



# CLEAN ROBOTS

# CLEAN

# TYPE

Articulated robots	YA
Linear conveyor modules	LCM100
Compact single-axis robots	TRANSERVO
Single-axis robots	FLIP-X
Linear motor single-axis robots	PHASER
Cartesian robots	XY-X
SCARA robots	YK-X
Pick & place robots	YP-X
<b>CLEAN</b>	
CONTROLLER	
INFORMATION	
Single-axis	
Cartesian	
SCARA	

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# CLEAN ROBOTS SPECIFICATION SHEET

## Clean single-axis robots

### ●TRANSERVO

- Degree of cleanliness CLASS 10
- Intake air 15 to 80Nℓ/min

Model	Lead (mm)	Payload (kg)		Stroke (mm) and maximum speed (mm/sec)																Detailed info page		
		Horizontal	Vertical	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800			
SSC04	12	2	1	600																		P.441
	6	4	2	300																		
	2	6	4	100																		
SSC05	20	4	–	1000						933	833	733	633									P.442
	12	6	1	600						560	500	440	380									
	6	10	2	300						280	250	220	190									
SSC05H	20	6	–	1000						933	833	733	633									P.443
	12	8	–	600						560	500	440	380									
		–	2	500										440	380							
	6	12	–	300						280	250	220	190									
		–	4	250										220	190							

### ●FLIP-XC

- Degree of cleanliness C4L/C4LH/C5L/C5LH/C6L ..... ISO CLASS 3 (ISO14644-1) <sup>Note</sup>  
Models other than those shown above .... CLASS 10  
Note. Class 10 (0.1µm) equivalent to FED-STD-209D
- Intake air 20 to 90Nℓ/min

Model	AC servo motor output (W)	Repeatability (mm)	Lead (mm)	Payload (kg)		Stroke (mm) and maximum speed (mm/sec)																									
				Horizontal	Vertical	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950							
C4L / C4LH	30	+/-0.02	12	4.5	1.2	720																									
			6	6	2.4	360																									
			2	6	7.2	120																									
C5L / C5LH	30	+/-0.02	20	3	–	1000																									
			12	5	1.2	800																									
			6	9	2.4	400																									
C6L	60	+/-0.02	20	10	–	1000																									
			12	12	4	800																									
			6	30	8	400																									
C8	100	+/-0.02	20	12	–	1000						900	800	700	650																
			12	20	4	720						648	540	468	432	360															
			6	40	8	360						324	270	234	216	180															
C8L	100	+/-0.01	20	20	4	1000										900	800	700	650	600											
			10	40	8	600										510	450	390	360	330	300										
			5	50	16	300										255	225	195	180	165	150										
C8LH	100	+/-0.01	20	30	–	1000										900	800	700	650	600	550										
			10	60	–	600										510	450	390	360	330	300	270									
			5	80	–	300										255	225	195	180	165	150	135									
C10	100	+/-0.01	20	20	4	1000										950					750	600									
			10	40	10	500										475					375	300									
			5	60	20	250										237					187	150									
C14	100	+/-0.01	20	30	4	1000										950					750	600									
			10	55	10	500										475					375	300									
			5	80	20	250										237					187	150									
C14H	200	+/-0.01	20	40	8	1000										950					750	600									
			10	80	20	500										475					375	300									
			5	100	30	250										237					187	150									
C17	400	+/-0.01	20	80	15	1000																800									
			10	120	35	500																	400								
C17L	600	+/-0.02	50	50	10																										
C20	600	+/-0.01	20	120	25	1000																			800						
			10	–	45	500																			400						

																					Detailed info page				
	1000	1050	1100	1150	1200	1250	1300	1350	1400	1450	1500	1550	1600	1650	1700	1750	1800	1850	1900	1950	2000	2050			
																								C4L : <b>P.444</b> C4LH : <b>P.445</b>	
																									C5L : <b>P.446</b> C5LH : <b>P.447</b>
																									<b>P.448</b>
																									<b>P.449</b>
	550	500																							<b>P.450</b>
	270	240																							<b>P.451</b>
	135	120																							<b>P.452</b>
	500	450																							<b>P.453</b>
	240	210																							<b>P.454</b>
	120	105																							<b>P.455</b>
	600	500																							<b>P.456</b>
	300	250																							<b>P.457</b>
	150	125																							
	600	500																							
	300	250																							
	150	125																							
	600	500																							
	300	250																							
	150	125																							
	800	700	600	500																					
	400	350	300	250																					
			1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	900	800	800	800	800	800	800		
	800	700	600	500																					
	400	350	300	250																					

Clean cartesian robots

● XY-XC

- Degree of cleanliness CLASS 10
- Intake air 60 to 90Nℓ/min
- Aperture designed to minimal dimensions by use of stainless steel sheet
- Installed clean robot dedicated cable duct



**Arm variations**

Special model for clean rooms with moving Y-axis carriage installed upward.

Type	Model	Axis	Moving range	Maximum speed (mm/sec)	Maximum payload (kg)	Detailed info page
2 axes	SXYXC	X	150 to 1050mm	1000	20	P.458
		Y	150 to 650mm	1000		
3 axes	SXYXC (ZSC12)	X	150 to 1050mm	1000	3	P.460
		Y	150 to 650mm	1000		
		Z	150mm	1000		
	SXYXC (ZSC6)	X	150 to 1050mm	1000	5	P.460
		Y	150 to 650mm	1000		
		Z	150mm	500		
4 axes	SXYXC (ZRSC12)	X	150 to 1050mm	1000	3	P.462
		Y	150 to 650mm	1000		
		Z	150mm	1000		
		R	360°	1020°/sec		
	SXYXC (ZRSC6)	X	150 to 1050mm	1000	5	P.462
		Y	150 to 650mm	1000		
		Z	150mm	500		
		R	360°	1020°/sec		

Clean SCARA robots

● YK-XC/YK-XGC/YK-XGLC

- Degree of cleanliness YK-XC ..... CLASS 10  
YK-XGC/YK-XGLC... ISO CLASS 3 (ISO14644-1) <sup>Note</sup>  
Note. Class 10 (0.1μm) equivalent to FED-STD-209D

- Intake air 30 to 60Nℓ/min
- Harness placed completely on inside

- Bellows cover fitted in axial tip



Passed 20 million stroke durability test

Type	Model	Arm length (mm) and XY axis combined maximum speed (m/s)													Standard cycle time (sec)	Maximum payload (kg)	R axis tolerable moment of inertia (kgm <sup>2</sup> )	Detailed info page			
		120	150	180	220	250	300	350	400	500	600	700	800	900					1000	1200	
Extra small type	YK180XC	3.3m/s															0.42	1	0.01	P.464	
	YK220XC	3.4m/s																0.45	1	0.01	P.465
Small type	YK250XGC	4.5m/s																0.57	4	0.05	P.466
	YK350XGC	5.6m/s																0.57	4	0.05	P.468
	YK400XGC	6.1m/s															0.57	4	0.05	P.470	
	YK500XGLC	5.1m/s															0.74	4	0.05	P.472	
Medium type	YK500XC	4.9m/s															0.53	10	0.12	P.474	
	YK600XGLC	4.9m/s															0.74	4	0.05	P.475	
	YK600XC	5.6m/s														0.56	10	0.12	P.477		
Large type	YK700XC	6.7m/s															0.57	20	0.32	P.478	
	YK800XC	7.3m/s															0.57	20	0.32	P.479	
	YK1000XC	8.0m/s															0.60	20	0.32	P.480	

# SSC04

## Slider type



- CE compliance
- Origin on the non-motor side is selectable

### Ordering method

<b>SSC04</b>		<b>S</b>						
<b>Model</b>	<b>Lead</b>	<b>Type</b>	<b>Brake</b>	<b>Direction of air coupler installation</b>	<b>Origin position</b>	<b>Stroke</b>	<b>Cable length</b> <sup>Note 2</sup>	
	12: 12mm 6: 6mm 2: 2mm	S: Straight	N: With no brake B: With brake	RJ: Right (Standard) LJ: Left	N: Standard <sup>Note 1</sup> Z: Non-motor side	50 to 400 (50mm pitch)	1L: 1m 3L: 3m 5L: 5m 10L: 10m	

<b>S2</b>	<b>S2</b>	<b>I/O</b>
<b>Robot positioner</b>	S2: TS-S2 <sup>Note 3</sup>	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 4</sup>
<b>SH</b>	<b>SH</b>	<b>Battery</b>
<b>Robot positioner</b>	SH: TS-SH	B: With battery (Absolute) N: None (Incremental)
<b>SD</b>	<b>SD</b>	<b>1</b>
<b>Robot driver</b>	SD: TS-SD	I/O cable 1: 1m

Note 1. If changing from the origin position at the time of purchase, the machine reference amount must be reset. For details, refer to the manual.  
 Note 2. The robot cable is flexible and resists bending.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

### Basic specifications

<b>Motor</b>	42 □ Step motor
<b>Repeatability</b> <sup>Note 1</sup> (mm)	+/-0.02
<b>Deceleration mechanism</b>	Ball screw φ8
<b>Maximum motor torque (N·m)</b>	0.27
<b>Ball screw lead (mm)</b>	12    6    2
<b>Maximum speed (mm/sec)</b>	600    300    100
<b>Maximum payload (kg)</b>	Horizontal: 2    4    6 Vertical: 1    2    4
<b>Max. pressing force (N)</b>	45    90    150
<b>Stroke (mm)</b>	50 to 400 (50mm pitch)
<b>Overall length (mm)</b>	Horizontal: Stroke+216 Vertical: Stroke+261
<b>Maximum outside dimension of body cross-section (mm)</b>	W49 × H59
<b>Cable length (m)</b>	Standard: 1 / Option: 3, 5, 10
<b>Degree of cleanliness</b>	CLASS 10 <sup>Note 2</sup>
<b>Intake air (Nl/min)</b>	Lead 12: 50    Lead 6: 30    Lead 2: 15

Note 1. Positioning repeatability in one direction.  
 Note 2. Per 1cf (0.1µm base), when suction blower is used.

### Allowable overhang

Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)					
	A	B	C		A	B	C		A	C			
Lead 12	1kg	807	218	292	Lead 12	1kg	274	204	776	Lead 12	0.5kg	407	408
	2kg	667	107	152		2kg	133	93	611		1kg	204	204
Lead 6	2kg	687	116	169	Lead 6	2kg	149	102	656	Lead 6	1kg	223	223
	3kg	556	76	112		3kg	92	62	516		2kg	107	107
	4kg	567	56	84	Lead 4	4kg	63	43	507	Lead 4	2kg	118	118
Lead 2	4kg	869	61	92	Lead 2	4kg	72	48	829	Lead 2	4kg	53	53
	6kg	863	40	60	Lead 2	6kg	39	29	789				

Note. Distance from center of slider upper surface to conveyor center-of-gravity at a guide service life of 10,000 km (Service life is calculated for 400mm stroke models).

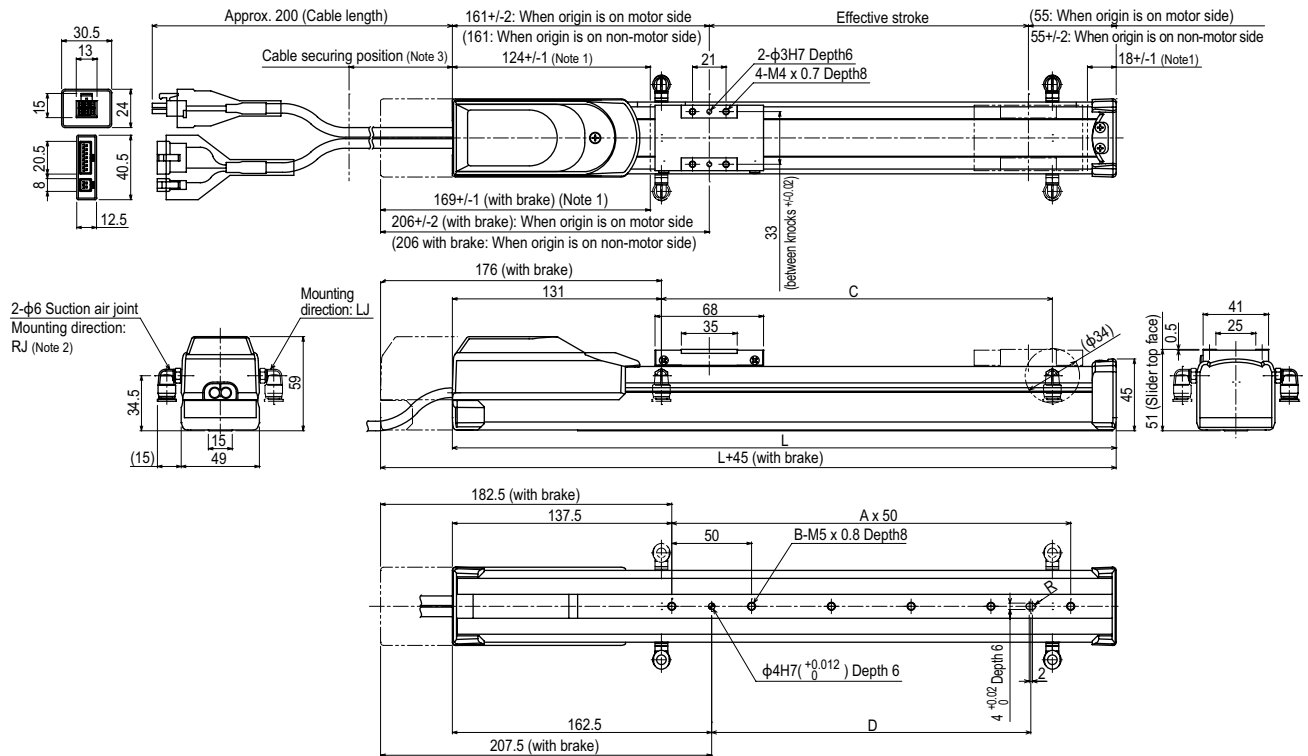
### Static loading moment

Static loading moment (Unit: N·m)		
MY	MP	MR
16	19	17

### Controller

Controller	Operation method
TS-S2	I/O point trace / Remote command
TS-SH	Remote command
TS-SD	Pulse train control

### SSC04



Effective stroke	50	100	150	200	250	300	350	400
<b>L</b>	266	316	366	416	466	516	566	616
<b>A</b>	2	3	4	5	6	7	8	9
<b>B</b>	3	4	5	6	7	8	9	10
<b>C</b>	50	100	150	200	250	300	350	400
<b>Weight (kg)</b> <sup>Note 5</sup>	1.5	1.6	1.7	1.8	2.0	2.1	2.2	2.3

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Either right or left can be selected for the suction air joint mounting direction. This drawing shows the RJ (standard) direction.  
 Note 3. Secure the cable with a tie-band 100mm or less from unit's end face to prevent the cable from being subjected to excessive loads.  
 Note 4. The cable's minimum bend radius is R30.  
 Note 5. These are the weights without a brake. The weights are 0.2kg heavier when equipped with a brake.

Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSEVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XY-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

CONTROLLER INFORMATION

Single-axis  
Cartesian  
SCARA

# SSC05

Slider type



- High lead: Lead 20
- CE compliance
- Origin on the non-motor side is selectable

## Ordering method

<b>SSC05</b>	<b>S</b>						
Model	Lead	Type	Brake <sup>Note 1</sup>	Direction of air coupler installation	Origin position	Stroke	Cable length <sup>Note 3</sup>
	20: 20mm 12: 12mm 6: 6mm	S: Straight	N: With no brake B: With brake	RJ: Right (Standard) LJ: Left	N: Standard <sup>Note 2</sup> Z: Non-motor side	50 to 800 (50mm pitch)	1L: 1m 3L: 3m 5L: 5m 10L: 10m

<b>S2</b>		
Robot positioner	I/O	
S2: TS-S2 <sup>Note 4</sup>	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 5</sup>	
<b>SH</b>		
Robot positioner	I/O	Battery
SH: TS-SH	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 5</sup>	B: With battery (Absolute) N: None (Incremental)
<b>SD</b>		
Robot driver	I/O cable	
SD: TS-SD	t: 1m	

Note 1. Only the model with a lead of 12mm or 6mm can select specifications with brake.  
 Note 2. If changing from the origin position at the time of purchase, the machine reference amount must be reset. For details, refer to the manual.  
 Note 3. The robot cable is flexible and resists bending.  
 Note 4. See P.500 for DIN rail mounting bracket.  
 Note 5. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

<b>Motor</b>	42 □ Step motor
<b>Repeatability <sup>Note 1</sup> (mm)</b>	+/-0.02
<b>Deceleration mechanism</b>	Ball screw φ12
<b>Maximum motor torque (N·m)</b>	0.27
<b>Ball screw lead (mm)</b>	20    12    6
<b>Maximum speed (mm/sec) <sup>Note 2</sup></b>	1000    600    300
<b>Maximum payload (kg)</b>	<b>Horizontal</b> 4    6    10 <b>Vertical</b> —    1    2
<b>Max. pressing force (N)</b>	27    45    90
<b>Stroke (mm)</b>	50 to 800 (50mm pitch)
<b>Overall length (mm)</b>	<b>Horizontal</b> Stroke+230 <b>Vertical</b> Stroke+270
<b>Maximum outside dimension of body cross-section (mm)</b>	W55 × H56
<b>Cable length (m)</b>	Standard: 1 / Option: 3, 5, 10
<b>Degree of cleanliness</b>	CLASS 10 <sup>Note 3</sup>
<b>Intake air (Nl/min)</b>	<b>Lead 20</b> <b>Lead 12</b> <b>Lead 6</b> 80    50    30

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1µm base), when suction blower is used.

