

DIAMOND

Fiber Optic Components

CABLE ASSEMBLIES AND ADAPTERS

Telecommunications and Fiber Optics are developing at an incredible speed. To keep up with tomorrow's requirements the F-3000™ Small-Form-Factor (SFF) connector family was developed. SFF components themselves enable port spacing similar to RJ-45 design.

Thanks to the experience and good results obtained with the Diamond E-2000™ connector standard, the F-3000™ connector includes many of the already proven features in combination with the SFF construction.

Furthermore the F-3000™ is LC compatible, which opens access to a broad field of existing applications, and these will be increased with new customer specific solutions.

Same as previously developed for the E-2000™ connector, there is also a low IL version available for F-3000™ upper range transmission applications.

APPLICATIONS

- ▶ Telecommunications Networks
- ▶ CATV
- ▶ Local Area Networks (LAN)
- ▶ Data Processing Networks
- ▶ FTTx

STANDARDS

- ▶ IEC 61 754-20 "Fiber optic connector interfaces - Type LC connector family"
- ▶ TIA/EIA 604-10-A "Fiber optic intermateability standard -Type LC"

AVAILABLE AS

- ▶ Terminated connector
- ▶ Connector set, (to be terminated with Diamond special equipment)

SPECIFICATIONS

STANDARD	MULTIMODE 0° PC	SINGLE MODE 0° PC	SINGLE MODE 8° APC	UNITS	TEST CONDITIONS
Insertion Loss (IL)	typ. 0.15 max. 0.4	typ. 0.1 max. 0.4	typ. 0.1 max. 0.4	dB	IEC 61300-3-4; λ = 1300/1550nm
Return Loss (RL)	typ. 40	min. 50	min. 70*	dB	IEC 61300-3-6; λ = 1300/1550nm
Repeatability of IL		max. ±0.1		dB	IEC 61300-2-2; λ = 1300/1550nm
LOW IL VERSION		SINGLE MODE 0° PC	SINGLE MODE 8° APC		
Insertion Loss (IL)	-	typ. < 0.1 max. 0.15	typ. < 0.1 max. 0.15	dB	IEC 61300-3-4; λ = 1300/1550nm
Return Loss (RL)	-	min. 50	min. 85*	dB	IEC 61300-3-6; λ = 1300/1550nm
Operating temperature		-40/+85**		°C	
Storage temperature		-40/+90**		°C	

* Measured with high precision reflectometer
 ** May be further limited by cable specifications



DIAMOND SA • Via dei Patrizi 5 • CH-6616 Losone - Switzerland
 Tel. +41 91 785 45 45 • Fax +41 91 785 45 00 • e-mail info@diamond-fo.com

www.diamond-fo.com

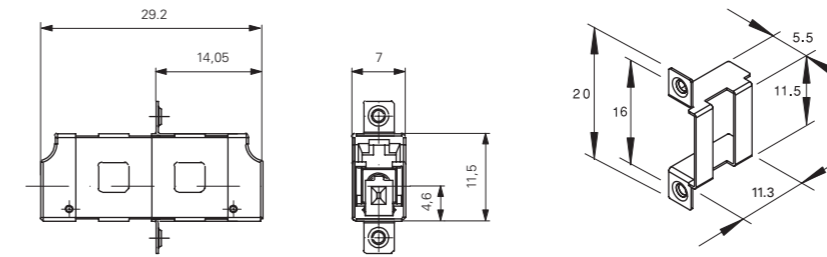
F-3000™ Simplex

SINGLE MODE PC/APC
 MULTIMODE PC

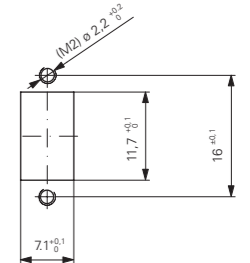


ADAPTER TYPES AND DIMENSIONS

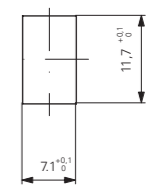
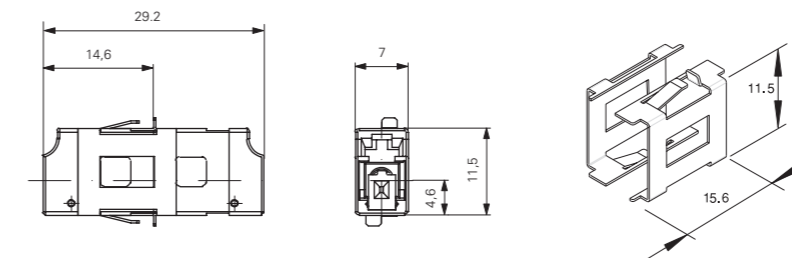
F-3000™ Simplex mating adapter with screw fixing clip



