

YK500XGS

Wall-mount / inverse type

- Arm length 500mm
- Maximum payload 10kg

Ordering method

YK500XGS				RCX240		R3				BB
Model	Installation method <small>Note 1</small>	Z axis stroke	Cable	Controller	Usable for CE	Regenerative unit	Expansion I/O <small>Note 2</small>	Network option	iVY System	Battery
	W: Wall-mount (same as per external view) U: Inverse wall-mount (upside down)	200: 200mm 300: 300mm	3L: 3.5m 5L: 5m 10L: 10m		No entry: Standard E: CE marking	R3: RGU-3	N, P: Standard I/O 16/8 N1, P1: 40/24 N2, P2: 64/40 N3, P3: 88/56 N4, P4: 112/72	No entry: None CC: CC-Link DN: DeviceNet PB: Profibus EN: Ethernet YC: YC-Link <small>Note 3</small>	No entry: None VY: iVY (Vision) TR: iVY+Light +Tracking LC: iVY+Light	BB: 4 pcs

Note 1. When installing the robot, always follow the specifications.

Do not install the ceiling-mount robot upside down or do not install the inverse type robot to a ceiling.
Incorrect installation can cause trouble or malfunction.

Note 2. Use N to N4 when NPN is selected on the I/O board, and P to P4 when PNP is selected.

Note 3. Available only for the master.

Specifications

Axis specifications	Arm length (mm)	X-axis	Y-axis	Z-axis	R-axis
		200	300	200 300	—
	Rotation angle (°)	+/-105	+/-125	—	+/-360
	AC servo motor output (W)	400	200	200	200
Deceleration mechanism	Speed reducer	Harmonic drive	Harmonic drive	Ball screw	Harmonic drive
	Transmission method	Direct-coupled			
	Motor to speed reducer	Direct-coupled			
	Speed reducer to output	Direct-coupled			
Repeatability <small>Note 1</small>	(XYZ: mm) (R: °)	+/-0.01		+/-0.01	+/-0.004
Maximum speed (XYZ: m/sec) (R: °/sec)		7.6		2.3 1.7	1700 (wall-mount) 800 (inverse wall-mount)
Maximum payload (kg)		10			
Standard cycle time: with 2kg payload <small>Note 2</small>	(sec)	0.45			
R-axis tolerable moment of inertia <small>Note 3</small>	(kgm²)	0.30			
User wiring (sq × wires)		0.2 × 20			
User tubing (Outer diameter)		φ6 × 3			
Travel limit		1.Soft limit 2.Mechanical stopper (X,Y,Z axis)			
Robot cable length (m)		Standard: 3.5 Option: 5,10			
Weight (kg)		30			

Note 1. This is the value at a constant ambient temperature. (X,Y axes)

Note 2. When reciprocating 300mm in horizontal and 25mm in vertical directions.

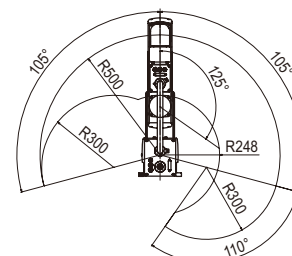
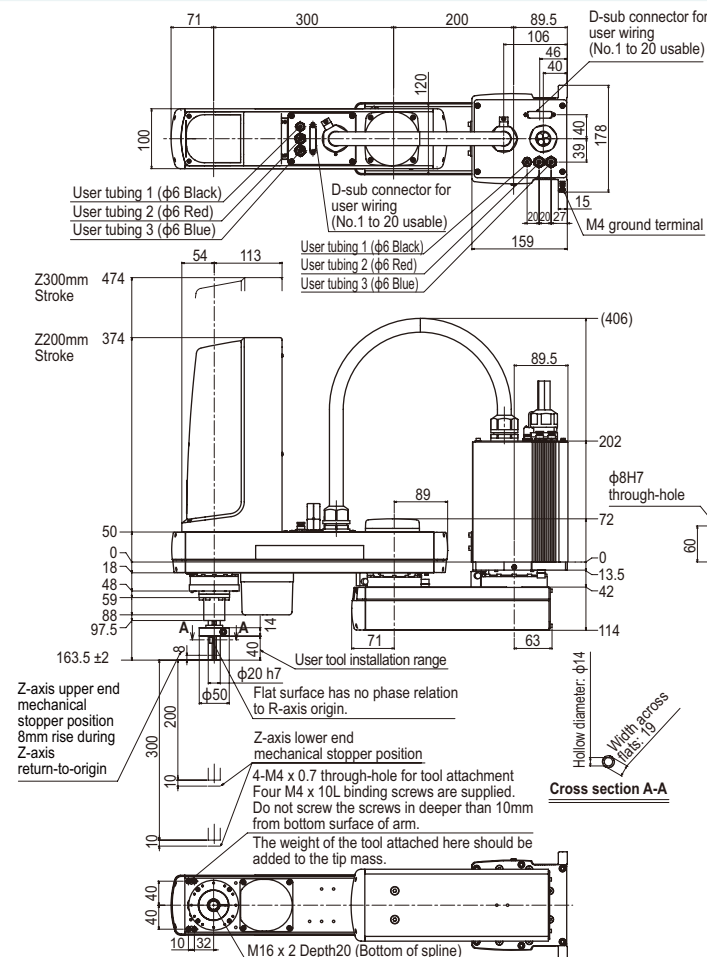
Note 3. There are limits to acceleration coefficient settings.

Note. Please consult YAMAHA when connecting other tubes and cables to the self-supporting machine harness.

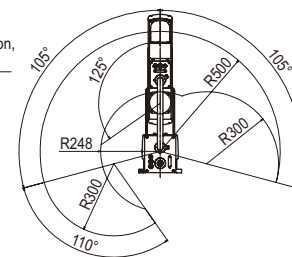
Controller

Controller	Power capacity (VA)	Operation method
RCX240-R3	1700	Programming / I/O point trace / Remote command / Operation using RS-232C communication

YK500XGS

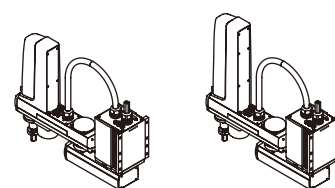


Working envelope of left-handed system



Working envelope of right-handed system

X-axis mechanical stopper position: 107°
Y-axis mechanical stopper position: 127°



YK500XGS Z200mm Stroke specification YK500XGS Z300mm Stroke specification
Note. Inverse type is installed upside down.