

INTERFEROMETRY



DAFFI SF

Digital Automated Fiber & Ferrule Interferometer for Single-Fiber connectors

The latest interferometer from Data-Pixel is the perfect solution for high volumes production, while ensuring high accuracy and repeatability of the measurements.

Based on our extensive interferometer manufacturing experience we designed the DAFFI SF to be **robust, fast and accurate** in order to meet all manufacturing or laboratory environments.

With the Blink software platform, DAFFI is able to measure the end face geometry on Single-Fiber connectors in a very short time.

The Daffi SF interferometer accessories (flanges and adapters) are fully compatible with the Daisi range, allowing the user to limit the costs of the 3D geometry measurement units.

KEY FEATURES :

Measurement of PC and APC connectors, ferrules and bare fibers

True phase-shifting interferometer

Non-contact measurement

Smart autofocus, focus only when required

Servo-controlled reference mirror for automatic Apex calibration

Vibration insensitive

Easy and fast switching from PC to APC, no change of fiber holder required

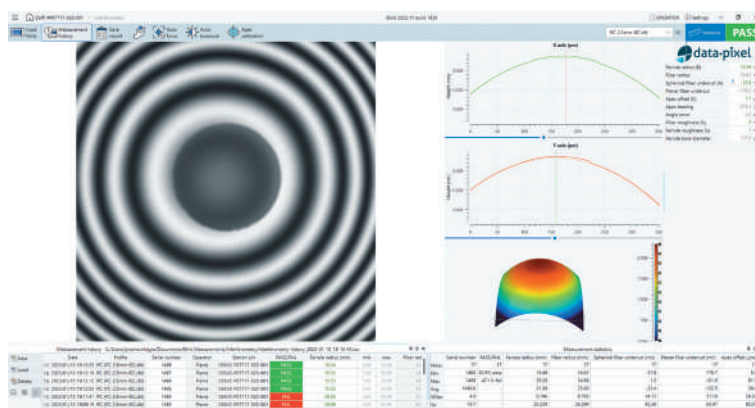
Compliance with Industry Standards for Interferometer Measurements

Intuitive BLINK software, with data-base connectivity

Compatible with desktop PC, laptop, tablet PC

SPECIFICATIONS :

Field of view (mm) :	1.1 x 0.9
Scan mode :	Red light
Radius (mm) :	3 to flat
Apex Offset (μm) :	0 to 500
Fiber Height (nm) :	± 160
Fiber cleave angle (degrees) :	0 to 12
Measurement speed (sec.) :	1
Magnification :	X 300
Outputs :	USB 2.0 + USB 3.0
Power source :	External 12V
Dimensions H x W x L (mm) :	133 x 171 x 244
Weight (kg) :	6.3



Interferometry report

Generated by Blink  Data-Pixel

Date	2023-01-10 19:18	Serial number	1498	PASS
Measurement device	Daffi	Operator	Pierre	
Device s/n	036V2-P07717-020-001	Station s/n	036V2-P07717-020-001	
Type	PC			
Profile	PC-2.5mm-IEC.sfd			
Fiber diameter	125µm			

Parameter	min allowed	max allowed	Measurement result	Pass/Fail
Ferrule radius [B]	5 mm	30 mm	15.54 mm	PASS
Fiber radius	5 mm	30 mm	14.41 mm	IGNORED
Spherical fiber undercut [A]	-100 nm	162.9 nm	-37.8 nm	PASS
Planar fiber undercut	-30 nm	0 nm	-176.2 nm	IGNORED
Apex offset [C]	0 µm	50 µm	7.1 µm	PASS
Apex bearing	-360 °	360 °	275.1 °	IGNORED
Angle error	-0.5 °	0.5 °	0 °	IGNORED
Fiber roughness Sq	0 nm	50 nm	2 nm	PASS
Ferrule roughness Sq	0 nm	50 nm	1 nm	PASS
Ferrule bore diameter	120 µm	130 µm	127.3 µm	IGNORED

Blink is a software platform common to all Data-Pixel products. Dedicated plugins support the Interferometry range of products : 3D Scope-V2, Daffi SF, Daisy-V3, Daffi MT and Daisy MT-FP.

PDF, HTML and CSV reporting capability with extensive database support (SQL Server, MySQL, ODBC, ORACLE,...).

OLE automation support is available for dedicated application.

ORDER OPTIONS :

DAFFI SF unit with Blink Interferometry	70-DFSF-V1-A06-00
Flange 1.25mm	10-FL-001380
Flange 1.25mm LC DUPLEX (Uniboot, MDC, SN, standard LC)	30-FL-003244
Flange 1.25mm LC DUPLEX (CS, URM P2)	30-FL-002603
Flange 1.60mm	30-FL-002382
Flange 2.00mm	30-FL-002395
Flange 2.50mm	30-FL-001396
Flange 3.17mm SMA	30-FL-003224
Flange for bare fiber	40-FL-001660
Adapter 1.25mm LC	10-AD-001013
Adapter 1.25mm Duplex	Several references available
Adapter 1.25mm MU	10-AD-000555
Adapter 2.50mm SC	10-AD-000552
Adapter 2.50mm FC Narrow	10-AD-000554
Adapter 2.50mm FC Wide	10-AD-000553
Adapter 2.50mm E2000	10-AD-000408