## Allowable overhang <sup>Note</sup>

Horizontal installation (Unit: mm)	A			B			C																					
	Lead 20	Lead 12	Lead 6	Lead 20	Lead 12	Lead 6	Lead 20	Lead 12	Lead 6																			
Wall installation (Unit: mm)	2kg	192	123	372	4kg	92	51	265	6kg	63	31	263	4kg	134	63	496	6kg	76	35	377	8kg	47	22	355				
	2kg	413	139	218	4kg	334	67	120	4kg	347	72	139	6kg	335	47	95	4kg	503	78	165	8kg	332	37	79	10kg	344	29	62
	2kg	578	579	1kg	286	286	1kg	312	312	2kg	148	148																
	0.5kg	578	579	1kg	286	286	1kg	312	312	2kg	148	148																

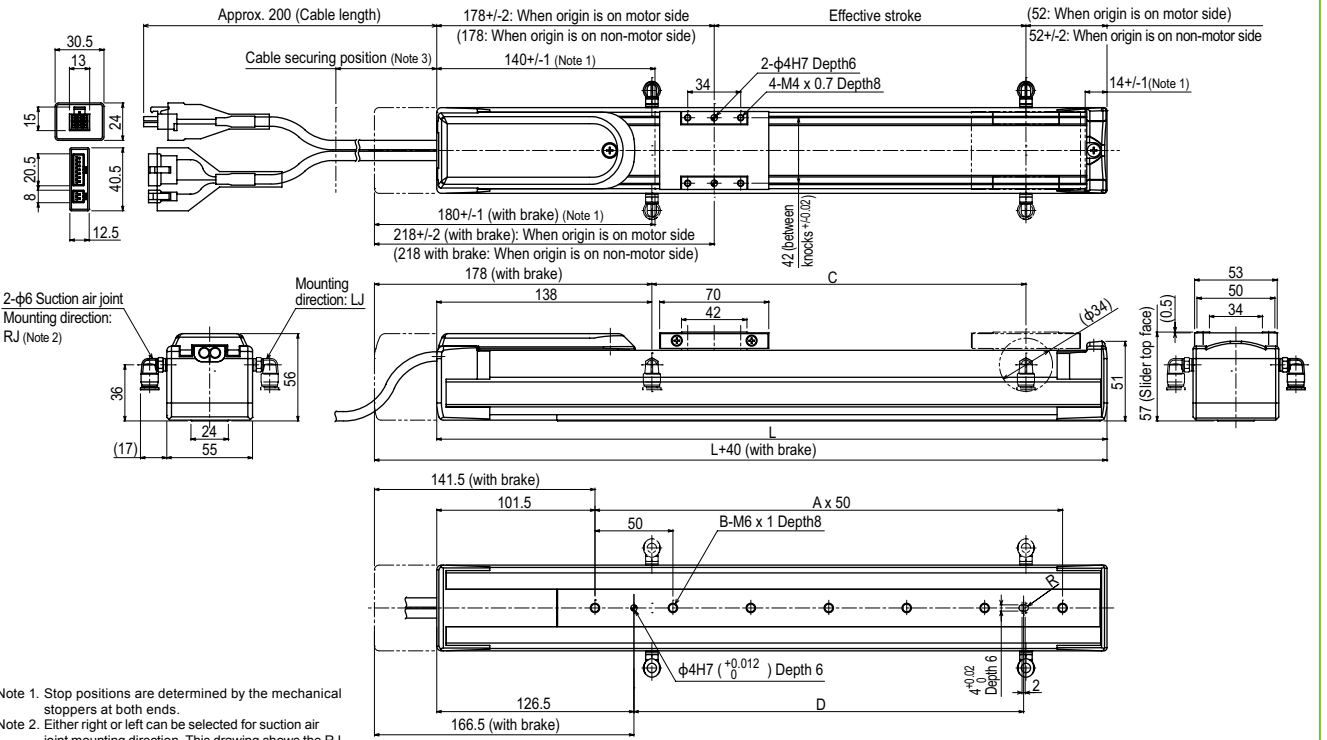
## Static loading moment

Static loading moment (Unit: N·m)		
MY	MP	MR
25	33	30

## Controller

Controller	Operation method
TS-S2	I/O point trace / Remote command
TS-SH	Remote command
TS-SD	Pulse train control

## SSC05



Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Either right or left can be selected for suction air joint mounting direction. This drawing shows the RJ (standard) direction.  
 Note 3. Secure the cable with a tie-band 100mm or less from unit's end face to prevent the cable from being subjected to excessive loads.  
 Note 4. The cable's minimum bend radius is R30.  
 Note 5. These are the weights without a brake. The weights are 0.2kg heavier when equipped with a brake.  
 Note 6. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Effective stroke	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800
	L	280	330	380	430	480	530	580	630	680	730	780	830	880	930	980
A	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
B	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19
C	100	150	200	250	300	350	400	450	500	500	500	500	500	500	500	500
Weight (kg) <sup>Note 5</sup>	2.1	2.3	2.5	2.7	2.8	3.0	3.2	3.4	3.6	3.8	4.0	4.2	4.4	4.6	4.8	5.0
Maximum speed for each stroke (mm/sec) <sup>Note 6</sup>	1000															
	Lead 20															
	Lead 12															
(mm/sec)	600															
	Lead 6															
(mm/sec)	300															
	280															
250																
220																
190																

# SSC05H

Slider type



- High lead: Lead 20
- CE compliance
- Origin on the non-motor side is selectable

## Ordering method

**SSC05H** - **S** - [ ] - [ ] - [ ] - [ ] - [ ] - [ ] - **S2** - [ ] - **SH** - [ ] - **SD** - **1**

Model	Lead	Type	Brake	Direction of air coupler installation	Origin position	Stroke	Cable length	Robot positioner	I/O	Battery
SSC05H	20: 20mm 12: 12mm 6: 6mm	S: Straight	N: With no brake B: With brake	R: Right (Standard) L: Left	N: Standard Z: Non-motor side	50 to 800 (50mm pitch)	1L: 1m 3L: 3m 5L: 5m 10L: 10m	S2: TS-S2	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board	B: With battery (Absolute) N: None (Incremental)
								SH: TS-SH	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board	
								SD: TS-SD		I/O cable 1: 1m

Note 1. Only the model with a lead of 12mm or 6mm can select specifications with brake.  
 Note 2. If changing from the origin position at the time of purchase, the machine reference amount must be reset. For details, refer to the manual.  
 Note 3. The robot cable is flexible and resists bending.  
 Note 4. See P.500 for DIN rail mounting bracket.  
 Note 5. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

Motor	42 □ Step motor		
Repeatability	±0.02 (mm)		
Deceleration mechanism	Ball screw φ12		
Maximum motor torque (N·m)	0.47		
Ball screw lead (mm)	20	12	6
Maximum speed (mm/sec)	Horizontal	1000	600
	Vertical	500	250
Maximum payload (kg)	Horizontal	6	8
	Vertical	2	4
Max. pressing force (N)	36	60	120
Stroke (mm)	50 to 800 (50mm pitch)		
Overall length (mm)	Horizontal	Stroke+286	
	Vertical	Stroke+306	
Maximum outside dimension of body cross-section (mm)	W55 × H56		
Cable length (m)	Standard: 1 / Option: 3, 5, 10		
Degree of cleanliness	CLASS 10		
Intake air (Nl/min)	Lead 20	Lead 12	Lead 6
	80	50	30

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1µm base), when suction blower is used.

## Allowable overhang

Horizontal installation	Unit: mm		
	A	B	C
Lead 20	2kg 599	225	291
4kg	366	109	148
6kg	352	71	104
Lead 12	4kg 500	118	179
6kg	399	79	118
8kg	403	56	88
Lead 6	6kg 573	83	136
8kg	480	61	100
10kg	442	47	78
12kg	465	39	64

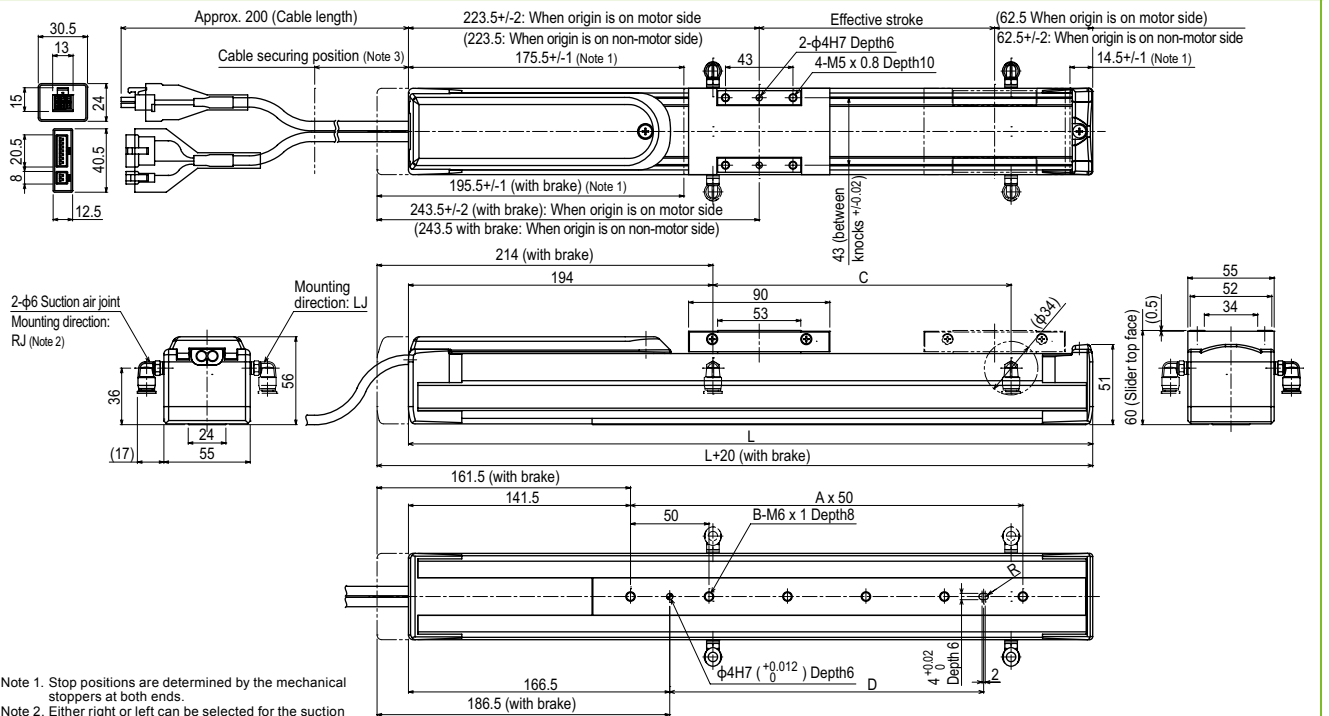
Wall installation	Unit: mm		
	A	B	C
Lead 20	2kg 262	203	554
4kg	118	88	309
6kg	71	49	262
Lead 12	4kg 146	96	449
6kg	85	55	334
8kg	55	34	305
Lead 6	6kg 101	62	519
8kg	64	39	413
10kg	43	26	355
12kg	28	17	338

Vertical installation	Unit: mm		
	A	C	
Lead 12	1kg 458	459	
2kg	224	224	
Lead 6	2kg 244	245	
4kg	113	113	

Static loading moment		
MY	MP	MR
32	38	34

Note. Distance from center of slider upper surface to conveyor center-of-gravity at a guide service life of 10,000 km (Service life is calculated for 600mm stroke models).

## SSC05H



Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Either right or left can be selected for the suction air joint mounting direction. This drawing shows the RJ (standard) direction.  
 Note 3. Secure the cable with a tie-band 100mm or less from unit's end face to prevent the cable from being subjected to excessive loads.  
 Note 4. The cable's minimum bend radius is R30.  
 Note 5. These are the weights without a brake. The weights are 0.2kg heavier when equipped with a brake.  
 Note 6. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Effective stroke	L											A											B											C																																														
	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	100	150	200	250	300	350	400	450	500	500	500	500	500	500	500	500	500	2.4	2.6	2.8	3.0	3.2	3.4	3.6	3.8	4.0	4.2	4.4	4.5	4.7	4.9	5.1
Maximum speed for each stroke (mm/sec)	Lead 20											Lead 12 (Horizontal)											Lead 12 (Vertical)											Lead 6 (Horizontal)											Lead 6 (Vertical)																																			
	1000											600											500											300											250																																			
	933											560											440											280											250																																			
	833											440											380											220											190																																			



# C4L

Origin on the non-motor side is selectable



## Ordering method

<b>C4L</b>							<b>ERCD</b>	
<b>Model</b>	<b>Lead designation</b>	<b>Brake</b>	<b>Direction of air coupler installation</b>	<b>Origin position change</b>	<b>Stroke</b>	<b>Cable length</b> <sup>Note 1</sup>	<b>Controller</b>	<b>I/O connector specification</b>
	12: 12mm 6: 6mm 2: 2mm	No entry: With no brake BK: With brake	L: Left (Standard) R: Right	None: Standard Z: Non-motor side	50 to 400 (50mm pitch)	1K: 1m 3K: 3.5m 5K: 5m 10K: 10m		CN1: I/O flat cable 1m (Standard) CN2: Twisted-pair cable 2m (pulse train function)

Note 1. The robot cable is flexible and resists bending. See P.596 for details on robot cable.

## Basic specifications

<b>AC servo motor output (W)</b>	30
<b>Repeatability</b> <sup>Note 1</sup> (mm)	+/-0.02
<b>Deceleration mechanism</b>	Ball screw $\phi 8$
<b>Ball screw lead (mm)</b>	12    6    2
<b>Maximum speed (mm/sec)</b>	720    360    120
<b>Maximum payload (kg)</b>	<b>Horizontal</b> 4.5    6    6 <b>Vertical</b> 1.2    2.4    7.2
<b>Rated thrust (N)</b>	32    64    153
<b>Stroke (mm)</b>	50 to 400 (50mm pitch)
<b>Overall length (mm)</b>	<b>Horizontal</b> Stroke+205 <b>Vertical</b> Stroke+240
<b>Maximum outside dimension of body cross-section (mm)</b>	W45×H55
<b>Cable length (m)</b>	Standard: 3.5 / Option: 1.5, 10
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO14644-1) <sup>Note 2</sup>
<b>Intake air (N<math>\ell</math>/min)</b> <sup>Note 3</sup>	50    30    15

Note 1. Positioning repeatability in one direction.  
 Note 2. CLASS 10 (0.1 $\mu$ m) FED-STD-209D or equivalent when a suction blower is used.  
 Note 3. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)			
	A	B	C		A	B	C	Lead 12	A	C	
Lead 12	2kg	429	87	179	2kg	145	52	368	1.2kg	121	122
	4.5kg	219	32	74	4.5kg	46	0	139	2.4kg	52	54
Lead 6	3kg	511	58	135	3kg	103	22	370	3kg	37	39
	6kg	336	26	62	6kg	27	0	185	7.2kg	0	0
Lead 2	3kg	1571	58	142	3kg	109	23	1150			
	6kg	751	27	66	6kg	27	0	420			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.  
 Note. Service life is calculated for 300mm stroke models.

