

### Field-Installable Pre-Polished Optical Fiber Connectors

The Signamax Field-Installable Pre-Polished Optical Fiber Connectors is a pre-polished, pre-assembled connector compatible with standard SC, LC and connectors. As no adhesive is required as an internal mechanical grip effectively holds the fiber in place and with this unique feature, termination can be performed swiftly.

Without polishing or adhesives, the FPC makes on site installations quick and easy, eliminating the need for epoxy curing and hand polishing at the work site. In addition, Signamax offers an assembly jig and fiber holder for 250µm and 900µm tight buffered fiber, ensuring accurate alignment when terminating.

Available in multimode (62.5-µm (OM1), 50-µm (OM2), 50-µm laser-optimized (LO) (OM3/OM4), and singlemode (UPC and APC) SC, and LC versions, field-installable connectors feature a polished ferrule with a factory-installed fiber stub, which splices in the field to distribution cable fibers using an integrated alignment mechanism and index-matching gel. The alignment mechanism is activated with the help of a termination clip, which is supplied with each connector; after successful termination, the clip is removed. Field-installable connectors are designed to terminate 250- and 900-µm buffered fibers.

#### KEY FEATURES

- Available in the following versions:
  - OM1 (62.5-µm multimode)
  - OM2 (50-µm multimode)
  - OM3 (50-µm laser-optimized (LO) multimode)
  - singlemode (UPC and APC)
- Plastic body color-coding per ANSI/TIA-598-C.3
- Slim-profile boots with durable flexible cable strain relief
- Field installation procedures minimized and simplified – pre-polished ferrule with a factory-installed fiber stub, integrated alignment mechanism and index-matching gel
- Termination clip and detailed installation instructions are supplied with each connector
- Designed to terminate 250- and 900-µm buffered fibers,
- RoHS Compliant, UL94-V0

#### ORDERING INFORMATION

##### SC Pre-Polished Optical Fiber Connectors

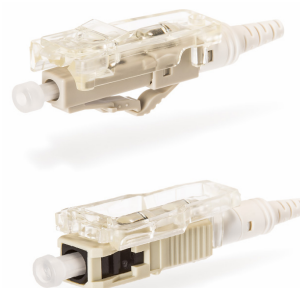
| Part Number  | Connector            | Fiber Coating/Jacket | Body Color |
|--|----------------------|----------------------|------------|
| FPC-Q-SC06-02  | SC OM1 (62.5-µm MM)  | 250 / 900 µm         | Beige      |
| FPC-Q-SC05-02  | SC OM2 (50-µm MM)    | 250 / 900 µm         | Black      |
| FPC-Q-SC51-02  | SC OM3 (50-µm MM LO) | 250 / 900 µm         | Aqua       |
| FPC-Q-SC09-02  | SC SM UPC            | 250 / 900 µm         | Blue       |
| FPC-Q-SCAA-02  | SC SM APC-Angled     | 250 / 900 µm         | Green      |
| For bulk packaging replace Q in P/N with: 06: 6-connector pack 12: 12-connector pack |                      |                      |            |

##### LC Pre-Polished Optical Fiber Connectors

| Part Number  | Connector            | Fiber Coating/Jacket | Body Color |
|--|----------------------|----------------------|------------|
| FPC-Q-LC06-02  | LC OM1 (62.5-µm MM)  | 250 / 900 µm         | Beige      |
| FPC-Q-LC05-02  | LC OM2 (50-µm MM)    | 250 / 900 µm         | Black      |
| FPC-Q-LC51-02  | LC OM3 (50-µm MM LO) | 250 / 900 µm         | Aqua       |
| FPC-Q-LC09-02  | LC SM UPC            | 250 / 900 µm         | Blue       |
| For bulk packaging replace Q in P/N with: 06: 6-connector pack 12: 12-connector pack |                      |                      |            |

##### Connector Assembly Jig (Optional)

| Part Number | Description               |
|-------------|---------------------------|
| FPC-JIG-SC  | SC Connector Assembly Jig |
| FPC-JIG-LC  | LC Connector Assembly Jig |



## Field-Installable Pre-Polished Optical Fiber Connectors

### SPECIFICATIONS

#### TRANSMISSION PERFORMANCE

ANSI/TIA/EIA-568-C.3: insertion and return loss (100% tested)

#### TRANSMISSION MEDIA

Optical fiber:  
 OM1 (62.5/125- $\mu$ m multimode)  
 OM2 (50/125- $\mu$ m multimode)  
 OM3 (50/125- $\mu$ m laser-optimized (LO) multimode)  
 OM4 (50/125- $\mu$ m laser-optimized (LO) multimode)  
 8-10/125- $\mu$ m singlemode

#### CONNECTOR TYPES

Connector type: SC, LC: SX MM PC  
 SC, LC: SX SM UPC  
 SC: SX SM APC  
 Compliance: FOCIS (ANSI/TIA/EIA-604)

#### CONSTRUCTION

Body: thermoplastic  
 Ferrule: ceramic- thermoplastic strain relief  
 Strain relief boot: thermoplastic

#### TRANSMISSION PERFORMANCE

| SPECIFICATIONS<br>For SC Connectors | SINGLEMODE<br>Typical      | MULTIMODE | SPECIFICATIONS<br>For LC Connectors | SINGLEMODE<br>Typical      | MULTIMODE |
|-------------------------------------|----------------------------|-----------|-------------------------------------|----------------------------|-----------|
| Insertion Loss                      | 0.2dB (PC)<br>0.3dB (APC)  | 0.1dB     | Insertion Loss                      | 0.2dB (PC)<br>0.3dB (APC)  | 0.1dB     |
| Return Loss                         | 55dB (PC)<br>60dB (APC)    | 35dB      | Return Loss                         | 55dB (PC)<br>60dB (APC)    | 35dB      |
| Durability                          | <0.1dB change, 500 matings |           | Durability                          | <0.1dB change, 500 matings |           |
| Intermateability                    | IEC 61754-4                |           | Intermateability                    | IEC 61754-4                |           |
| Tensile                             | TIA/EIA 568-C.3            |           | Tensile                             | TIA/EIA 568-C.3            |           |

#### ENVIRONMENTAL

Operation temperature: -40 °C to +75 °C (-40 °F to +167 °F)  
 Humidity: 95 % RH (non-condensing)

#### COMPLIANCE

ANSI/TIA-568-C.3, FOCIS (ANSI/TIA/EIA-604), UL94V-0

#### APPLICATIONS

|                      |           |            |             |             |                            |
|----------------------|-----------|------------|-------------|-------------|----------------------------|
| FDDI PMD ANSI X3.166 | 10BASE-SX | 100BASE-SX | 1000BASE-SX | 10GBASE-S   | Fiber Channel 100-MX-SN-I  |
|                      |           | 100BASE-FX | 1000BASE-LX | 10GBASE-LX4 | Fiber Channel 200-MX-SN-I  |
|                      |           |            |             | 10GBASE-LRM | Fiber Channel 400-MX-SN-1  |
|                      |           |            |             |             | Fiber Channel 1200-MX-SN-1 |

#### WARRANTY

5-year limited component warranty