CUTOUT DIMENSIONS



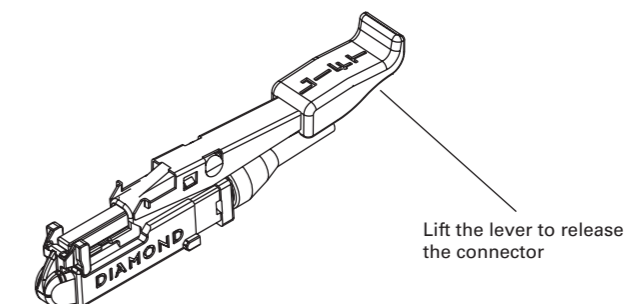
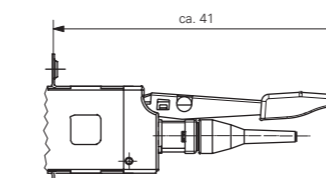
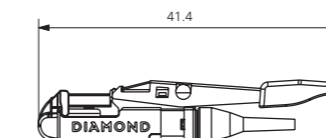
F-3000™ Simplex mating adapter with quick fixing clip



Max wall thickness 1.6 mm

OPTION: LONG THUMB-LATCH

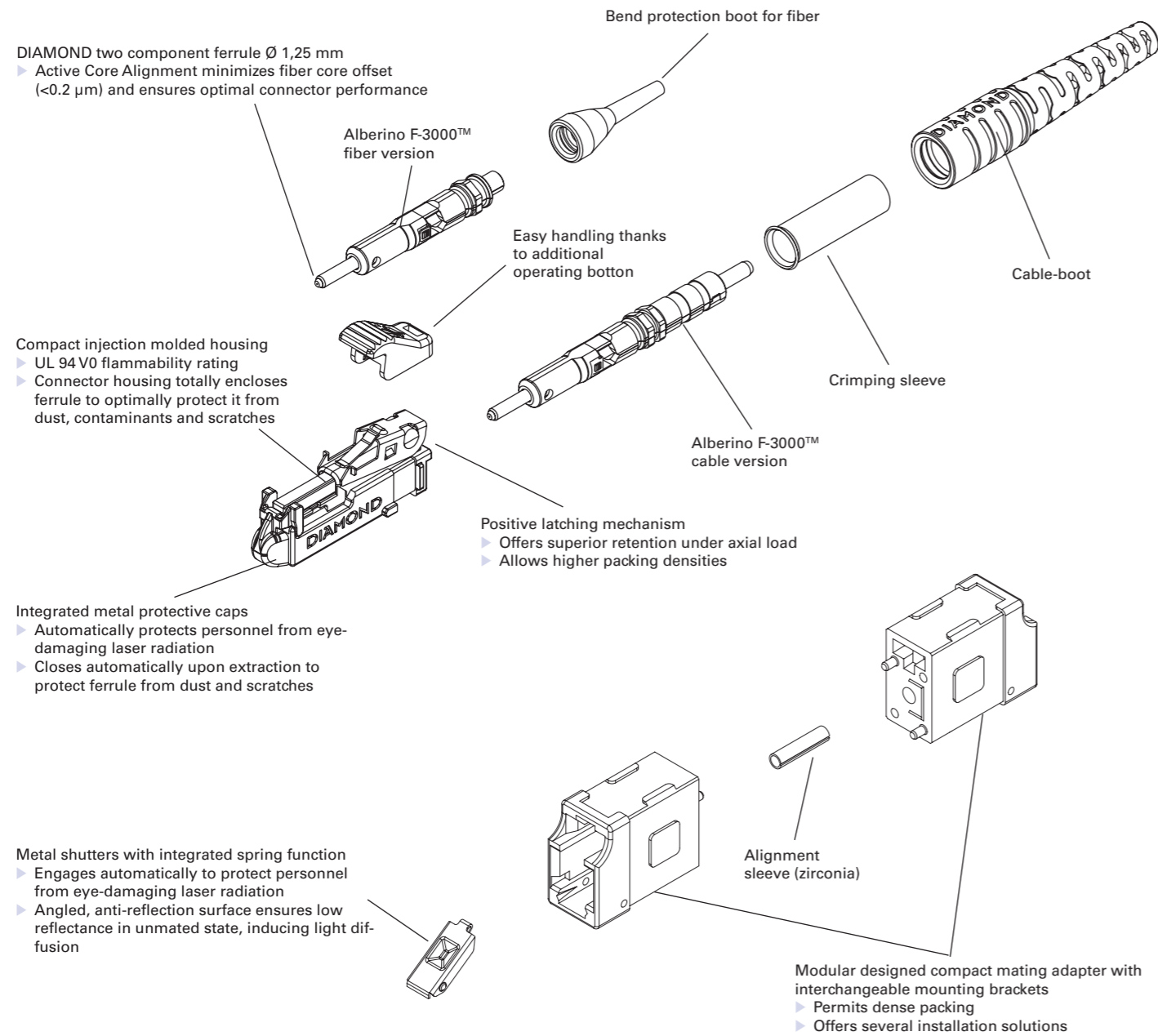
The ideal solution for special applications with difficult access