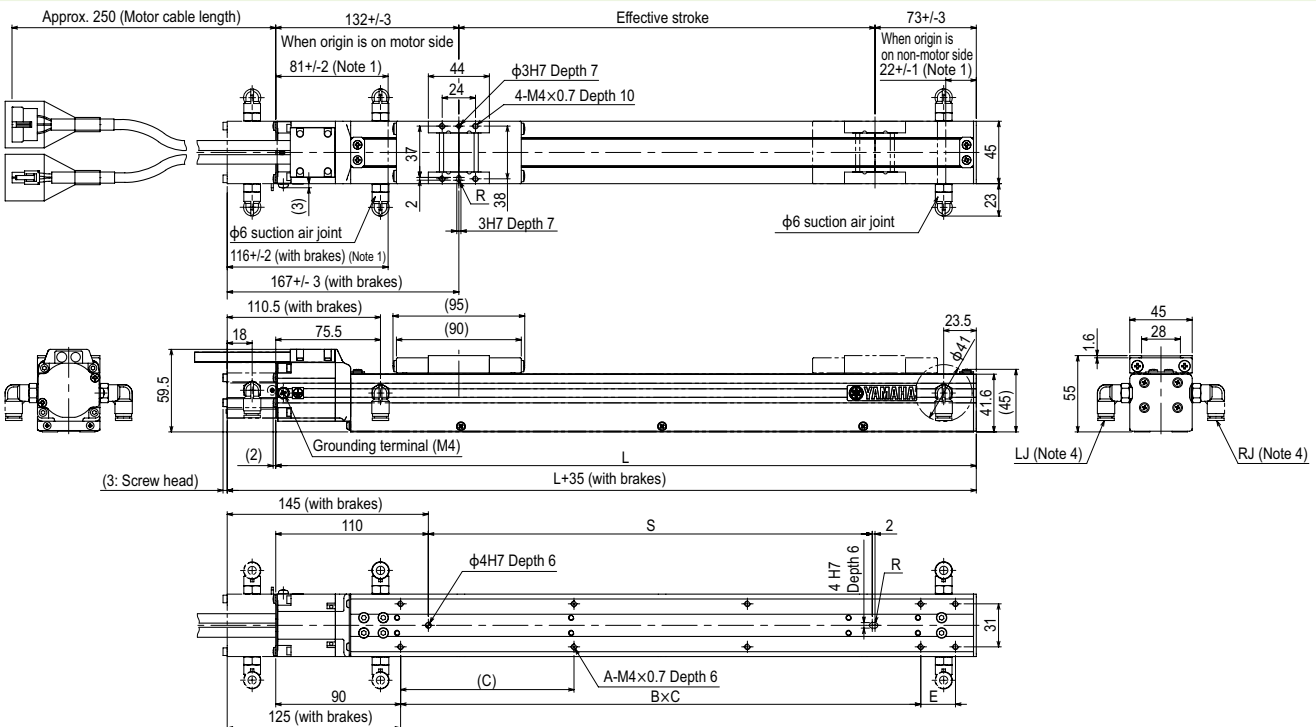
## Static loading moment

(Unit: N·m)		
MY	MP	MR
15	19	18

## Controller

Controller	Operation method
ERCD	Pulse train control / Programming / I/O point trace / Remote command / Operation using RS-232C communication

## C4L



Effective stroke	50	100	150	200	250	300	350	400
L	255	305	355	405	455	505	555	605
A	4	6	6	8	8	10	10	10
B	1	2	2	2	2	3	3	4
C	150	100	125	125	125	125	125	125
E	0	0	0	50	100	25	75	0
S	70	120	170	220	270	320	370	420
<b>Weight (kg)</b> <sup>Note 3</sup>	1.4	1.5	1.7	1.8	2	2.1	2.3	2.4
<b>Maximum speed for each stroke (mm/sec)</b>	Lead 12	720						
	Lead 6	360						
	Lead 2	120						

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R30.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.2 kg heavier than the models with no brake shown in the table.  
 Note 4. Either right or left can be selected for the installation direction for the  $\phi 6$  intake air joint. (The left side is the standard.)  
 Note 5. External view of C4LH is identical to C4L.



# C4LH

Origin on the non-motor side is selectable



## Ordering method

<b>C4LH</b>	<b>Model</b>	<b>Lead designation</b> 12: 12mm 6: 6mm 2: 2mm	<b>Brake</b> No entry: With no brake BK: With brake	<b>Direction of air coupler installation</b> L: Left (Standard) R: Right	<b>Origin position change</b> None: Standard Z: Non-motor side	<b>Stroke</b> 50 to 400 (50mm pitch)	<b>Cable length</b> Note 1 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b> <b>Positioner</b> Note 2 TS-X	<b>Driver: Power supply voltage / Power capacity</b> 10S: 100V/100W or less 20S: 200V/100W or less	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board Note 3	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)
	<b>SR1-X</b> <b>Controller</b>	<b>05</b> <b>Driver: Power capacity</b> 05: 100W or less	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)			<b>RDV-X</b> <b>Driver</b>	<b>2</b> <b>Power-supply voltage</b> 2: AC200V	<b>05</b> <b>Driver: Power capacity</b> 05: 100W or less		

Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
Note 2. See P.500 for DIN rail mounting bracket.  
Note 3. Select this selection when using the gateway function. For details, see P.62.

Basic specifications	
AC servo motor output (W)	30
Repeatability Note 1 (mm)	+/-0.02
Deceleration mechanism	Ball screw φ8
Ball screw lead (mm)	12 6 2
Maximum speed (mm/sec)	720 360 120
Maximum payload (kg)	Horizontal 4.5 6 6 Vertical 1.2 2.4 7.2
Rated thrust (N)	32 64 153
Stroke (mm)	50 to 400 (50mm pitch)
Overall length (mm)	Horizontal Stroke+205 Vertical Stroke+240
Maximum outside dimension of body cross-section (mm)	W45×H55
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	ISO CLASS 3 (ISO14644-1) Note 2
Intake air (Nl/min) Note 3	50 30 15

Note 1. Positioning repeatability in one direction.  
Note 2. CLASS 10 (0.1µm) FED-STD-209D or equivalent when a suction blower is used.  
Note 3. The necessary intake amount varies depending on the use conditions and environment.

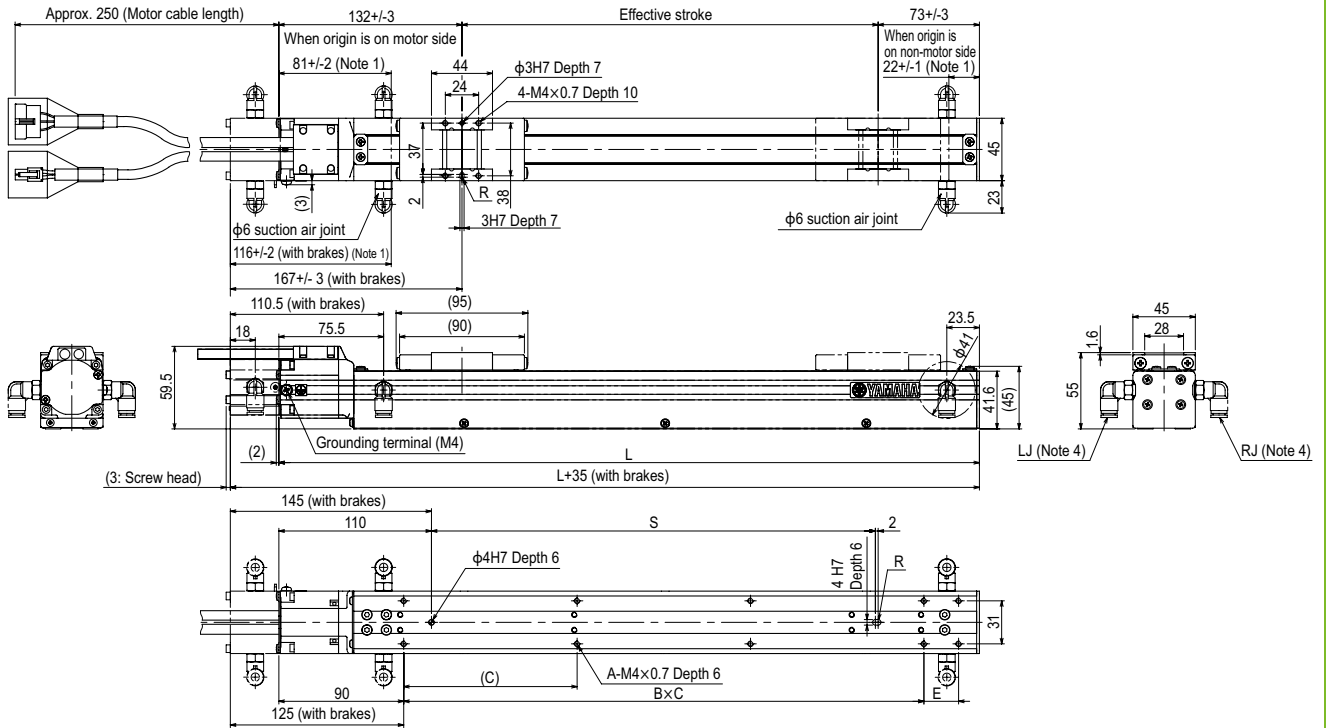
Allowable overhang Note	
Horizontal installation (Unit: mm)	Wall installation (Unit: mm)
Vertical installation (Unit: mm)	Vertical installation (Unit: mm)

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.  
Note. Service life is calculated for 300mm stroke models.

Static loading moment		
MY	MP	MR
15	19	18

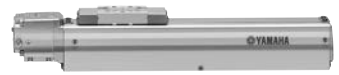
Controller	
Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	I/O point trace / Remote command
RDV-X205	Pulse train control

## C4LH



Effective stroke	50	100	150	200	250	300	350	400
L	255	305	355	405	455	505	555	605
A	4	6	6	8	8	10	10	10
B	1	2	2	2	2	3	3	4
C	150	100	125	125	125	125	125	125
E	0	0	0	50	100	25	75	0
S	70	120	170	220	270	320	370	420
Weight (kg) Note 3	1.4	1.5	1.7	1.8	2	2.1	2.3	2.4
Maximum speed for each stroke (mm/sec)	Lead 12	720						
	Lead 6	360						
	Lead 2	120						

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
Note 2. Minimum bend radius of motor cable is R30.  
Note 3. Weight of models with no brake. The weight of brake-attached models is 0.2 kg heavier than the models with no brake shown in the table.  
Note 4. Either right or left can be selected for the installation direction for the φ6 intake air joint. (The left side is the standard.)  
Note 5. External view of C4LH is identical to C4L.



# C5L

- High lead: Lead 20
- Origin on the non-motor side is selectable

## Ordering method

<b>C5L</b>								<b>ERCD</b>	
<b>Model</b>	<b>Lead designation</b> 20: 20mm 12: 12mm 6: 6mm	<b>Brake</b> <sup>Note 1</sup> No entry: With no brake BK: With brake	<b>Direction of air coupler installation</b> L: Left (Standard) R: Right	<b>Origin position change</b> None: Standard Z: Non-motor side	<b>Stroke</b> 50 to 800 (50mm pitch)	<b>Cable length</b> <sup>Note 2</sup> 1K: 1m 3K: 3.5m 5K: 5m 10K: 10m	<b>Controller</b>	<b>I/O connector specification</b> CN1: I/O flat cable 1m (Standard) CN2: Twisted-pair cable 2m (pulse train function)	

Note 1. The model with a lead of 20mm cannot select specifications with brake (vertical specifications).  
 Note 2. The robot cable is flexible and resists bending. See P.596 for details on robot cable.

## Basic specifications

<b>AC servo motor output (W)</b>	30		
<b>Repeatability</b> <sup>Note 1</sup> (mm)	±0.02		
<b>Deceleration mechanism</b>	Ball screw φ12		
<b>Ball screw lead (mm)</b>	20	12	6
<b>Maximum speed (mm/sec)</b>	1000	800	400
<b>Maximum payload (kg)</b>	<b>Horizontal</b>	<b>Vertical</b>	
	3	5	9
	-	1.2	2.4
<b>Rated thrust (N)</b>	19	32	64
<b>Stroke (mm)</b>	50 to 800 (50mm pitch)		
<b>Overall length (mm)</b>	<b>Horizontal</b>	Stroke+201.5	
	<b>Vertical</b>	Stroke+236.5	
<b>Maximum outside dimension of body cross-section (mm)</b>	W55×H65		
<b>Cable length (m)</b>	Standard: 3.5 / Option: 1.5, 10		
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO14644-1) <sup>Note 2</sup>		
<b>Intake air (Nl/min)</b> <sup>Note 3</sup>	80	50	30

Note 1. Positioning repeatability in one direction.  
 Note 2. CLASS 10 (0.1µm) FED-STD-209D or equivalent when a suction blower is used.  
 Note 3. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)	
	A	B	C	A	B	C	A	C
<b>Lead 20</b>	1584	324	745	679	303	1505		
<b>Lead 12</b>	699	104	251	215	87	605		
<b>Lead 6</b>	1166	159	406	364	126	1073		
<b>Lead 20</b>	551	59	155	123	28	438	1.2kg	246
<b>Lead 12</b>	1194	104	294	3kg	259	72	2.4kg	110
<b>Lead 6</b>	624	31	89	9kg	50	0		

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.  
 Note. Service life is calculated for 600mm stroke models.

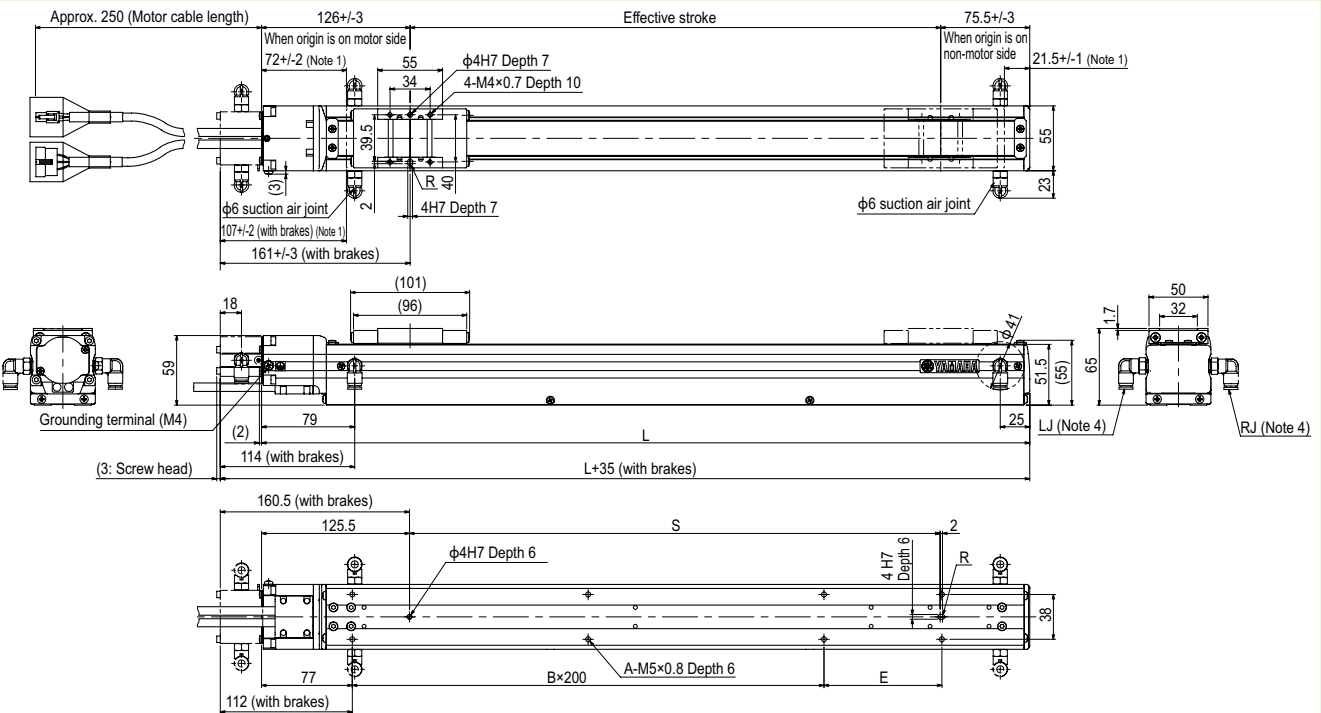
## Static loading moment

(Unit: N·m)		
MY	MP	MR
30	34	40

## Controller

Controller	Operation method
ERCD	Pulse train control / Programming / I/O point trace / Remote command / Operation using RS-232C communication

## C5L

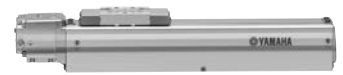


Effective stroke	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800
<b>L</b>	251.5	301.5	351.5	401.5	451.5	501.5	551.5	601.5	651.5	701.5	751.5	801.5	851.5	901.5	951.5	1001.5
<b>A</b>	4	4	4	6	6	6	6	8	8	8	8	10	10	10	10	12
<b>B</b>	0	0	0	1	1	1	1	2	2	2	2	3	3	3	3	4
<b>E</b>	100	200	200	100	100	200	200	100	100	200	200	100	100	200	200	100
<b>S</b>	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800
<b>Weight (kg)</b> <sup>Note 3</sup>	1.7	2.0	2.2	2.5	2.7	3.0	3.2	3.4	3.7	3.9	4.2	4.4	4.7	4.9	5.1	5.4
<b>Maximum speed for each stroke (mm/sec)</b> <sup>Note 5</sup>	1000															
<b>Lead 20</b>	90%															
<b>Lead 12</b>	80%															
<b>Lead 6</b>	70%															
<b>Speed setting</b>	-															
	800															
	400															
	-															
	640															
	560															
	480															
	440															
	320															
	280															
	240															
	220															
	80%															
	70%															
	60%															
	55%															

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R30.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.2 kg heavier than the models with no brake shown in the table.  
 Note 4. Either right or left can be selected for the installation direction for the φ6 intake air joint. (The left side is the standard.)  
 Note 5. When the stroke is longer than 600mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.  
 Note 6. External view of C5LH is identical to C5L.

