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Fujikura 90S





The 90S is a single fibre core alignment fusion splicer setting a new standard in the market for fusion splicing. The 90S is packed with a whole host of new and enhanced features specifically developed with the objective to enable the user to work faster with higher precision. Overall process time has been significantly improved against our previous model (70S+). This has been achieved with a combination of improvements to the reaction time of the automated wind protectors and automated heater, new fibre retention clamps, improved universal sheath clamps and a redesigned internal structure that matches the protection sleeve to the fusion splice point which enables splicing to be achieved without the need of the user to touch the 90S once the process has started.

FEATURES/BENEFITS

• Market leading high precision and accurate core alignment technology with advanced image processing technology

• Improved automatic wind protector design which reduces overall splice time but can also be used in manual style

- High capacity lithium-ion battery (up to 300 splices)
- Patented easy splice protector positioning system
- Universal sheath clamps for standard 250 um fibre but also 900 um loose tube fibre types.
- Fibre Retention clamps

• Enabled with Fujikura's unique "Active Blade Management Technology" with new capability to link up to 2 CT50 cleavers simultaneously.

- · A completely redesigned multi-function carry case and workstation
- Tool-less replaceable electrodes
- Touch screen

APPLICATIONS

- FTTx
- Telecom
- Data Centre
- Broadcast

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SPECIFICATIONS

ITEM	SPECIFICATION		
Fiber alignment method		Active core alignment	
Fiber count can be spliced		Single fiber	
		Single mode optical fiber	
Applicable fiber	Fiber type	Multi mode optical fiber	
	Cladding dia.	80 to 150µm	
		Coating dia. : Max. 3,000µm	
Applicable coating	Sheath clamp	Cleave length : 5 to 16mm *1	
	Splice loss *2	ITU-T G.652 : Avg. 0.02dB	
		ITU-T G.651 : Avg. 0.01dB	
		ITU-T G.653 : Avg. 0.04dB	
Fiber splice performance		ITU-T G.655 : Avg. 0.04dB	
		ITU-T G.657 : Avg. 0.02dB	
	Calico timo *2	SM FAST mode : Avg. 7 to 9sec.	
	Splice time *3	AUTO mode : Avg. 14 to 16sec.	
	Sleeve type	Heat shrinkable sleeve	
Applicable protection sleeve	Sleeve length	Max. 66mm	
	Sleeve dia.	Max. 6.0mm before shrinking	
Cleave heat performance	Heat time *4	60mm slim mode : Avg. 9 to 10sec.	
Sleeve heat performance	Heat time *4	60mm mode : Avg. 13 to 15sec.	
Fib er tensile test force		Approx. 2.0N	
Electrode life *5		Approx. 5,000 splices	
	Dimensions W	Approx.170mm without projection	
Physical description	Dimensions D	Approx.173mm without projection	
	Dimensions H	Approx.150mm without projection	
	Weight	Approx. 2.8kg including battery	
	Tomporaturo	Operate : -10 to 50 degreeC	
	Temperature	Storage : -40 to 80 degreeC	
Environmental condition		Operate : 0 to 95%RH non-condensing	
	Humidity	Storage : 0 to 95%RH non-condensing	
	Altitude	Max. 5,000m	
AC adaptor	Input	AC100 to 240V, 50/60Hz, Max. 1.5A	
	Туре	Rechargeable Lithium Ion	
	Output	Approx. DC14.4V / 6,380mAh	
Battery pack	<u>Capacity *6</u> Temperature	Approx. 300 splice and heat cycles	
		Recharge : 0 to 30 degreeC	
		Storage : -20 to 30 degreeC	
	Battery life *7	Approx. 500 recharge cycles	
Display	LCD monitor	TFT 5 inches with touch screen	
	Magnification	200 to 320x	
Illumination	V-grooves	LED lamp	
	PC	USB2.0 Mini B type	
Interface	External LED lamp	USB2.0 A type Approx. DC5V, 500mA	
	Ribbon Stripper	Mini DIN 6pin DC12V, Max. 1A	
	Wireless *8	Bluetooth 4.1 LE	
	Splice mode	100 splice modes	
Data storage	Heat mode	30 heat modes	
-	Splice result	20,000 splices	
Carow halo far tripad	Splice image	100 images 1/4-20UNC	
Screw hole for tripod			
		Splice mode select by fiber type analysis	
		Discharge power calibration	
	Automatic function	Wind protector : open/close sSheath clamp : open	
Other features	Automatic Tunction	· · · ·	
Other features		Heater lid : open/close	
	Deference quide	Heater clamp : open/close	
	Reference guide	Video and PDF file stored in splicer	
	Sheath clamp Electrode	Easy sleeve positioning clamp Replaceable without tool	
	Electione		

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Notes

*1: Cleave length range depending on fiber type

5 to 16mm : 125 μm cladding dia. / 250 μm coating dia.

