

Laser Hologage LGH

Series 542

0,00001 mm resolution type

- The Mitutoyo "Laser-Hologage" is a highly precise dial gage using a holographic measuring system which operates on the principle of interference formation of laser light on a grating.
- The measuring head is very compact which means that it can be built into various systems far less expensively than conventional laser technology.
- The "Laser-Hologage" can be employed both as a measuring instrument for measuring extremely precise parts and as a transducer in ultra precise positioning and control systems.

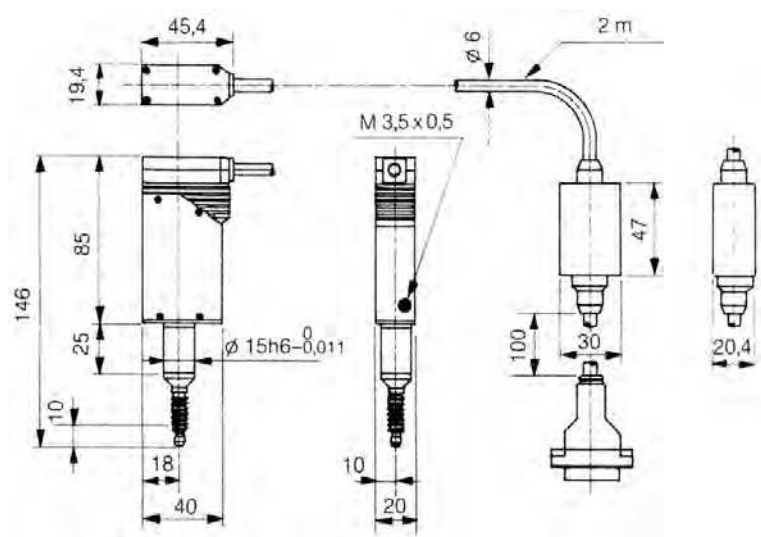


Laser Hologage supplied with Display Unit

542-925

No.	Range	Accuracy (20°C)	Measuring force *1	Stem diameter	Remarks	Resolution μm	Mass g
542-925D*	0-10 mm/ 0-0.4"	0,1 μm	0.55 N/0.45 N/ 0.35 N	15 mm	Supplied with Display Unit 542-074D	0,01	900
542-925E	0-10 mm/ 0-0.4"	0,1 μm	0.55 N/0.45 N/ 0.35 N	15 mm	Supplied with Display Unit 542-074E UK only	0,01	900
542-926D*	0-10 mm/ 0-0.4"	0,1 μm	0.1 N/-	15 mm	Supplied with Display Unit 542-074D	0,01	900
542-926E	0-10 mm/ 0-0.4"	0,1 μm	0.1 N/-	15 mm	Supplied with Display Unit 542-074E UK only	0,01	900

*1 Spindle DOWN/Horizontal/Spindle UP



Functions	Series 542
PRESET	●
Functions for Display unit	
Tolerance limit input	●
on/off	●
Calculation of sum	●
ABS/INC	●
ZERO/ABS	●
Error display	●
MAX/MIN difference measurement	●
Key lock	●
Counting direction switching	●
mm/inch	●
RS Link	●
RS-232C Output	●
Digimatic Output	●
USB MITUTOYO SENSORPAK Output	●
I/O Output	●
Tolerance judgement (3 or 5 step)	●
Error output	●
Analogue output	●

Specifications

Specifications	Hologage
Scale type	Laser-hologram measurement sensor
Max. response speed	250 mm/s
Contact point	R 5 mm carbide
Bearing type	High precision linear ball bearing
Output signal	90° phase difference, two-phase sine wave
Signal pitch	0.25 μm
Environmental conditions	10-30° C
Specifications	Display unit
Model	EH
Display range	± 999.9999 mm
Dimensions (W x H x D)	144 x 68 x 158 mm

Standard accessories

No.	Description
538610	Wrench for contact point (for 10 mm range models)

Optional accessories

No.	Description
971750	Comparator for Laser Hologage LGH
971753	Cable release
971751	Stem fixture for fixing to top surface
971752	Stem fixture for fixing to bottom surface
02ADN460	AC adapter
02ZAA020	AC cable
02ZAA030	AC cable UK only

Consumable spares

No.	Description
901312	Standard contact point



Refer to the Linear Gage brochure