# C5LH

- High lead: Lead 20
- Origin on the non-motor side is selectable



## Ordering method

<b>C5LH</b>	<b>Model</b>	<b>Lead designation</b> 20: 20mm 12: 12mm 6: 6mm	<b>Brake</b> Note 1 No entry: With no brake BK: With brake	<b>Direction of air coupler installation</b> L: Left (Standard) R: Right	<b>Origin position change</b> None: Standard Z: Non-motor side	<b>Stroke</b> 50 to 800 (50mm pitch)	<b>Cable length</b> Note 2 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b>	<b>Positioner</b> Note 3 TS-X	<b>Driver: Power supply voltage / Power capacity</b> 105: 100V/100W or less 205: 200V/100W or less	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board Note 4	<b>Battery</b> No entry: None N: None (Incremental) B: With battery (Absolute)
	<b>SR1-X</b>	<b>05</b>						<b>Controller</b>	<b>Driver: Power capacity</b> 05: 100W or less	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> No entry: None (Incremental) B: With battery (Absolute)	
	<b>RDV-X</b>	<b>2</b>						<b>Driver</b>	<b>Power supply voltage</b> 2: AC200V		<b>05</b>	<b>Driver: Power capacity</b> 05: 100W or less	

Note 1. The model with a lead of 20mm cannot select specifications with brake (vertical specifications).  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	30
Repeatability Note 1 (mm)	+/-0.02
Deceleration mechanism	Ball screw $\phi$ 12
Ball screw lead (mm)	20 12 6
Maximum speed (mm/sec)	1000 800 400
Maximum payload (kg)	Horizontal: 3 5 9 Vertical: - 1.2 2.4
Rated thrust (N)	19 32 64
Stroke (mm)	50 to 800 (50mm pitch)
Overall length (mm)	Horizontal: Stroke+201.5 Vertical: Stroke+236.5
Maximum outside dimension of body cross-section (mm)	W55×H65
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	ISO CLASS 3 (ISO14644-1) Note 2
Intake air (Nl/min) Note 3	80 50 30

Note 1. Positioning repeatability in one direction.  
 Note 2. CLASS 10 (0.1 $\mu$ m) FED-STD-209D or equivalent when a suction blower is used.  
 Note 3. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)		
	A	B	C	A	B	C	A	C	
Lead 20	1099	324	645	602	303	950	1.2kg	240	239
Lead 12	488	104	241	197	87	432	2.4kg	109	110
Lead 6	916	159	398	347	141	800			
Lead 20	436	60	152	119	44	355			
Lead 12	1194	105	294	259	87	950			
Lead 6	624	31	89	50	15	385			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.  
 Note. Service life is calculated for 600mm stroke models.

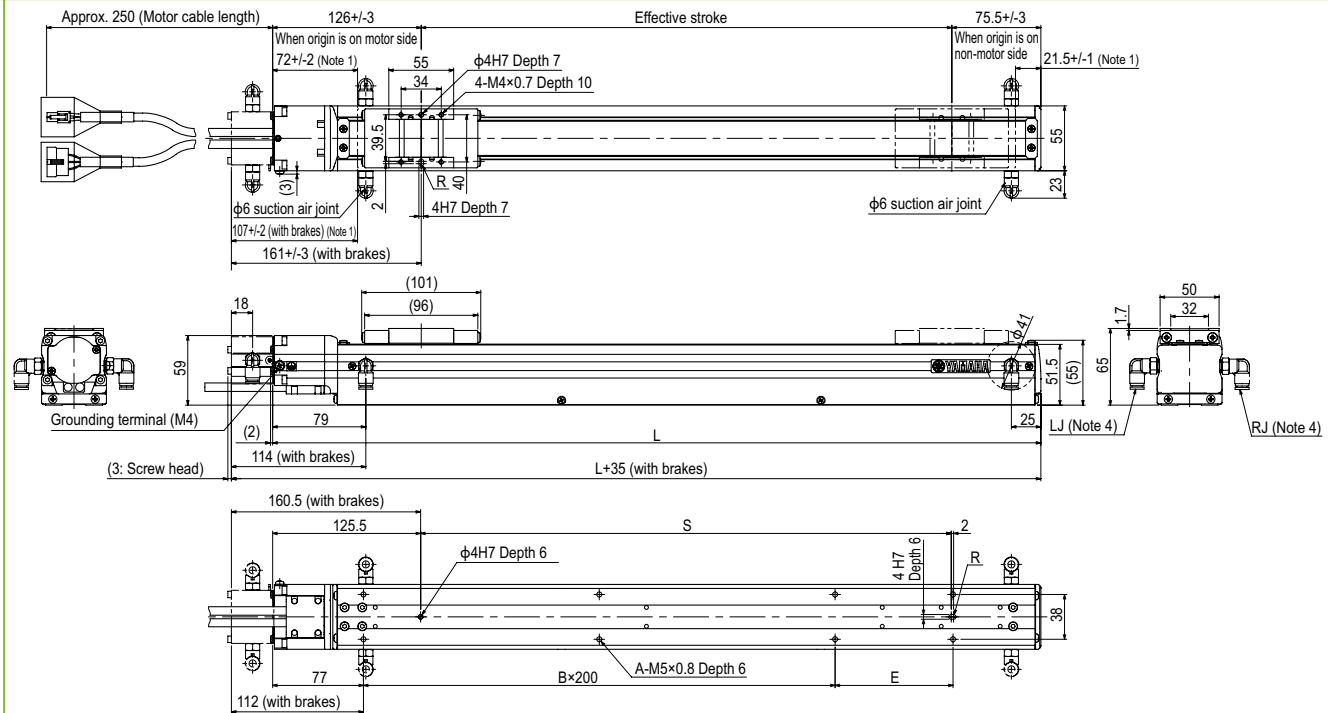
## Static loading moment

	MY	MP	MR
(Unit: N·m)	30	34	40

## Controller

Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	
RDV-X205	Pulse train control

## C5LH

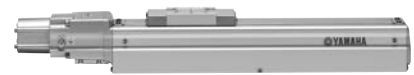


Effective stroke	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	
L	251.5	301.5	351.5	401.5	451.5	501.5	551.5	601.5	651.5	701.5	751.5	801.5	851.5	901.5	951.5	1001.5	
A	4	4	4	6	6	6	6	8	8	8	8	10	10	10	10	12	
B	0	0	0	1	1	1	1	2	2	2	2	3	3	3	3	4	
E	100	200	200	100	100	200	200	100	100	200	200	100	100	200	200	100	
S	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800	
Weight (kg) Note 3	1.7	2.0	2.2	2.5	2.7	3.0	3.2	3.4	3.7	3.9	4.2	4.4	4.7	4.9	5.1	5.4	
Maximum speed for each stroke (mm/sec)	1000												900	800	700		
Speed setting													90%	80%	70%		
Lead 20																	
Lead 12													800				
Lead 6													400				
Speed setting														640	560	480	440
														320	280	240	220
														80%	70%	60%	55%

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R30.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.2 kg heavier than the models with no brake shown in the table.  
 Note 4. Either right or left can be selected for the installation direction for the  $\phi$ 6 intake air joint. (The left side is the standard.)  
 Note 5. When the stroke is longer than 600mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.  
 Note 6. External view of C5LH is identical to C5L.

# C6L

- High lead: Lead 20
- Origin on the non-motor side is selectable



## Ordering method

**C6L**

<b>Model</b>	<b>Lead designation</b> 20: 20mm 12: 12mm 6: 6mm	<b>Brake</b> Note 1 No entry: With no brake BK: With brake	<b>Direction of air coupler installation</b> L: Left (Standard) R: Right	<b>Origin position change</b> None: Standard Z: Non-motor side	<b>Stroke</b> 50 to 800 (50mm pitch)	<b>Cable length</b> Note 2 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)
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**TSX**

<b>Positioner</b> Note 3 TS-X	<b>Driver: Power supply voltage / Power capacity</b> 105: 100V/100W or less 205: 200V/100W or less	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board Note 4	<b>Battery</b> 3: With battery (Absolute) N: None (Incremental)
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**SR1-X**

<b>Controller</b> 05	<b>Driver: Power capacity</b> 05: 100W or less	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> 3: With battery (Absolute) N: None (Incremental)
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**RDV-X**

<b>Driver</b> 2	<b>Power supply voltage</b> 2: AC200V	<b>Driver: Power capacity</b> 05: 100W or less	<b>Regenerative unit</b> RBR1
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- Note 1. The model with a lead of 20mm cannot select specifications with brake (vertical specifications).  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

<b>AC servo motor output (W)</b>	60
<b>Repeatability</b> Note 1 (mm)	+/-0.02
<b>Deceleration mechanism</b>	Ball screw $\phi$ 12
<b>Ball screw lead (mm)</b>	20 12 6
<b>Maximum speed (mm/sec)</b>	1000 800 400
<b>Maximum payload (kg)</b>	<b>Horizontal</b> 10 12 30 <b>Vertical</b> - 4 8
<b>Rated thrust (N)</b>	51 85 170
<b>Stroke (mm)</b>	50 to 800 (50mm pitch)
<b>Overall length (mm)</b>	<b>Horizontal</b> Stroke+247.5 <b>Vertical</b> Stroke+282.5
<b>Maximum outside dimension of body cross-section (mm)</b>	W65×H65
<b>Cable length (m)</b>	Standard: 3.5 / Option: 5, 10
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO14644-1) Note 2
<b>Intake air (Nl/min)</b> Note 3	80 50 30

- Note 1. Positioning repeatability in one direction.  
 Note 2. CLASS 10 (0.1 $\mu$ m) FED-STD-209D or equivalent when a suction blower is used.  
 Note 3. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

Lead	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)		
	A	B	C	A	B	C	A	C	
Lead 20	2kg 433	192	295	2kg 300	174	365	1kg 353	351	
6kg	145	59	104	6kg 83	44	105	2kg 163	164	
10kg	110	33	75	10kg 43	18	71	4kg 68	70	
Lead 12	3kg 622	125	336	3kg 291	96	317	2kg 169	170	
8kg	271	41	121	8kg 87	13	110	4kg 71	73	
12kg	214	24	76	12kg 41	0	126	8kg 21	24	
Lead 6	5kg 692	73	236	5kg 202	45	237			
10kg	372	33	109	10kg 70	5	97			
30kg	157	0	25	30kg 0	0	0			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

Note. Service life is calculated for 600mm stroke models.

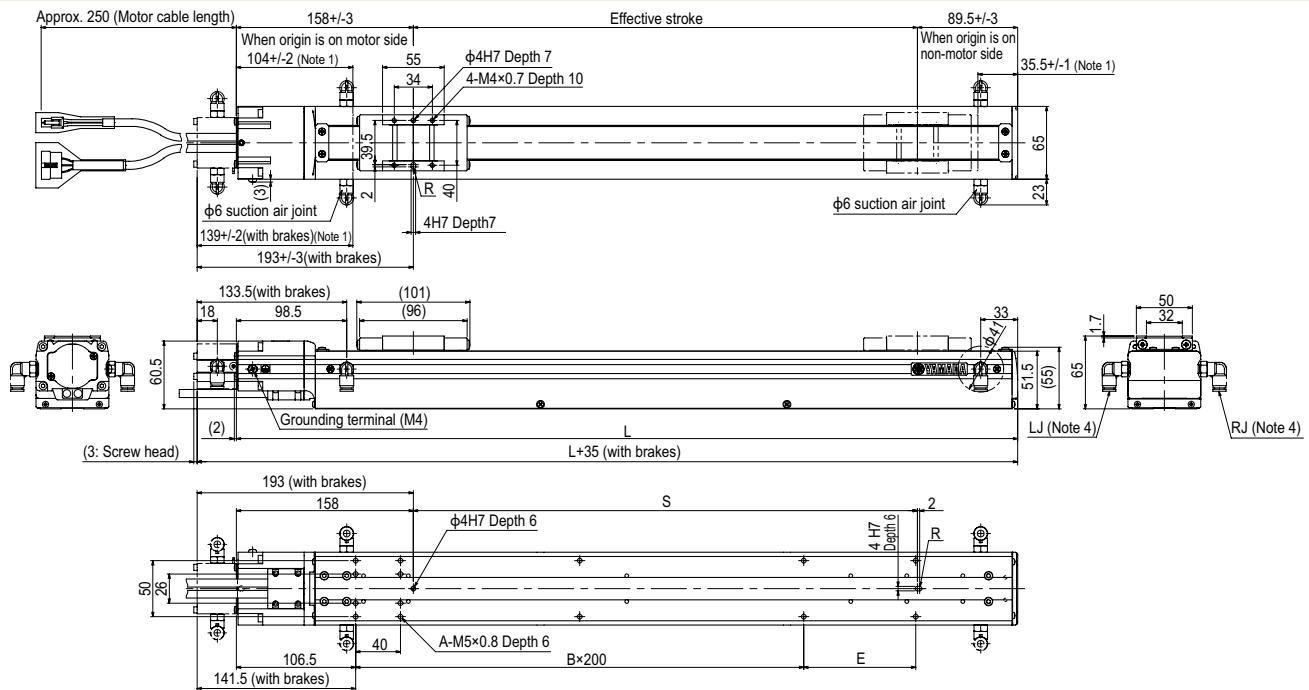
## Static loading moment

(Unit: N·m)		
MY	MP	MR
35	40	50

## Controller

Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	I/O point trace / Remote command
RDV-X205-RBR1	Pulse train control

## C6L



Effective stroke	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800
<b>L</b>	297.5	347.5	397.5	447.5	497.5	547.5	597.5	647.5	697.5	747.5	797.5	847.5	897.5	947.5	997.5	1047.5
<b>A</b>	10	10	10	12	12	12	12	14	14	14	14	16	16	16	16	18
<b>B</b>	0	0	0	1	1	1	1	2	2	2	2	3	3	3	3	4
<b>E</b>	150	200	200	100	100	200	200	100	100	200	200	100	100	200	200	100
<b>S</b>	50	100	150	200	250	300	350	400	450	500	550	600	650	700	750	800
<b>Weight (kg)</b> Note 3	2.6	2.9	3.1	3.4	3.7	4.0	4.3	4.6	4.9	5.2	5.4	5.7	6.0	6.3	6.6	6.8
<b>Maximum speed for each stroke</b> Note 5 (mm/sec)	<b>Lead 20</b>	1000														
	<b>Speed setting</b>	-														
	<b>Lead 12</b>	800														
	<b>Lead 6</b>	400														
<b>Speed setting</b>	<b>Lead 20</b>	-														
	<b>Lead 12</b>	800														
	<b>Lead 6</b>	400														
	<b>Speed setting</b>	-														

- Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R30.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.2 kg heavier than the models with no brake shown in the table.  
 Note 4. Either right or left can be selected for the installation direction for the  $\phi$ 6 intake air joint. (The left side is the standard.)  
 Note 5. When the stroke is longer than 600mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.



