | After cable |
| Optical Specifications | Attenuation | ＠1310 nm | $\leq 0.35 \mathrm{~dB} / \mathrm{km}$ | $\leq 0.40 \mathrm{~dB} / \mathrm{km}$ |
|  | Attenuation | ＠1550 nm | $\leq 0.21 \mathrm{~dB} / \mathrm{km}$ | $\leq 0.30 \mathrm{~dB} / \mathrm{km}$ |
|  | Zero Dispersion Wavelength |  | $1300 \sim 1324 \mathrm{~nm}$ |  |
|  | Zero Dispersion Slope |  | $\leq 0.092 \mathrm{ps} / \mathrm{nm}^{2} \cdot \mathrm{~km}$ |  |
|  | Cable Cutoff Wavelength（ $\lambda c \mathrm{c}$ ） |  | $\leq 1260$ nm |  |
|  | Macro Bending Loss <br> （10 turns；$\Phi 30 \mathrm{~mm}$ ） <br> （10 turns；$\Phi 30 \mathrm{~mm}$ ） <br> （1 turns；$\Phi 20 \mathrm{~mm}$ ） <br> （1 turns；$\Phi 20 \mathrm{~mm}$ ） | ＠1550 nm <br> ＠1625 nm <br> ＠1550 nm <br> ＠1625 nm | $\leq 0$. $\leq 1$ $\leq 0$. $\leq 1$ | 5 dB <br> dB <br> 7 dB <br> dB |
|  | Mode Field Diameter | ＠1310 nm | （8．6～9．5）$\pm 0.4 \mu \mathrm{~m}$ |  |
| Dimensional Specifications | Cladding Diameter |  | $125 \pm 1 \mu \mathrm{~m}$ |  |
|  | Cladding Non Circularity |  | ＜1．0\％ |  |
|  | Core／Clad Concentricity Error |  | $\leq 0.5 \mu \mathrm{~m}$ |  |
| Mechanical Specifications | Proof Stress |  | $\geq 1.05 \%$ |  |