- NOTES: - Cable ø 2.1 mm max.
 - Please contact your local Diamond representative for additional information

Specifications subject to change without notice

BDD 1950155 048

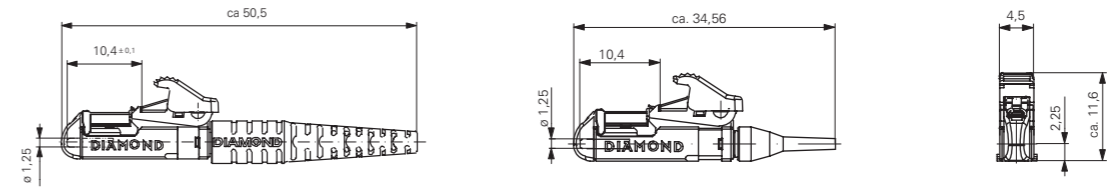


CONNECTOR TYPES AND DIMENSIONS

F-3000™ Simplex connectors 900 μm - 3 mm boot style

Available types: **F-3000™ Simplex PC**
F-3000™ Simplex APC
F-3000™ Simplex APC Low IL

Ferrule material: Zirconia/metal insert
 External parts: Plastic



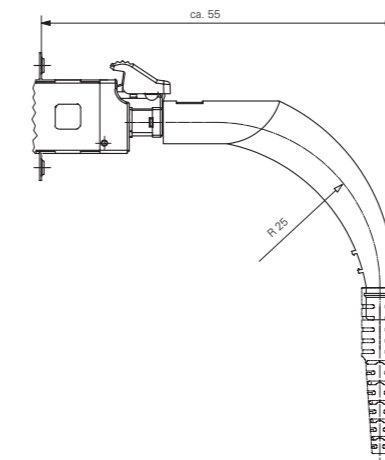
F-3000™ s Simplex connectors 900 μm - 3 mm boot style

Available types: **F-3000™ s Simplex PC**
F-3000™ s Simplex APC
F-3000™ s Simplex APC Low IL



The new F-3000™ s without protection cap and button is a simplified version of the F-3000 standard connector. It enables the access to SFF and SFP components, ensuring full compatibility with today's LC non-compliant transceivers.

F-3000™ Simplex connectors 90° boot style (only for 1.6 mm - 3 mm cables)



ORDER INFORMATION

When ordering **standard** pigtailed and patchcords, mating adapters and fixing clips, please refer to the part numbers provided in the enclosed P/N list.

When ordering pigtailed or cable assemblies, please refer to the **connector type description** in the Available types section, and fill in the Simplex, Duplex, Multiple fiber Assemblies order form according to **those** denominations.

NOTE As standard, Diamond uses colored connector bodies, cable boots and mating adapter housings to identify the fiber type (SM or MM 50/62.5μm) and ferrule polish (PC or APC). Diamond's standard **connector/boot/adaptor** colors are as follows: Beige/Black/Beige for MM PC 50μm, Beige/Beige/Beige for MM PC 62.5μm, Blue/Blue/Blue for SM PC, and Green/Green/Green for SM APC. Other colors are available upon request.