10 to 16mm : 125 μ m cladding dia. / 400 or 900 μ m coating dia.

5 to 10mm : 80 μm cladding dia. / 160 μm coating dia.

*2: Measured with a cut-back method relevant to ITU-T and IEC standard after splicing Fujikura identical fibers. The average splice loss changes depending on the environmental condition and fiber characteristics.

*3: Measured at room temperature. The definition of splice time is from the fiber image appeared in LCD monitor to the estimated loss displayed. The average splice time changes depending on the environmental conditions, fiber type, and fiber characteristics.

*4: Measured at room temperature with the AC adapter. The heat time is defined from the start beep sound to the finish beep sound. The average heat time changes depending on the environmental conditions, sleeve type and battery pack condition.

*5: The electrode life changes depending on the environmental conditions, fiber type and splice modes. *6: Test condition

(1) Splice and heat time : 2 minutes cycle

(2) Using the splicer power save settings

(3) Using a not degraded battery

(4) At room temperature

The battery capacity changes when testing with different conditions from the above.

*7: The battery capacity decreases to a half after approx. 500 discharge and recharge cycles, The battery life is shortened further when using outside of the storage temperature range, operating temperature range, if completely discharged by storing for a long time without recharging.

*8: Bluetooth® mark and logos are the registered trademarks of Bluetooth SIG, Inc.

*9: Please follow IATA regulation when shipping the battery by air.

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ITEM	MODEL	REMARK
Battery pack*9	BTR-15	Battery pack for replacement
Electrodes	ELCT2-16B	Electrodes for replacement
	FH-70-250	250μm coating diameter
	FH-70-900	900μm coating diameter
Fiber holder	FH-FC-20	900μm in 2mm diameter cable
	FH-FC-30	900μm in 3mm diameter cable
DC Adapter	DCA-03	Connect AC adapter not through battery
	DCC-20	Car cigar socket to BTR-15/DCA-03
DC power cord	DCC-21	Car battery to BTR-15/DCA-03
Transfer Clamp	CLAMP-DC-12	Transferring drop cable on work tray
	JP-10	Attaching to splicer, not to work tray
J-Plate	JP-10-FC	JP-10 with fiber clamps
	FP-03	60mm Max. 900μm coating diameter
Protection sleeve	FP-03(L=40)	40mm Max. 900μm coating diameter
	FP-03M	FP-03 with non-magnetic material

DESCRIPTION	MODEL NO.	QTY
Core Alignment Fusion Splicer	905	1pc
(1) Battery Pack*	BTR-15	1pc
(2) AC Adapter	ADC-20	1pc
(3) AC Power Cord	ACC-14, 15, 16 or 17	1pc
(4) USB Cable	USB-01	1pc
(5) Fusion Splicer Strap	ST-02	1pc
(6) Electrodes (spare)	ELCT2-16B	1pair
(7) Fiber Holder Set Plate	SP-03	1pair
(8) Carrying Case	CC-39	1pc
(9) Work Tray Left	WT-09L	1pc
(10) Work Tray Right	WT-09R	1pc
(11) Work Tray J-Plate	JP-09	1pc
(12) Tripod Screw	TS-03	2pcs
(13) Carrying Case Strap	ST-03	1pc
(14) Alcohol Dispenser	AP-02	1pc
(15) Quick Reference Guide	QRG-02-E, C or J	1pc
Single Fiber Stripper	SS03 or SS01	1pc
Optical Fiber Cleaver	CT50	1pc
(1) Fiber Scrap Collector	FDB-05	1pc
(2) Fiber Setting Plate	AD-10-M24	1pc
(3) Case (for Cleaver)	CC-37	1pc
(4) Hexagonal Wrench	HEX-01	1pc

* Please follow IATA regulation when shipping the battery by air.



FURTHER INFORMATION

- For additional information please contact your sales representative
- To view the product 360 visit the product page (Scan the QR code or visit the link below)
 - Downloaded from https://www.fujikura-telecom.com/product/fujikura-90s
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 - Information in this document is correct as of December 09, 2019

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