

Servo Electric Cylinder 6DOF Motion Platform Key Parameters

(1) Load: 50KG-20000KG

(2) Motion parameters

Key Technical Parameters	Position	Displacement	Speed	Acceleration	Positioning accuracy	Repeat positioning accuracy
	Pitch (α)	$\pm 5^{\circ} \sim \pm 35^{\circ}$	$\leq 60^{\circ}/s$	$\leq 200^{\circ}/s^2$	0.03°	0.01°
Roll (β)	$\pm 5^{\circ} \sim \pm 35^{\circ}$	$\leq 60^{\circ}/s$	$\leq 200^{\circ}/s^2$	0.03°	0.01°	
Yaw (γ)	$\pm 5^{\circ} \sim \pm 35^{\circ}$	$\leq 60^{\circ}/s$	$\leq 200^{\circ}/s^2$	0.03°	0.01°	
Vertical lift (z)	$\pm 10mm \sim \pm 500mm$	$\leq 1000mm/\leq 1.0g$		0.03mm	0.01mm	
Longitudinal displacement (y)	$\pm 10mm \sim \pm 500mm$	$\leq 1000mm/\leq 1.0g$		0.03mm	0.01mm	
Lateral displacement (x)	$\pm 10mm \sim \pm 500mm$	$\leq 1000mm/\leq 1.0g$		0.03mm	0.01mm	

Other Technical Parameters

(1) System response frequency: 0Hz-20Hz

(2) stroke hysteresis: less than or equal to 0.2mm

(3) drift: platform system for more than 12h continuous operation, any one of the electric cylinder position drift does not exceed 0.00025m

(1) sports platform control system with CanOpen bus communication and digital input and output functions of the motion controller, all-digital motor

(2) Ethernet interface, the integration of the high dynamic ball screw mechanical concept, to achieve a higher dynamic performance

Controlling systems

(3) the control room of the sports platform is done by the ergonomic graphical interface that allows the operator to save time while learning and implementing the system

(4) The control software can copy the motion generated by the motion design software

