

FEATURES

- 1.The style is diverse, the interface is complete
- 2.Low insertion loss and added loss
- 3.Height of attenuation
- 4.High back loss, small volume, light weight
- 5.End-face geometry and quality superior than IEC and Telcordia standards.
- 6.LSZH, OFNP, OFNR cable jacket.
- 7.Mechanical performance: IEC 61754-13 standard.
- 8.RoHS and REACH materials compliant.

APPLICATION

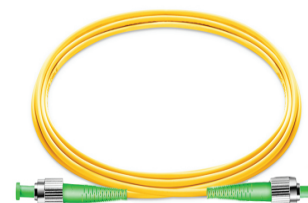
- 1.Optical fiber communication systems engineering
- 2.Fiber optic data communication network
- 3.Fiber CATV engineering
- 4.Other optical technology tests



SC-SC



SC-FC



FC-FC

CONNECTOR TYPES

| Type | Reference | | |
|------------------|------------------|---------------------|------------------|
| FC / SC | IEC 61754-13 | Single mode simplex | APC: Green boots |
| | | | UPC: Black boots |
| | | Single mode duplex | APC: Green boots |
| | | | UPC: Black boots |
| | | Multimode simplex | UPC: Black boots |
| Multimode duplex | UPC: Black boots | | |

PATCH CORD VERSIONS

| Overall length (L)(M) | Jumpe | length of tolerance(CM) |
|-----------------------|-------|-------------------------|
| $0 < L \leq 20$ | | +10/-0 |
| $20 < L \leq 40$ | | +15/-0 |
| $L > 40$ | | +0.5%L/-0 |

OPTICAL CHARACTERISTICS

| Item | Parameter | | Reference |
|----------------|---|---|----------------|
| | Single mode | Multimode | |
| Insertion loss | Typical value ≤ 0.15 dB; Maximum ≤ 0.30 | Typical value ≤ 0.15 dB; Maximum ≤ 0.30 | IEC 61300-3-34 |
| Return loss | ≥ 60 dB (APC); ≥ 50 dB (UPC) | ≥ 30 dB (UPC) | IEC 61300-3-6 |

END-FACE GEOMETRY

| Item | UPC (Ref: IEC 61755-3-1) | APC (Ref: IEC 61755-3-2) |
|--------------------------|--------------------------|--------------------------|
| Radius of curvature (mm) | 10 to 25 | 5 to 12 |
| Fiber height (nm) | -100 to 100 | -100 to 100 |
| Apex offset (μm) | 0 to 50 | 0 to 50 |
| APC angle (°) | / | 8° ±0.2° |
| Key error (°) | / | 0.2° max |

END-FACE GEOMETRY

| Zone | Range (μm) | Scratches | Defects | Reference |
|-----------------|------------|-----------|---------|---------------------|
| Core | 0 to 25 | None | None | |
| Cladding | 25 to 115 | None | None | |
| Adhesive | 115 to 135 | None | None | IEC 61300-3-35:2015 |
| Contact | 135 to 250 | None | None | |
| Rest of ferrule | | None | None | |

END-FACE QUALTY (MM)

| Zone | Range (μm) | Scratches | Defects | Reference |
|-----------------|------------|-----------|---------|---------------------|
| Core | 0 to 65 | None | None | |
| Cladding | 65 to 115 | None | None | |
| Adhesive | 115 to 135 | None | None | IEC 61300-3-35:2015 |
| Contact | 135 to 250 | None | None | |
| Rest of ferrule | | None | None | |

MECHANICAL CHARACTERISTICS

| Test | Conditions | Reference |
|--------------------------------|--|----------------|
| Endurance | 500 matings | IEC 61300-2-2 |
| Vibration | Frequency: 10 to 55Hz, Amplitude: 0.75mm | IEC 61300-2-1 |
| Cable retention | 100N (patch cable); 5N (pigtail) | IEC 61300-2-4 |
| Strength of coupling mechanism | 80N for 2 to 3mm cable | IEC 61300-2-6 |
| Cable torsion | 15N for 2 to 3mm cable | IEC 61300-2-5 |
| Fall | 10 drops, 1m drop height | IEC 61300-2-12 |
| Static lateral load | 1N for 1h (patch cable); 0.2N for 5min (pigtail) | IEC 61300-2-42 |
| Cold | -25°C, 96h duration | IEC 61300-2-17 |
| Dry heat | +70°C, 96h duration | IEC 61300-2-18 |
| Change of temperature | -25°C to +70°C, 12 cycles | IEC 61300-2-22 |
| Humidity | +40°C at 93%, 96h duration | IEC 61300-2-19 |

ORDER INFOMATION

| PRODUCT | PART NUMBER |
|---|------------------|
| Patch Cord SC-SC, , APC, SM 9/125um, Duplex, 3M | F-APC-SCSC9-3-DX |
| Patch Cord SC-FC, APC, SM 9/125um, Duplex, 3M | F-APC-SCFC9-3-DX |
| Patch Cord FC-FC, APC, SM 9/125um, Duplex, 3M | F-APC-FCFC9-3-DX |