

FARO Laser ScanArm® V3

All in one measurement system

FARO



Complete measurement solution

Use laser and hard probes seamlessly to inspect freeform surfaces, increasing the efficiency of inspection processes.

Fully integrated scanning

No need for interface box or external wiring.

Removable Laser Line Probe

The Laser Line Probe can be removed for better tactile measurement handling.

Wireless scanning

The Laser Line Probe is fully compatible with the Bluetooth® technology used in the FaroArm Fusion.

Ergonomic handle

Provides comfortable stress-free usage.

The FARO Laser ScanArm V3 combines the FaroArm Fusion with the Laser Line Probe V3. It's the perfect device for all the users that are looking for a single, convenient solution for probing and scanning tasks of simple surfaces. The FARO Laser ScanArm V3 is a ideal entry level all in one solution which fits perfectly to many surface inspection applications.

Most Common Applications

Aerospace: Reverse engineering, certification, part inspection

Automotive: Tool building & certification, alignment, part inspection

Metal fabrication: OMI, first article inspection, periodic part inspection

Moulding/tool & die: Mould and die inspection, prototype part scanning

Benefits

- ▶ Scanhead positioned for better ergonomics and unobstructed hard probing
- ▶ Use laser and hard probes seamlessly
- ▶ Laser scan up to 19,200 points per second
- ▶ No intermediary software running in the background

Laser Line Probe Specifications

Accuracy:	±35µm (±0.0014")	Points per line:	640 points/line
Repeatability:	35µm, 2σ (0.0014")	Scan rate:	30 frames/second x 640 points/line = 19,200 points/sec.
Stand-off:	95mm (3.75")	Laser:	660nm, CDRH Class II/IEC Class 2M
Depth of field:	85mm (3.35")	Weight:	370g (0.82lbs.)
Effective scan width:	Near field 34mm (1.34") Far field 60mm (2.36")		

Performance Specifications

Non-Contact

Measurement Range	1.8m (6ft.)	2.4m (8ft.)	3.0m (10ft.)	3.7m (12ft.)
Fusion	0.081mm (0.0032in.)	0.086mm (0.0034in.)	0.124mm (0.0049in.)	0.159mm (0.0063in.)

Contact

Measurement Range	Repeatability ¹	Accuracy ²	FaroArm Weight
Fusion (7 Axes) 1.8m (6ft.)	0.046mm (0.0018in.)	±0.064mm (±0.0025in.)	9.5kg (21.0lbs.)
Fusion (7 Axes) 2.4m (8ft.)	0.051mm (0.0020in.)	±0.071mm (±0.0028in.)	9.75kg (21.5lbs.)
Fusion (7 Axes) 3.0m (10ft.)	0.089mm (0.0035in.)	±0.124mm (±0.0049in.)	9.98kg (22.0lbs.)
Fusion (7 Axes) 3.7m (12ft.)	0.124mm (0.0049in.)	±0.175mm (±0.0069in.)	10.21kg (22.5lbs.)

FaroArm test methods - (Test methods are a subset of those given in the B89.4.22 standard.)

¹ Single point articulation performance test (Max-Min)/2: The probe of the FaroArm is placed within a conical socket, Q and individual points are measured from multiple approach directions. Each individual point measurement is analysed as a range of deviations in X, Y, Z. This test is a method for determining articulating measurement machine repeatability.

² Volumetric maximum deviation: Determined by using traceable length artifacts, which are measured at various locations and orientations throughout the working volume of the FaroArm. This test is a method for determining articulating measurement machine accuracy.

Hardware Specifications

Operating temp range:	10°C - 40°C (50°F - 104°F)
Temperature rate:	3°C/5min. (5.4°F/5min.)
Operating humidity range:	95%, noncondensing
Power supply:	Universal worldwide voltage 85-245VAC 50/60Hz

Certifications: Complies with the following EC Directives: 93/68/EEC CE Marking; 2004/108/EC ELECTRICAL EQUIPMENT; 1999/5/EC R&TTE Directive; 2002/95/EC - RoHS • Conforms to the following standards: EN 61010-1:2001 / CSA-C22.2 No. 61010-1; EN 61326-1:2006; IEC 60825-1:2007; FDA (CDRH) 21 CFR 1040.10 / ANSI Z136.1-2007; IEEE 802.11 b/g; FCC Part 15 Subpart C / IC RSS-210 and ESTI EN 300/301 (WLAN and Bluetooth) Pat. 5402582, 5611147, 5794356, 6366831, 6606539, 6904691, 6925722, 6935036, 6973734, 6988322, 7017275, 7032321, 7043847, 7051450, 7069664, 7269910, 7735234, 7784194, 7804602, 7881896, RE42055, RE42082

FARO offers optional VDI/VDE 2617-9 certification for an additional charge. Please ask your sales representative for details.



Global Offices: Australia ▪ Brazil ▪ China ▪ France ▪ Germany
India ▪ Italy ▪ Japan ▪ Malaysia ▪ Mexico ▪ Netherlands
Philippines ▪ Poland ▪ Portugal ▪ Singapore ▪ Spain ▪ Switzerland
Thailand ▪ Turkey ▪ United Kingdom ▪ USA ▪ Vietnam

www.faro.com
Freecall 00 800 3276 7253
info@faroEurope.com