# C8

- High lead: Lead 20
- Origin on the non-motor side is selectable



## Ordering method

**C8**

Model	Lead	Brake <sup>Note 1</sup>	Option	Stroke	Cable length <sup>Note 2</sup>
	20: 20mm 12: 12mm 6: 6mm	No entry: With no brake BK: With brake	Origin position None: Standard Z: Non-motor side	150 to 800 (50mm pitch)	3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)

TSX	SR1-X	RDV-X
<b>Positioner</b> <sup>Note 3</sup> TS-X	<b>Controller</b> SR1-X	<b>Driver</b> RDV-X
<b>Driver: Power-supply voltage / Power capacity</b> 105: 100V/100W or less 205: 200V/100W or less	<b>Driver: Power capacity</b> 05: 100W or less	<b>Power-supply voltage</b> 2: AC200V
<b>LCD monitor</b> No entry: None L: With LCD	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>Driver: Power capacity</b> 05: 100W or less
<b>I/O selection</b> NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 4</sup>	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Regenerative unit</b> RBR1
<b>Battery</b> B: With battery (Absolute) N: None (Incremental)	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)	

Note 1. The model with a lead of 20mm cannot select specifications with brake (vertical specifications).  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	100
Repeatability <sup>Note 1</sup> (mm)	+/-0.02
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 12 6
Maximum speed (mm/sec)	1000 720 360
Maximum payload (kg)	Horizontal 12 20 40 Vertical - 4 8
Rated thrust (N)	84 141 283
Stroke (mm)	150 to 800 (50mm pitch)
Overall length (mm)	Horizontal Stroke+320 Vertical Stroke+355
Maximum outside dimension of body cross-section (mm)	W80 × H75
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>
Intake air (Nl/min)	30 to 90 <sup>Note 4</sup>

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 600mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang <sup>Note</sup>

Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)									
Lead	Weight	Unit: mm			Lead	Weight	Unit: mm			Unit: N·m							
		A	B	C			A	B	C	MY	MP	MR					
Lead 20	5kg	245	85	146	Lead 20	5kg	121	71	211	Lead 12	1kg	440	442				
	10kg	131	39	69		Lead 12	10kg	42	24		88	Lead 12	2kg	207	209		
	12kg	115	31	57			Lead 12	12kg	29		16		66	Lead 12	3kg	130	132
	5kg	364	92	192				Lead 6	5kg		164		78		328	Lead 6	4kg
10kg	207	43	92	Lead 6	10kg				62	29	158		Lead 6		2kg		237
15kg	144	26	41		Lead 6	15kg			26	12	83	Lead 6			4kg		106
20kg	112	18	40			Lead 6	20kg		7	4	32			Lead 6	6kg		62
10kg	406	47	124				Lead 6	10kg	87	33	353				Lead 6	8kg	34
20kg	225	20	54	Lead 6				20kg	18	6	127		Lead 6				
30kg	162	11	31		Lead 6			30kg	0	0	0	Lead 6					
40kg	168	7	20			Lead 6		40kg	0	0	0			Lead 6			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

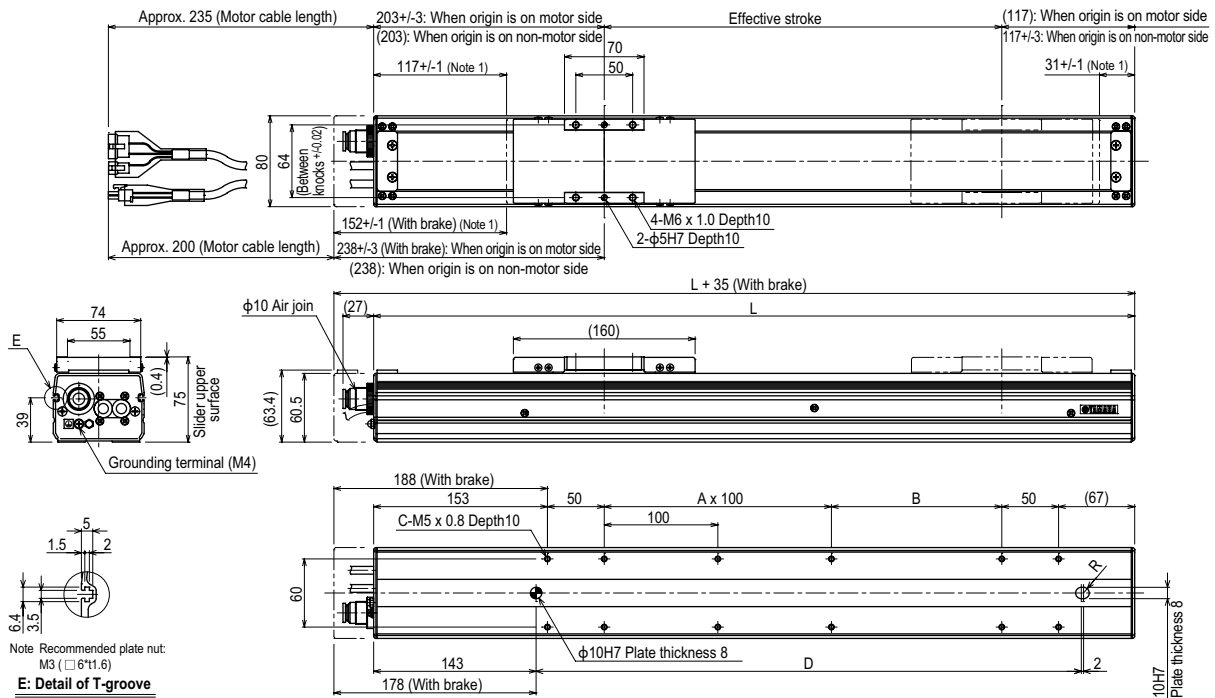
## Static loading moment

MY	MP	MR
70	95	110

## Controller

Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	Remote command
RDV-X205-RBR1	Pulse train control

## C8



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800		
L	470	520	570	620	670	720	770	820	870	920	970	1020	1070	1120		
A	0	1	1	2	2	3	3	4	4	5	5	6	6	7		
B	150	100	150	100	150	100	150	100	150	100	150	100	150	100		
C	8	10	10	12	12	14	14	16	16	18	18	20	20	22		
D	280	330	380	430	480	530	580	630	680	730	780	830	880	930		
Weight (kg) <sup>Note 3</sup>	3.6	3.9	4.1	4.4	4.7	5.0	5.3	5.6	5.9	6.2	6.4	6.7	7.0	7.3		
Maximum speed <sup>Note 4</sup> (mm/sec)	Lead 20	1000										950	800	700	650	
	Speed setting	-										95%	80%	70%	65%	
	Lead 12	720										648	540	468	432	360
	Lead 6	360										324	270	234	216	180
Speed setting	-										90%	75%	65%	60%	50%	

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.3 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 600mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

# C8L

Origin on the non-motor side is selectable

## Ordering method

<b>C8L</b>	<b>Model</b>	<b>Lead</b> 20: 20mm 10: 10mm 5: 5mm	<b>Brake</b> No entry: With no brake BK: With brake	<b>Option</b> Origin position change None: Standard Z: Non-motor side	<b>Stroke</b> 150 to 1050 (50mm pitch)	<b>Cable length</b> <sup>Note 1</sup> 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b>	<b>Positioner</b> <sup>Note 2</sup> TS-X	<b>Driver: Power-supply voltage / Power capacity</b> 105: 100V/100W or less 205: 200V/100W or less	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 3</sup>	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)
	<b>SR1-X</b>	<b>Controller</b>	<b>05</b>	<b>Driver: Power capacity</b> 05: 100W or less	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)					
	<b>RDV-X</b>	<b>Driver</b>	<b>2</b>	<b>Power-supply voltage</b> 2: AC200V	<b>Driver: Power capacity</b> 05: 100W or less	<b>RBR1</b>	<b>Regenerative unit</b>					

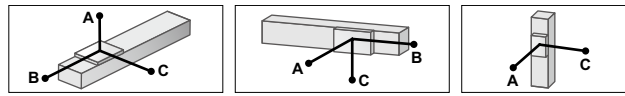
Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 2. See P.500 for DIN rail mounting bracket.  
 Note 3. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	100
Repeatability <sup>Note 1</sup> (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 10 5
Maximum speed <sup>Note 2</sup> (mm/sec)	1000 600 300
Maximum payload (kg)	Horizontal 20 40 50 Vertical 4 8 16
Rated thrust (N)	84 169 339
Stroke (mm)	150 to 1050 (50mm pitch)
Overall length (mm)	Horizontal Stroke+325 Vertical Stroke+360
Maximum outside dimension of body cross-section (mm)	W80 x H75
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>
Intake air (Nl/min)	30 to 90 <sup>Note 4</sup>

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 700mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

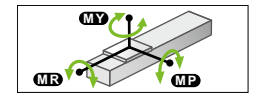
## Allowable overhang



Lead	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)				
	A	B	C	A	B	C	A	C			
Lead 20	5kg	259	122	179	5kg	147	100	220	2kg	255	260
	10kg	149	55	89	10kg	53	32	97	4kg	111	115
	15kg	100	33	56	15kg	17	10	39	2kg	300	302
	20kg	95	22	41	20kg	0	0	0	4kg	131	133
Lead 10	10kg	251	61	130	10kg	87	41	197	6kg	75	77
	20kg	127	25	55	20kg	10	4	37	8kg	47	49
	30kg	90	14	31	30kg	0	0	0	5kg	113	114
	40kg	69	8	18	40kg	0	0	0	10kg	37	38
Lead 5	20kg	256	29	76	20kg	24	9	152	15kg	12	12
	30kg	188	16	43	30kg	0	0	0	16kg	9	9
	40kg	96	10	28	40kg	0	0	0			
	50kg	33	6	18	50kg	0	0	0			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

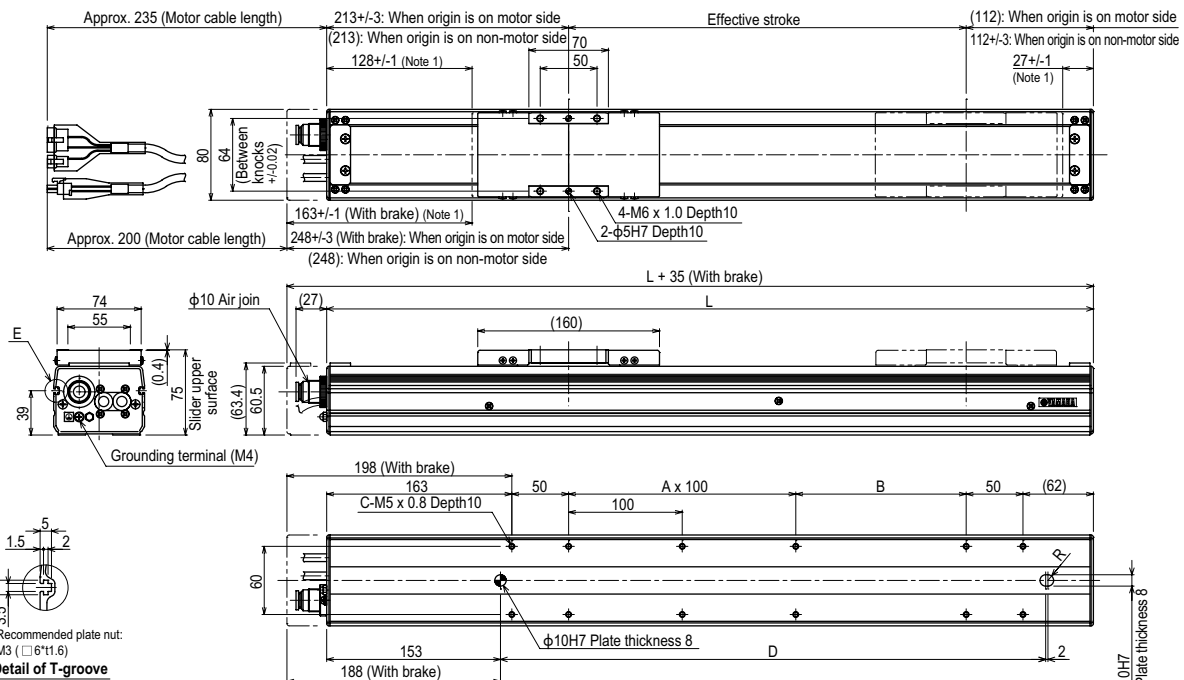


(Unit: N·m)		
MY	MP	MR
70	95	110

## Controller

Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	Remote command
RDV-X205-RBR1	Pulse train control

## C8L



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050	
L	475	525	575	625	675	725	775	825	875	925	975	1025	1075	1125	1175	1225	1275	1325	1375	
A	0	1	1	2	2	3	3	4	4	5	5	6	6	7	7	8	8	9	9	
B	150	100	150	100	150	100	150	100	150	100	150	100	150	100	150	100	150	100	150	
C	8	10	10	12	12	14	14	16	16	18	18	20	20	22	22	24	24	26	26	
D	280	330	380	430	480	530	580	630	680	730	780	830	880	930	980	1030	1080	1130	1180	
Weight (kg) <sup>Note 3</sup>	3.9	4.2	4.5	4.8	5.1	5.4	5.7	6.0	6.4	6.7	7.0	7.3	7.6	7.9	8.2	8.5	8.8	9.2	9.5	
Maximum speed <sup>Note 4</sup> (mm/sec)	1000																			
	-																			
	90%																			
	80%																			
Speed setting	600																			
	300																			
	-																			
Speed setting	85%																			
	75%																			
	60%																			

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.3 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 700mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.



# C8LH

Origin on the non-motor side is selectable

## Ordering method

**C8LH**

Model	Lead	Option	Stroke	Cable length <sup>Note 1</sup>	TSX	SR1-X	RDV-X	Battery
	20: 20mm 10: 10mm 5: 5mm	Origin position change None: Standard Z: Non-motor side	150 to 1050 (50mm pitch)	3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	Positioner <sup>Note 2</sup> TS-X Driver: Power supply voltage / Power capacity 105: 100V/100W or less 205: 200V/100W or less LCD monitor No entry: None L: With LCD	Controller 05 Driver: Power capacity 05: 100W or less Usable for CE No entry: Standard E: CE marking	Driver 2 Power supply voltage 2: AC200V Driver: Power capacity 05: 100W or less Regenerative unit RBR1	I/O selection NPN: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 3</sup> Battery B: With battery (Absolute) N: None (Incremental)

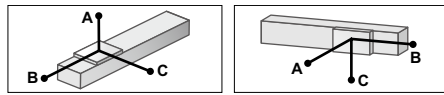
Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 2. See P.500 for DIN rail mounting bracket.  
 Note 3. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	100
Repeatability <sup>Note 1</sup> (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 10 5
Maximum speed <sup>Note 2</sup> (mm/sec)	1000 600 300
Maximum payload (kg)	Horizontal 30 60 80
Rated thrust (N)	84 169 339
Stroke (mm)	150 to 1050 (50mm pitch)
Overall length (mm)	Stroke+389
Maximum outside dimension of body cross-section (mm)	W80 x H75
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>
Intake air (N <sub>2</sub> /min)	30 to 90 <sup>Note 4</sup>

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

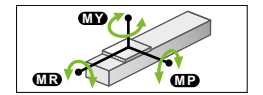
## Allowable overhang <sup>Note</sup>



	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)		
	A	B	C	A	B	C
Lead 20	10kg	687	274	200	163	225
	20kg	401	125	92	56	76
	30kg	338	76	57	20	27
Lead 10	20kg	622	137	111	74	90
	40kg	472	57	47	8	11
	60kg	375	30	25	-	-
Lead 5	20kg	1087	148	127	89	104
	40kg	844	63	54	15	18
	60kg	707	34	29	-	-
	80kg	594	20	17	-	-

