



VL-730

3D Scanner CMM Stage



*Please note that accessories depicted in the image are for illustrative purposes only and may not be included with the product.

Specifications

Model		VL-730	
Type		Stage	
Controller		VL-700	
Measurement unit		VL-770	
Optical transmitter system		High-brightness dual projector module	
Optical receiver system		Low/high magnification offset dual optical module with wide dynamic range	
Light sources	Measurement light source	Blue LED	
	Color texture light source	LEDs in 3 colors (red, green, blue)	
Captured data format		Full-color textured 3D mesh data	
Repeatability (σ)		2 μm^{*1}	
Measurement accuracy		$\pm 10 \mu\text{m}^{*2}$	
Measurement resolution		9 million points	
Measurement modes	Low magnification	High speed, Normal, Fine (wide field)	
	High magnification	Normal, Fine (High resolution)	
Measurement range	Low magnification	$\varnothing 300 \times \text{H } 200 \text{ mm } \varnothing 11.81" \times \text{H } 7.87"$ (wide field)	
	High magnification	$\varnothing 70 \times \text{H } 50 \text{ mm } \varnothing 2.76" \times \text{H } 1.97"$ (High resolution)	
Extended measurement	Automatic rotation combined measurements		✓
	Automatic XY combined measurements		—
	Automatic XY combined measurement range	Low magnification (2 × 2 composition)	
		Low magnification (3 × 1 composition)	
		High magnification (2 × 2 composition)	
		High magnification (3 × 1 composition)	
Stage	Stage configuration		Motorized θ stage mechanism
	Stage top panel size		$\varnothing 500 \text{ mm } \varnothing 19.69"$
	Stage rotation		360° (infinite rotation)
	Stage movement range		—
	Tilt mechanism		Up to 45°
	Load capacity		50 kg 110.23 lb
Control PC		Dedicated PC specified by KEYENCE	
Power supply	Power voltage		100 to 240 VAC $\pm 10\%$, 50/60 Hz
	Power consumption		Controller/Measurement unit: 320 VA Stage: 80 VA

Environmental resistance	Ambient temperature range	+15 to +30°C 59.0 to 86.0°F
	Ambient humidity range	20 to 80% RH (no condensation)
Weight		Controller: 3.7 kg 8.16 lb Stage: 21.7 kg 47.84 lb Light-blocking cover: 4.9 kg 10.80 lb Measurement unit: 19.6 kg 43.21 lb

*1 Value when measurement is performed using the default measurement mode specified by KEYENCE and using the default standard gauge specified by KEYENCE and at an operating ambient temperature of 23°C ±1°C [73.4°F ±1.8°F](#)

*2 In reference to ISO 10360-8; Value when measurement is performed using the default measurement mode specified by KEYENCE and using the default standard gauge specified by KEYENCE and at an operating ambient temperature of 23°C ±1°C [73.4°F ±1.8°F](#)