

Extended Contact Ball Slide Goniometers

Stage Size 40 × 40 mm

GOHT-40A

RoHS

High precision goniometers with integrated bearing ways for superior stiffness, accuracy and durability.

- Centering accuracy 10x better than typical dovetail goniometers.
- Designed for use in a variety of orientations. Not limited to horizontal mounting.
- Integral-guide structure offers high performance of rotation center displacement $\phi 0.007\text{mm}$.
- Disc clamp improves the stability of clamping.
- Designed for use with precision alignment pins for ease of assembly.



Guide

- ▶ Attachment pins (GOHT-AP) can be purchased separately.
[Reference](#) E010 [Catalog Code](#) W7112
- ▶ Can be shipped as a preassembled $\alpha\beta$ two axis stack.
[WEB Reference](#) [Catalog Code](#) W7104
- ▶ Contact our Sales Division for information about custom center heights.
- ▶ Motorized version (OSMS-40A**) also available.
[Reference](#) G090 [Catalog Code](#) W9070



OSMS-40A**

- ▶ For the surface finishing, the white coating of electroless nickel plating is also available. [WEB Reference](#) [Catalog Code](#) W7092



Attention

- ▶ Locking mechanism is operated using thumbscrew on side of stage.

Specifications

Part Number	METRIC	GOHT-40A20B	GOHT-40A40B	GOHT-40A60B	GOHT-40A75B
	INCH	GOHT-40A20BUU	GOHT-40A40BUU	GOHT-40A60BUU	GOHT-40A75BUU
(Opposite Model)	METRIC	GOHT-40A20BR	GOHT-40A40BR	GOHT-40A60BR	GOHT-40A75BR
	INCH	GOHT-40A20BRUU	GOHT-40A40BRUU	GOHT-40A60BRUU	GOHT-40A75BRUU
Stage Size [mm]		40×40	40×40	40×40	40×40
Axes of Travel		α axis			
Rotation Center Height [mm]		20±0.1	40±0.1	60±0.1	75±0.1
Angle Range [°]		±20	±10	±8	±6
Vernier Readable Resolution		0.1°	0.1°	0.1°	0.1°
Travel per Knob Rotation [°]		about 2.31	about 1.41	about 1.08	about 0.89
Rotation Center Displacement [mm]		$\phi 0.007$ or less	$\phi 0.007$ or less	$\phi 0.007$ or less	$\phi 0.007$ or less
Guide Method		Extended contact ball bearing guide			
Primary Material		SUS440C quench hardened			
Finish		Super black chrome			
Load Capacity [N]		58.8 (6.0kgf)	58.8 (6.0kgf)	58.8 (6.0kgf)	58.8 (6.0kgf)
Max. Moment Capacity	Pitch [N·m]	2.0	2.0	2.0	2.0
	Roll [N·m]	3.0	3.0	3.0	3.0
	Yaw [N·m]	2.0	2.0	2.0	2.0
Moment Stiffness	Roll ["/N·cm]	0.6	0.6	0.6	0.6
	Yaw ["/N·cm]	0.6	0.6	0.6	0.6
Parallelism [μm]		30	30	30	30
Weight [kg]		0.2	0.2	0.2	0.2

Application Systems

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Opto-Mechanics

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XZ Axis Stages

XYZ Axis Stages

Rotation Stages

Goniometer

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Vacuum

Ball Bearing Guide

Crossed Roller

Dovetail

Lapping

V Groove Screw

Others

15 × 15 mm

25 × 25 mm

40 × 40 mm

60 × 60 mm

65 × 65 mm

80 × 80 mm

100 × 100 mm

120 × 120 mm

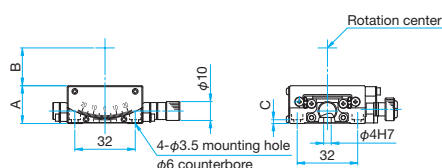
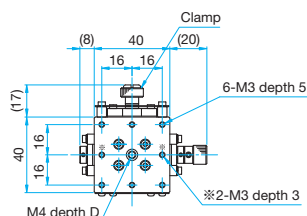
Others



Outline Drawing

GOHT-40A**B

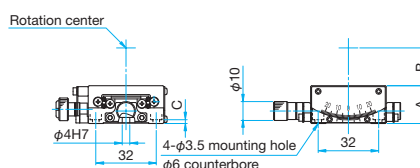
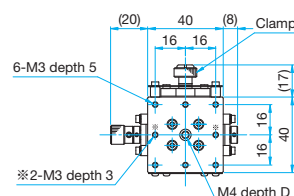
Hexagon socket head cap screw (stainless steel construction) M3×6...4 screws
Attachment pin for M4...1 pin



Part Number	A (mm)	B (mm)	C (mm)	D (mm)
GOHT-40A20B	20	20	2	4
GOHT-40A40B	20	40	1.5	4
GOHT-40A60B	15	60	1	3
GOHT-40A75B	15	75	1	3

GOHT-40A**BR

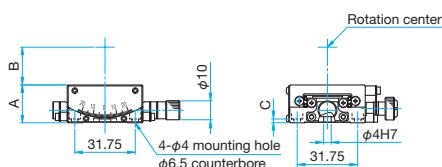
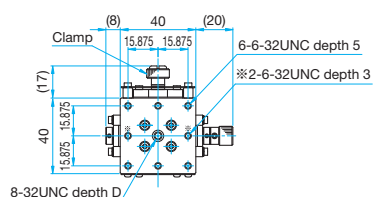
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GOHT-40A60BR	15	60	1	3
GOHT-40A75BR	15	75	1	3

GOHT-40A**BUU

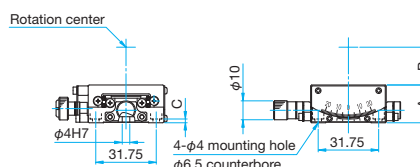
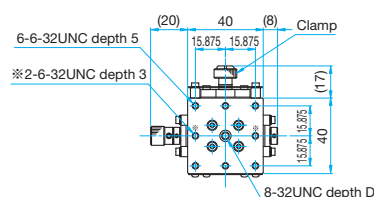
Low head hexagon socket head cap screw (stainless steel construction)
6-32UNC×1/4...4 screws, Attachment pin for 8-32UNC...1 pin



Part Number	A (mm)	B (mm)	C (mm)	D (mm)
GOHT-40A20BUU	20	20	2	4
GOHT-40A40BUU	20	40	1.5	4
GOHT-40A60BUU	15	60	1	3
GOHT-40A75BUU	15	75	1	3

GOHT-40A**BRUU

Low head hexagon socket head cap screw (stainless steel construction)
6-32UNC×1/4...4 screws, Attachment pin for 8-32UNC...1 pin



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