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

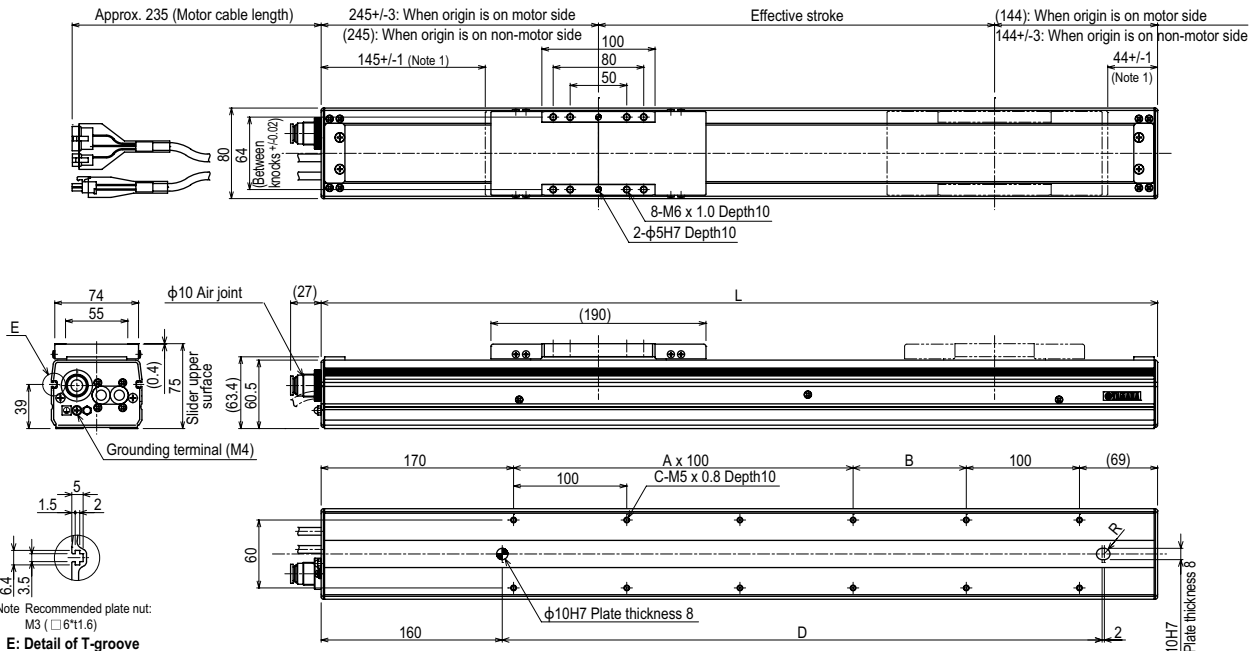


(Unit: N·m)		
MY	MP	MR
128	163	143

## Controller

Controller	Operation method
SR1-X05 RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105	I/O point trace / Remote command
TS-X205	I/O point trace / Remote command
RDV-X205-RBR1	Pulse train control

## C8LH



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050	
L	539	589	639	689	739	789	839	889	939	989	1039	1089	1139	1189	1239	1289	1339	1389	1439	
A	1	1	2	2	3	3	4	4	5	5	6	6	7	7	8	8	9	9	10	
B	100	150	100	150	100	150	100	150	100	150	100	150	100	150	100	150	100	150	100	
C	8	8	10	10	12	12	14	14	16	16	18	18	20	20	22	22	24	24	26	
D	330	380	430	480	530	580	630	680	730	780	830	880	930	980	1030	1080	1130	1180	1230	
Weight (kg)	4.7	5.0	5.3	5.6	5.9	6.2	6.6	6.9	7.2	7.5	7.8	8.1	8.4	8.7	9.0	9.3	9.7	10.0	10.3	
Maximum speed <sup>Note 3</sup> (mm/sec)	Lead 20																			
	Speed setting																			
	Lead 10																			
	Lead 5																			
Speed setting	-																			
	-																			

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. When the stroke is longer than 650mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Articulated robots  
YA  
Linear conveyor modules  
LCM100  
Compact single-axis robots  
TRANSEVO  
Single-axis robots  
FLIP-X  
Linear motor single-axis robots  
PHASER  
Cartesian robots  
XX-X  
SCARA robots  
YK-X  
Pick & place robots  
YP-X  
CLEAN  
CONTROLLER INFORMATION  
Single-axis  
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SCARA

# C10

Origin on the non-motor side is selectable: Lead 20 • 10



## Ordering method

**C10**

Model	Lead	Brake	Option	Stroke	Cable length <sup>Note 2</sup>
	20: 20mm 10: 10mm 5: 5mm	No entry: With no brake BK: With brake	Origin position change None: Standard Z: Non-motor side <sup>Note 1</sup>	150 to 1050 (50mm pitch)	3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)

**TSX**

Positioner <sup>Note 3</sup>	Driver: Power-supply voltage / Power capacity	Regenerative unit	LCD monitor	I/O selection	Battery
TS-X	105: 100V/100W or less 205: 200V/100W or less	No entry: None R: With RGT	No entry: None L: With LCD	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 4</sup>	B: With battery (Absolute) N: None (Incremental)

**SR1-X 05**

Controller	Driver: Power capacity	Usable for CE	Regenerative unit	I/O selection	Battery
	05: 100W or less	No entry: Standard E: CE marking	No entry: None R: With RGT	N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	B: With battery (Absolute) N: None (Incremental)

**RDV-X 2 05 RBR1**

Driver	Power-supply voltage	Driver: Power capacity	Regenerative unit
	2: AC200V	05: 100W or less	

Note 1. If selecting 5mm lead specifications then the origin point cannot be changed to the non-motor side.  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	100
Repeatability <sup>Note 1</sup> (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 10 5
Maximum speed (mm/sec)	1000 500 250
Maximum payload (kg)	Horizontal 20 40 60 Vertical 4 10 20
Rated thrust (N)	84 169 339
Stroke (mm)	150 to 1050 (50mm pitch)
Overall length (mm)	Horizontal Stroke+283 Vertical Stroke+313
Maximum outside dimension of body cross-section (mm)	W104 x H85
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>
Intake air (Nl/min)	30 to 90 <sup>Note 4</sup>

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang<sup>Note</sup>

Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)			
	A	B	C		A	B	C		A	C	
Lead 20	5kg	1875	530	510	5kg	496	451	1826	1kg	2461	2492
	10kg	1079	247	242	10kg	218	168	1002	2kg	1213	1244
	20kg	628	106	107	20kg	78	27	497	4kg	585	617
Lead 10	15kg	765	156	164	10kg	230	170	1036	8kg	627	658
	30kg	425	62	66	20kg	80	29	506	10kg	280	312
	40kg	350	38	42	30kg	30	0	311	15kg	119	151
Lead 5	30kg	960	63	68	10kg	234	170	2716	20kg	213	244
	50kg	565	25	28	20kg	82	29	1206	15kg	119	151
	60kg	470	16	17	30kg	31	0	711	20kg	72	104

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

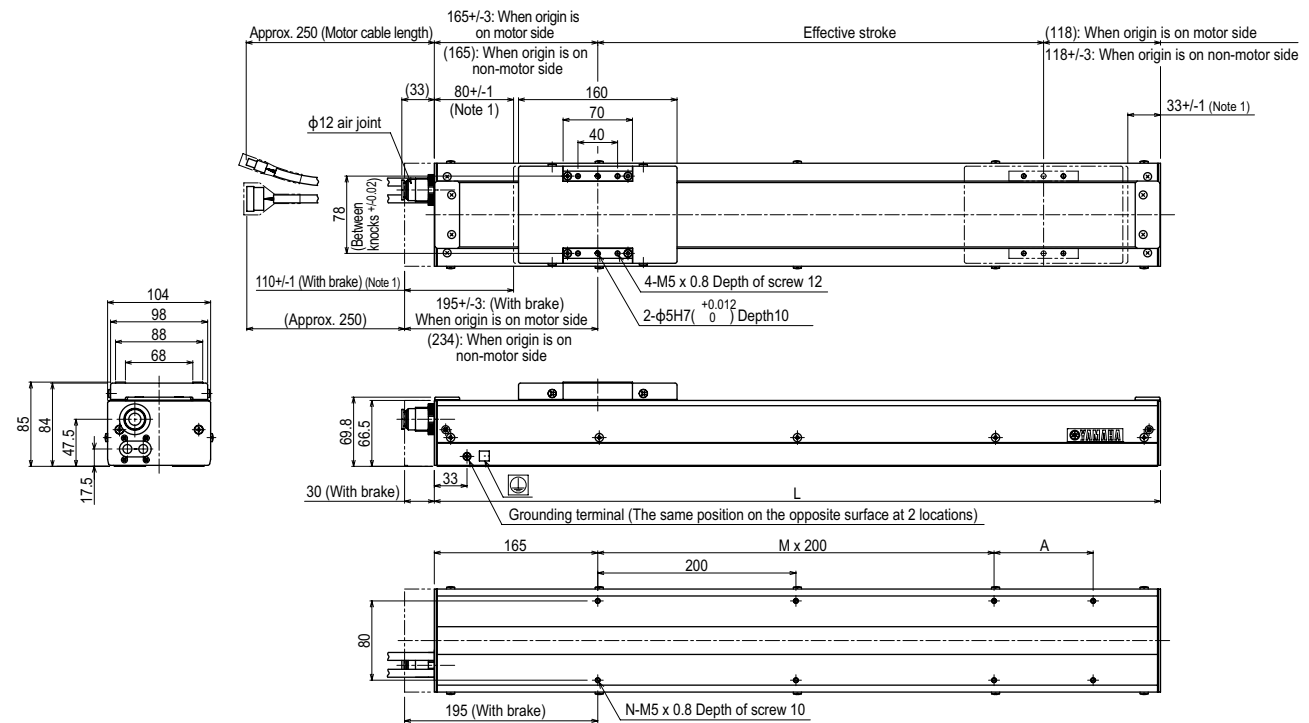
(Unit: N·m)		
MY	MP	MR
119	119	105

## Controller

Controller	Operation method
SR1-X05 <sup>Note</sup>	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X105 <sup>Note</sup>	I/O point trace / Remote command
TS-X205 <sup>Note</sup>	I/O point trace / Remote command
RDV-X205-RBR1	Pulse train control

Note. Regenerative unit is required when the models used vertically and with 700mm or larger stroke.

## C10



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050	
L	433	483	533	583	633	683	733	783	833	883	933	983	1033	1083	1133	1183	1233	1283	1333	
A	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	
M	0	1	1	1	2	2	2	2	3	3	3	3	3	4	4	4	4	5	5	
N	4	6	6	6	6	8	8	8	10	10	10	10	10	12	12	12	12	14	14	
Weight (kg) <sup>Note 3</sup>	4.4	5.0	5.5	6.1	6.7	7.3	7.8	8.4	9.0	9.6	10.1	10.7	11.3	11.9	12.4	13.0	13.6	14.2	14.7	
Maximum speed (mm/sec) <sup>Note 4</sup>	Lead 20	1000																		
	Lead 10	500																		
	Lead 5	250																		
Speed setting	95% 95% 75% 75% 60% 60% 50%																			

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.4 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

# C14

Origin on the non-motor side is selectable



## Ordering method

C14				
Model	Lead	Brake	Option	Stroke
	20: 20mm 10: 10mm 5: 5mm	No entry: With no brake BK: With brake	Origin position change None: Standard Z: Non-motor side	150 to 1050 (50mm pitch)
				Cable length <sup>Note 1</sup>
				3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)

Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 2. See P.500 for DIN rail mounting bracket.  
 Note 3. Select this selection when using the gateway function. For details, see P.62.

TSX				
Positioner <sup>Note 2</sup>	Driver: Power-supply voltage / Power capacity	Regenerative unit	LCD monitor	I/O selection
TS-X	105: 100V/100W or less 205: 200V/100W or less	No entry: None R: With RGT	No entry: None L: With LCD	NP: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 3</sup>
SR1-X				
Controller	Driver: Power capacity	Usable for CE	Regenerative unit	I/O selection
	05: 100W or less	No entry: Standard E: CE marking	No entry: None R: With RG1	N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS
RDV-X				
Driver	Power-supply voltage	Driver: Power capacity	RBR1	
	2: AC200V	05: 100W or less	Regenerative unit	

## Basic specifications

AC servo motor output (W)	100		
Repeatability <sup>Note 1</sup> (mm)	±0.01		
Deceleration mechanism	Ball screw		
Ball screw lead (mm)	20	10	5
Maximum speed (mm/sec)	1000	500	250
Maximum payload (kg)	Horizontal	Vertical	
	30	55	80
	4	10	20
Rated thrust (N)	84	169	339
Stroke (mm)	150 to 1050 (50mm pitch)		
Overall length (mm)	Horizontal	Stroke+285	
	Vertical	Stroke+315	
Maximum outside dimension of body cross-section (mm)	W136 × H96		
Cable length (m)	Standard: 3.5 / Option: 5, 10		
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>		
Intake air (Nl/min)	30 to 90 <sup>Note 4</sup>		

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang <sup>Note</sup>

Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)			
Lead	Weight	A	B	Lead	Weight	A	B	Lead	Weight	A	C
Lead 20	5kg	2127	1384	968	5kg	1047	968	1553	1kg	600	600
	15kg	1177	459	425	15kg	387	264	748	2kg	1200	1200
	30kg	1247	242	291	30kg	206	97	633	4kg	1141	885
Lead 10	20kg	1120	349	353	20kg	299	180	658	8kg	1216	943
	40kg	857	179	215	40kg	127	49	363	10kg	621	482
	55kg	932	138	182	55kg	79	16	296	15kg	574	445
Lead 5	50kg	2017	250	335	50kg	233	103	1033	20kg	370	287
	60kg	1477	134	192	60kg	75	13	433	20kg	268	208
	80kg	1452	106	157	80kg	35	0	242			

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

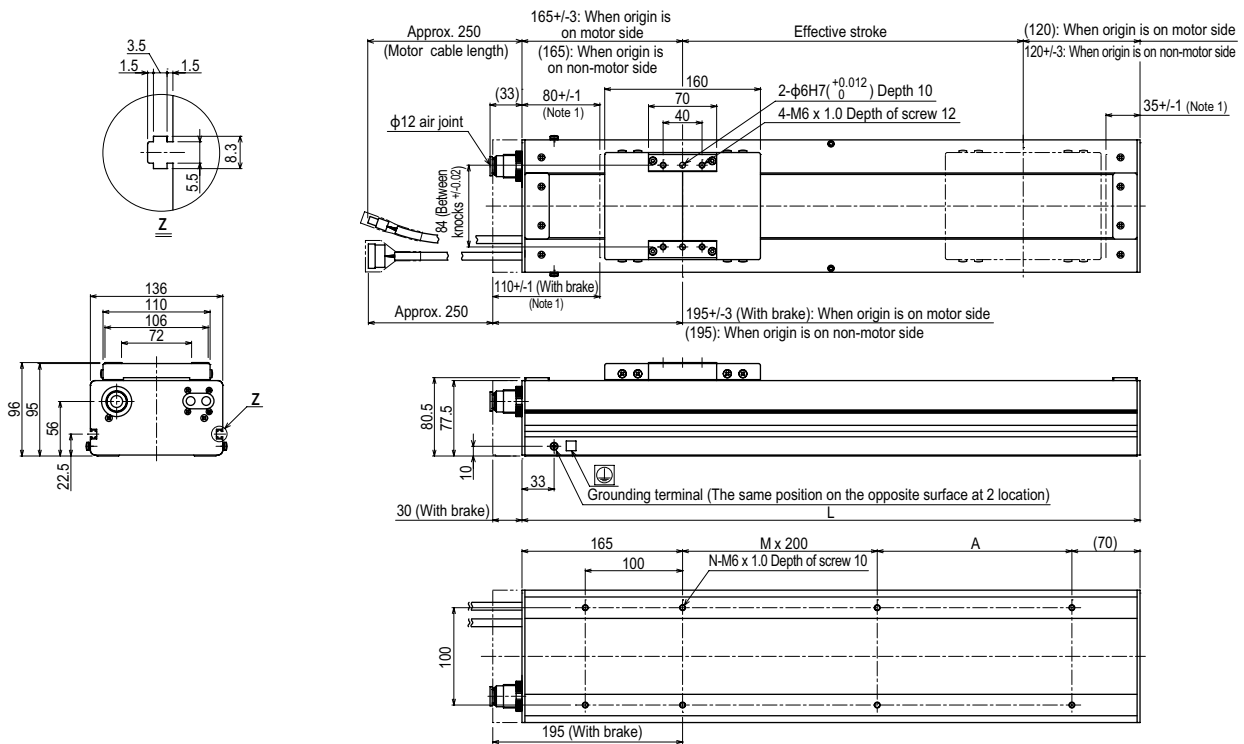
			(Unit: N·m)		
MY	MP	MR			
232	233	204			

## Controller

Controller	Operation method
SR1-X-05 <sup>Note</sup>	Programming / I/O point trace / Remote command / Operation using RS-232C communication
RX21/22/222	Remote command / Operation using RS-232C communication
RX240/340	Remote command
TS-X105 <sup>Note</sup>	I/O point trace / Remote command
TS-X205 <sup>Note</sup>	Remote command
RDV-X205-RBR1	Pulse train control

Note. Regenerative unit is required when the models used vertically and with 700mm or larger stroke.

## C14



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050
L	435	485	535	585	635	685	735	785	835	885	935	985	1035	1085	1135	1185	1235	1285	1335
A	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100
M	0	1	1	1	1	2	2	2	2	3	3	3	3	4	4	4	4	5	5
N	6	8	8	8	8	10	10	10	10	12	12	12	12	14	14	14	14	16	16
Weight (kg) <sup>Note 3</sup>	9.2	9.9	10.5	11.2	11.7	12.4	13.0	13.7	14.3	15.0	15.5	16.2	16.8	17.5	18.1	18.8	19.3	20.0	20.6
Maximum speed <sup>Note 4</sup> (mm/sec)	Lead 20	1000																	
	Lead 10	500																	
	Lead 5	250																	
	Speed setting	95%																	

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.4 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Controller

SR1-X ▶ 518 TS-X ▶ 492 RDV-X ▶ 506

# C14H

Origin on the non-motor side is selectable: Lead 20 • 10



## Ordering method

<b>C14H</b>	<b>Model</b>	<b>Lead</b> 20: 20mm 10: 10mm 5: 5mm	<b>Brake</b> No entry: With no brake BK: With brake	<b>Option</b> Origin position change None: Standard Z: Non-motor side <sup>Note 1</sup>	<b>Stroke</b> 150 to 1050 (50mm pitch)	<b>Cable length</b> <sup>Note 2</sup> 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b>	<b>Positioner</b> <sup>Note 3</sup> TS-X	<b>Driver: Power-supply voltage / Power capacity</b> 110: 100V/200W 210: 200V/200W	<b>Regenerative unit</b> No entry: None R: With RGT	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> N: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board <sup>Note 4</sup>	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)
	<b>SR1-X</b>	<b>10</b>					<b>Controller</b>	<b>Driver: Power capacity</b> 10: 200W	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>Regenerative unit</b> No entry: None R: With RG1	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)	
	<b>RDV-X</b>	<b>2</b>					<b>Driver</b>	<b>Power-supply voltage</b> 2: AC200V		<b>Driver: Power capacity</b> 10: 200W or less	<b>RBR1</b>	<b>Regenerative unit</b>	

Note 1. If selecting 5mm lead specifications then the origin point cannot be changed to the non-motor side.  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	200
Repeatability <sup>Note 1</sup> (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 10 5
Maximum speed (mm/sec)	1000 500 250
Maximum payload (kg)	Horizontal 40 80 100 Vertical 8 20 30
Rated thrust (N)	170 341 683
Stroke (mm)	150 to 1050 (50mm pitch)
Overall length (mm)	Horizontal Stroke+349 Vertical Stroke+379
Maximum outside dimension of body cross-section (mm)	W136 x H96
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>
Intake air (Nl/min)	30 to 90 <sup>Note 4</sup>

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang<sup>Note</sup>

Lead	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)		
	A	B	C	A	B	C	A	C	
Lead 20	10kg	2247	1675	987	1210	1678	4kg	2400	2008
	20kg	1397	855	497	548	958	6kg	1687	1358
	40kg	1037	445	247	217	598	8kg	1287	1033
Lead 10	30kg	1937	583	402	328	1238	10kg	1347	1088
	50kg	1637	364	227	152	878	15kg	887	718
	80kg	1717	242	119	74	678	20kg	657	538
Lead 5	60kg	2443	311	197	108	1308	20kg	747	608
	80kg	2193	242	127	53	1008	25kg	663	484
	100kg	2000	202	85	20	788	30kg	491	396

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

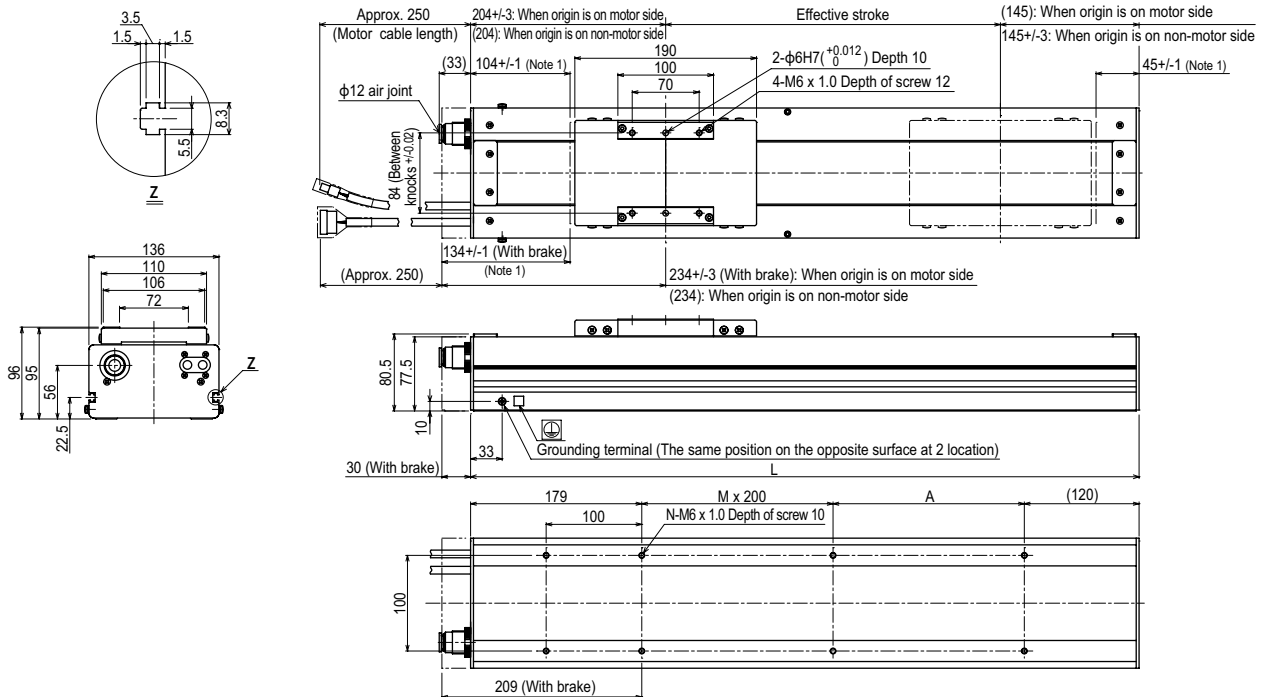
(Unit: N·m)		
MY	MP	MR
293	294	258

## Controller

Controller	Operation method
SR1-X10 <sup>Note</sup>	Programming / I/O point trace / Remote command
RCX221/222	Operation using RS-232C communication
RCX240/340	
TS-X110 <sup>Note</sup>	I/O point trace / Remote command
TS-X210 <sup>Note</sup>	
RDV-X210-RBR1	Pulse train control

Note. Regenerative unit is required when used vertically.

## C14H



Effective stroke	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050
L	499	549	599	649	699	749	799	849	899	949	999	1049	1099	1149	1199	1249	1299	1349	1399
A	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100
M	0	1	1	1	1	2	2	2	2	3	3	3	3	4	4	4	4	5	5
N	6	8	8	8	8	10	10	10	10	12	12	12	12	14	14	14	14	16	16
Weight (kg) <sup>Note 3</sup>	10.7	11.4	12.0	12.7	13.2	13.9	14.5	15.2	15.8	16.5	17.0	17.7	18.3	19.0	19.6	20.3	20.8	21.5	22.1
Maximum speed <sup>Note 4</sup> (mm/sec)	Lead 20	1000																	
	Lead 10	500																	
	Lead 5	250																	
	Speed setting	95% 95% 75% 75% 60% 60% 50%																	

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 0.4 kg heavier than the models with no brake shown in the table.

Note 4. When the stroke is longer than 750mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.



# C17

Origin on the non-motor side is selectable



## Ordering method

<b>C17</b>	<b>Model</b>	<b>Lead</b> 20: 20mm 10: 10mm	<b>Brake</b> No entry: With no brake BK: With brake	<b>Option</b> Origin position change None: Standard Z: Non-motor side	<b>Stroke</b> 200 to 1250 (50mm pitch)	<b>Cable length</b> 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b> <b>Positioner</b> TS-X	<b>220</b> <b>Driver: Power-supply voltage / Power capacity</b> 220: 200V/400 to 600W	<b>Regenerative unit</b> No entry: None R: With RGT	<b>LCD monitor</b> No entry: None L: With LCD	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)
	<b>SR1-X</b> <b>Controller</b>	<b>20</b> <b>Driver: Power capacity</b> 20: 400 to 600W	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>Regenerative unit</b> No entry: None R: With RG1	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)						
	<b>RDV-X</b> <b>Driver</b>	<b>2</b> <b>Power-supply voltage</b> 2: AC200V	<b>20</b> <b>Driver: Power capacity</b> 20: 400W or less	<b>Regenerative unit</b> RBR1 (Horizontal) RBR2 (Vertical)								

Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 2. See P.500 for DIN rail mounting bracket.  
 Note 3. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	400
Repeatability (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20      10
Maximum speed (mm/sec)	1000      600
Maximum payload (kg)	Horizontal: 80, Vertical: 15
Rated thrust (N)	339      678
Stroke (mm)	200 to 1250 (50mm pitch)
Overall length (mm)	Horizontal: Stroke+395, Vertical: Stroke+425
Maximum outside dimension of body cross-section (mm)	W168 x H114
Cable length (m)	Standard: 3.5 / OP: 5, 10
Degree of cleanliness	CLASS 10
Intake air (Nl/min)	30 to 90

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 950mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

	Horizontal installation (Unit: mm)				Wall installation (Unit: mm)				Vertical installation (Unit: mm)		
	A	B	C	Lead	A	B	C	Lead	A	C	Lead
Lead 20	30kg	2660	871	1040	30kg	1017	789	2576	5kg	3000	3000
Lead 10	50kg	1911	508	615	50kg	583	426	1808	10kg	2443	2443
	80kg	1541	303	377	80kg	338	221	1380	15kg	1633	1633
	60kg	2443	418	580	60kg	525	336	2443	15kg	1728	1728
	100kg	2000	237	330	100kg	271	155	2000	25kg	1013	1013
	120kg	1841	192	268	120kg	207	109	1841	35kg	707	707

Note. Distance from center of slider to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

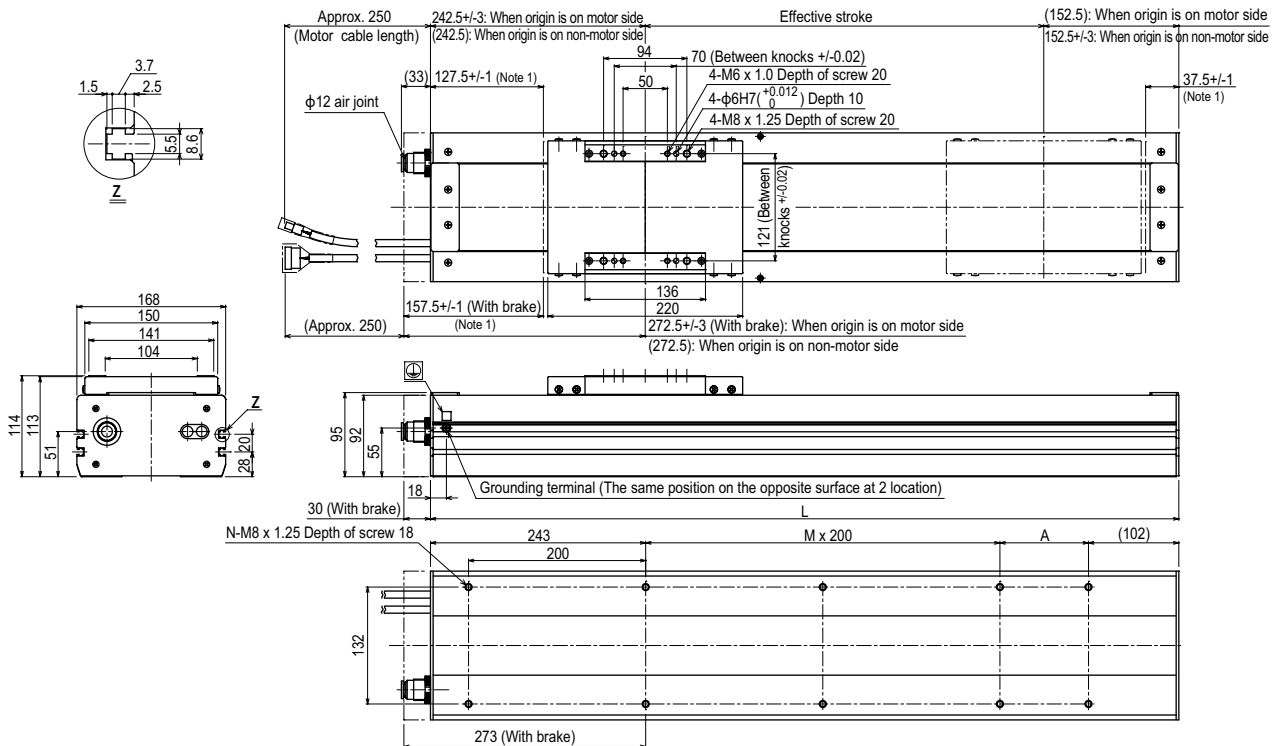
(Unit: N·m)		
MY	MP	MR
1032	1034	908

## Controller

Controller	Operation method
SR1-X20	Programming / I/O point trace / Remote command / Operation using RS-232C communication
RXC221/222, RCX240/340	I/O point trace / Remote command
TS-X220	Pulse train control
RDV-X220-RBR1 (Horizontal)	
RDV-X220-RBR2 (Vertical)	

Note. [The following arrangements require a regeneration unit] • Using in the upright position.

## C17



Effective stroke	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050	1100	1150	1200	1250	
L	595	645	695	745	795	845	895	945	995	1045	1095	1145	1195	1245	1295	1345	1395	1445	1495	1545	1595	1645	
A	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	
M	1	1	1	1	2	2	2	2	3	3	3	3	4	4	4	4	5	5	5	5	6	6	
N	8	8	8	8	10	10	10	10	12	12	12	12	14	14	14	14	16	16	16	16	18	18	
Weight (kg)	15.0	16.0	17.0	17.9	18.9	19.8	20.8	21.7	22.7	23.6	24.6	25.5	26.5	27.4	28.4	29.3	30.3	31.2	32.2	33.1	34.1	35.0	
Maximum speed (mm/sec)	1000												800	800	700	700	600	600	500	500	500	500	500
Speed setting	-												80%	80%	70%	70%	60%	60%	60%	50%	50%	50%	50%

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 1.5 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 950mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Controller

**SR1-X ▶ 518      TS-X ▶ 492      RDV-X ▶ 506**

Articulated robots  
YA  
Linear conveyor modules  
LCM100  
Compact single-axis robots  
TRANSEVO  
Single-axis robots  
FLIP-X  
Linear motor single-axis robots  
PHASER  
Cartesian robots  
XY-X  
SCARA robots  
YK-X  
Pick & place robots  
YP-X  
CLEAN  
CONTROLLER INFORMATION  
Single-axis  
Cartesian  
SCARA

# C17L

● Origin on the non-motor side is selectable

Note. Built-to-order product. Contact us for the delivery period.

## Ordering method

**C17L - 50**

Model	Lead	Brake	Option	Stroke	Cable length
		No entry: With no brake BK: With brake	Origin position change None: Standard Z: Non-motor side	1150 to 2050 (100mm pitch)	3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)

Positioner	220	R	LCD monitor	I/O selection	Battery
TS-X	Driver: Power-supply voltage / Power capacity 220: 200V/400 to 600W	Regenerative unit R: With RGT	No entry: None L: With LCD	N: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board	B: With battery (Absolute) N: None (Incremental)

SR1-X	20	R	I/O selection	Battery	
Controller	Driver: Power capacity 20: 400 to 600W	Usable for CE No entry: Standard E: CE marking	No entry: None L: With RG1	N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	B: With battery (Absolute) N: None (Incremental)

RDV-X	2	20	Regenerative unit
Driver	Power-supply voltage 2: AC200V	Driver: Power capacity 20: 400W or less	RBR1 (Horizontal) RBR2 (Vertical)

Note 1. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 2. See P.500 for DIN rail mounting bracket.  
 Note 3. Acceleration / deceleration is different depending the Positioner or Controller or Driver.  
 Note 4. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	600
Repeatability (mm)	+/-0.02
Deceleration mechanism	Ball screw
Ball screw lead (mm)	50
Maximum speed (mm/sec)	1000
Maximum payload (kg)	Horizontal: 50 Vertical: 10
Rated thrust (N)	204
Stroke (mm)	1150 to 2050 (100 pitch)
Overall length (mm)	Horizontal: Stroke+485 Vertical: Stroke+515
Maximum outside dimension of body cross-section (mm)	W168 x H114
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10
Intake air (Nl/min)	30 to 90

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 1850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

Lead 50	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)			
	A	B	C	A	B	C	A	C		
10kg	4000	2687	3327	10kg	3436	2605	4000	2kg	1200	1200
30kg	3045	872	929	30kg	1169	790	3045	5kg	3000	3000
50kg	2602	509	714	50kg	666	427	2602	10kg	2579	2579

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

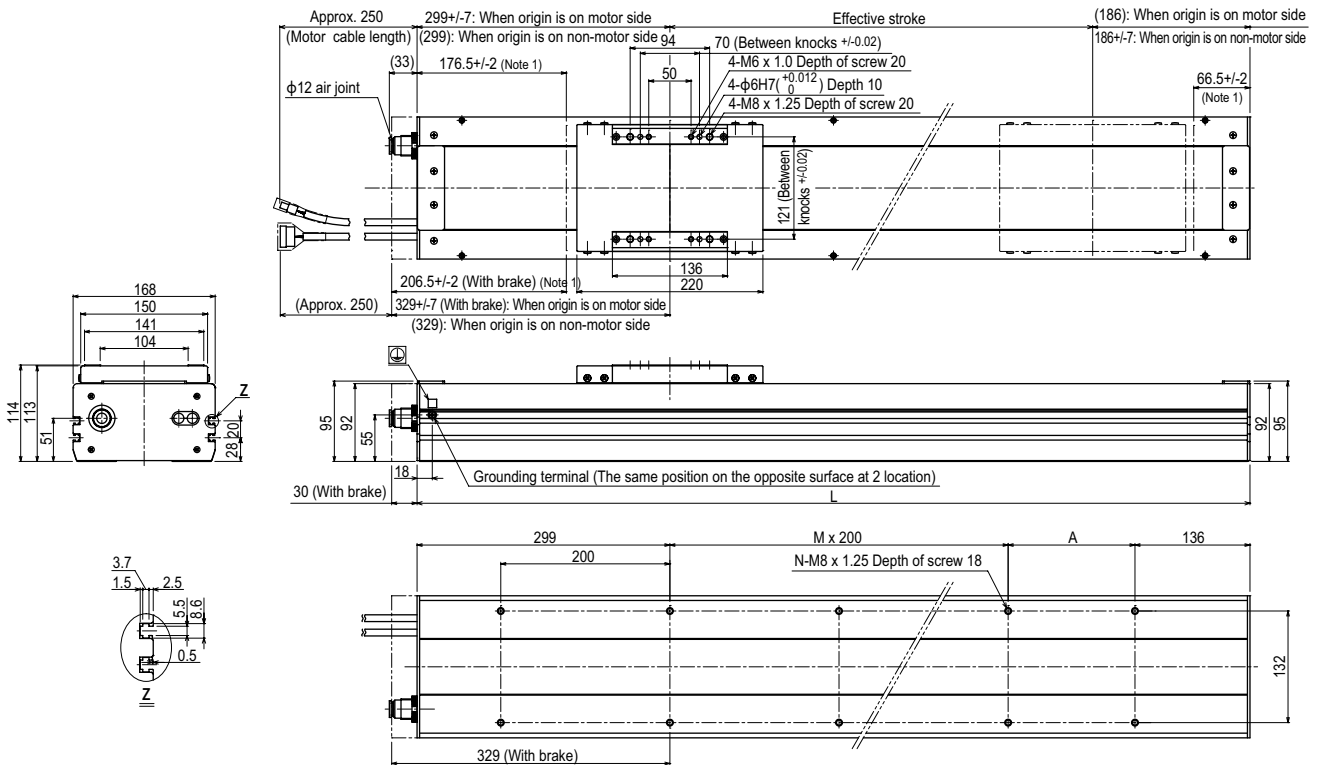
## Static loading moment

(Unit: N·m)		
MY	MP	MR
1032	1034	908

## Controller

Controller	Operation method
SR1-X20-R RCX221/222 RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X220-R	I/O point trace / Remote command
RDV-X220-RBR1 (Horizontal) RDV-X220-RBR2 (Vertical)	Pulse train control

## C17L



Effective stroke	1150	1250	1350	1450	1550	1650	1750	1850	1950	2050
L	1635	1735	1835	1935	2035	2135	2235	2335	2435	2535
A	200	100	200	100	200	100	200	100	200	100
M	5	6	6	7	7	8	8	9	9	10
N	16	18	18	20	20	22	22	24	24	26
Weight (kg) Note 3	39.1	41.2	43.2	45.2	47.3	49.3	51.3	53.4	55.4	57.4
Maximum speed (mm/sec) Note 4	Lead 50					Speed setting				
	1000					-				
						90%				
						80%				

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 1.5 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 1850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.



# C20

● Origin on the non-motor side is selectable



## Ordering method

<b>C20</b>	<b>Model</b>	<b>Lead</b> Note 1 20: 20mm 10: 10mm	<b>Brake</b> No entry: With no brake BK: With brake	<b>Option</b> Origin position change None: Standard Z: Non-motor side	<b>Stroke</b> 200 to 1250 (50mm pitch)	<b>Cable length</b> Note 2 3L: 3.5m 5L: 5m 10L: 10m 3K/5K/10K (Flexible cable)	<b>TSX</b>	<b>220</b>	<b>SR1-X</b>	<b>20</b>	<b>RDV-X</b>	<b>2</b>	<b>20</b>
							<b>Positioner</b> Note 3 TS-X	<b>Driver: Power supply voltage / Power capacity</b> Note 4 220: 200V/400 to 600W	<b>Controller</b>	<b>Driver: Power capacity</b> Note 4 20: 400 to 600W	<b>Driver</b>	<b>Power supply voltage</b> 2: AC200V	<b>Driver: Power capacity</b> Note 4 20: 400W or less
								<b>Regenerative unit</b> No entry: None R: With RGT	<b>Usable for CE</b> No entry: Standard E: CE marking	<b>Usable for CE</b> No entry: Standard E: CE marking			
								<b>LCD monitor</b> No entry: None L: With LCD	<b>Regenerative unit</b> No entry: None R: With RG1	<b>Regenerative unit</b> No entry: None R: With RG1			
								<b>I/O selection</b> N: NPN PN: PNP CC: CC-Link DN: DeviceNet™ EP: EtherNet/IP™ PT: PROFINET GW: No I/O board Note 5	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS	<b>I/O selection</b> N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS			
								<b>Battery</b> B: With battery (Absolute) N: None (Incremental)	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)	<b>Battery</b> B: With battery (Absolute) N: None (Incremental)			

Note 1. Only the model with specifications with brake (vertical specifications) can select a lead of 10mm.  
 Note 2. The robot cable is standard cable (3L/5L/10L), but can be changed to flexible cable. See P.596 for details on robot cable.  
 Note 3. See P.500 for DIN rail mounting bracket.  
 Note 4. Acceleration / deceleration is different depending the Positioner or Controller or Driver.  
 Note 5. Select this selection when using the gateway function. For details, see P.62.

## Basic specifications

AC servo motor output (W)	600
Repeatability (mm)	+/-0.01
Deceleration mechanism	Ball screw
Ball screw lead (mm)	20 10
Maximum speed (mm/sec)	1000 500
Maximum payload (kg)	Horizontal 120 Vertical 25 45
Rated thrust (N)	510 1020
Stroke (mm)	200 to 1250 (50mm pitch)
Overall length (mm)	Horizontal Stroke+441 Vertical Stroke+471
Maximum outside dimension of body cross-section (mm)	W202 x H117
Cable length (m)	Standard: 3.5 / Option: 5, 10
Degree of cleanliness	CLASS 10 Note 3
Intake air (Nl/min)	30 to 90 Note 4

Note 1. Positioning repeatability in one direction.  
 Note 2. When the stroke is longer than 950mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 3. Per 1cf (0.1um base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## Allowable overhang

	Horizontal installation (Unit: mm)			Wall installation (Unit: mm)			Vertical installation (Unit: mm)		
	A	B	C	A	B	C	A	C	
Lead 20	50kg 2602	869 1145	1145	50kg 1144	798 2602	2602	15kg 2711	2711	
	80kg 2193	528 720	720	80kg 717	456 2193	2193	20kg 2045	2045	
	120kg 1841	339 505	505	120kg 466	267 1841	1841	25kg 1647	1647	
Lead 10	20kg 2182	2182	2182	30kg 1437	1437	1437	45kg 939	939	

Note. Distance from center of slider top to center of gravity of object being carried at a guide service life of 10,000 km.

## Static loading moment

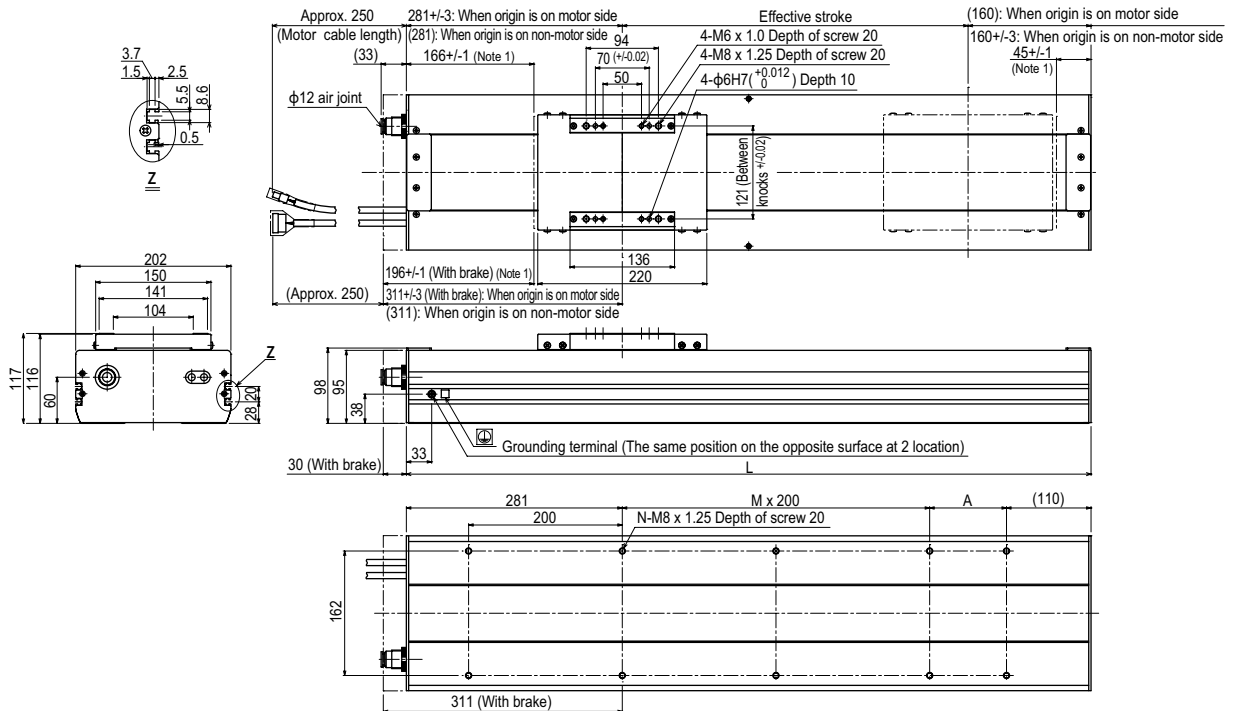
	MY	MP	MR
(Unit: N·m)	1101	1103	968

## Controller

Controller	Operation method
SR1-X20 Note 6 RCX221/222, RCX240/340	Programming / I/O point trace / Remote command / Operation using RS-232C communication
TS-X220 Note 6	I/O point trace / Remote command
RDV-X220-RBR1 (Horizontal) RDV-X220-RBR2 (Vertical)	Pulse train control

Note. [The following arrangements require a regeneration unit.]  
 • Using in the upright position.

## C20



Effective stroke	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	1050	1100	1150	1200	1250	
L	641	691	741	791	841	891	941	991	1041	1091	1141	1191	1241	1291	1341	1391	1441	1491	1541	1591	1641	1691	
A	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	150	200	50	100	
M	1	1	1	1	2	2	2	2	3	3	3	3	4	4	4	5	5	5	5	5	6	6	
N	8	8	8	8	10	10	10	10	12	12	12	12	14	14	14	16	16	16	16	16	18	18	
Weight (kg) Note 3	25.0	26.0	27.0	28.0	29.0	30.0	31.0	32.0	33.0	34.0	35.0	36.0	37.0	38.0	39.0	40.0	41.0	42.0	43.0	44.0	45.0	46.0	
Maximum speed Note 4												800	800	700	700	600	600	500					
(mm/sec)												400	400	350	350	300	300	250					
Speed setting												80%	80%	70%	70%	60%	60%	50%					

Note 1. Stop positions are determined by the mechanical stoppers at both ends.  
 Note 2. Minimum bend radius of motor cable is R50.  
 Note 3. Weight of models with no brake. The weight of brake-attached models is 2.0 kg heavier than the models with no brake shown in the table.  
 Note 4. When the stroke is longer than 950mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

Controller

**SR1-X ▶ 518 TS-X ▶ 492 RDV-X ▶ 506**

# SXYxC 2 axes

● Clean type ● Cable duct



## Ordering method

<b>SXYxC</b>	<b>D</b>					<b>RCX222</b>			
Model	Cable	Combination	X axis stroke	Y axis stroke	Cable length	Controller	Usable for CE	Input/Output selection 1	Input/Output selection 2
	D: Cable duct	T1 T2 T3	15 to 105cm	15 to 65cm	3L: 3.5m 5L: 5m 10L: 10m	RCX222	No entry: Standard E: CE marking	N: NPN P: PNP CC: CC-Link DN: DeviceNet™ PB: PROFIBUS EN: Ethernet YC: YC-Link	No entry: None N: OP.DIO24/16 (NPN) P: OP.DIO24/17 (PNP) EN: Ethernet

Note 1. NPN cannot be selected if using CE marking.  
 Note 2. Available only for the master. See P.68 for details on YC-Link system.  
 Note 3. Only when CC or DN or PB was selected for I/O select 1 above, EN can be selected in I/O select 2.

## Basic specifications

	X axis	Y axis
<b>Axis construction</b> <sup>Note 1</sup>	C14H	C14
<b>AC servo motor output (W)</b>	200	100
<b>Repeatability</b> <sup>Note 2</sup> (mm)	+/-0.01	+/-0.01
<b>Drive system</b>	Ball screw	Ball screw
<b>Ball screw lead</b> <sup>Note 3</sup> (Deceleration ratio) (mm)	20	20
<b>Maximum speed</b> <sup>Note 4</sup> (mm/sec)	1000	1000
<b>Moving range (mm)</b>	150 to 1050	150 to 650
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10	
<b>Degree of cleanliness</b>	CLASS 10 <sup>Note 5</sup>	
<b>Intake air (Nℓ/min)</b>	60 <sup>Note 6</sup>	

Note 1. Use caution that the frame machining (installation holes, tap holes) differs from single-axis robots'.  
 Note 2. Positioning repeatability in one direction.  
 Note 3. Leads not listed in the catalog are also available. Contact us for details.  
 Note 4. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 5. Per 1cf (0.1µm base), when suction blower is used.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

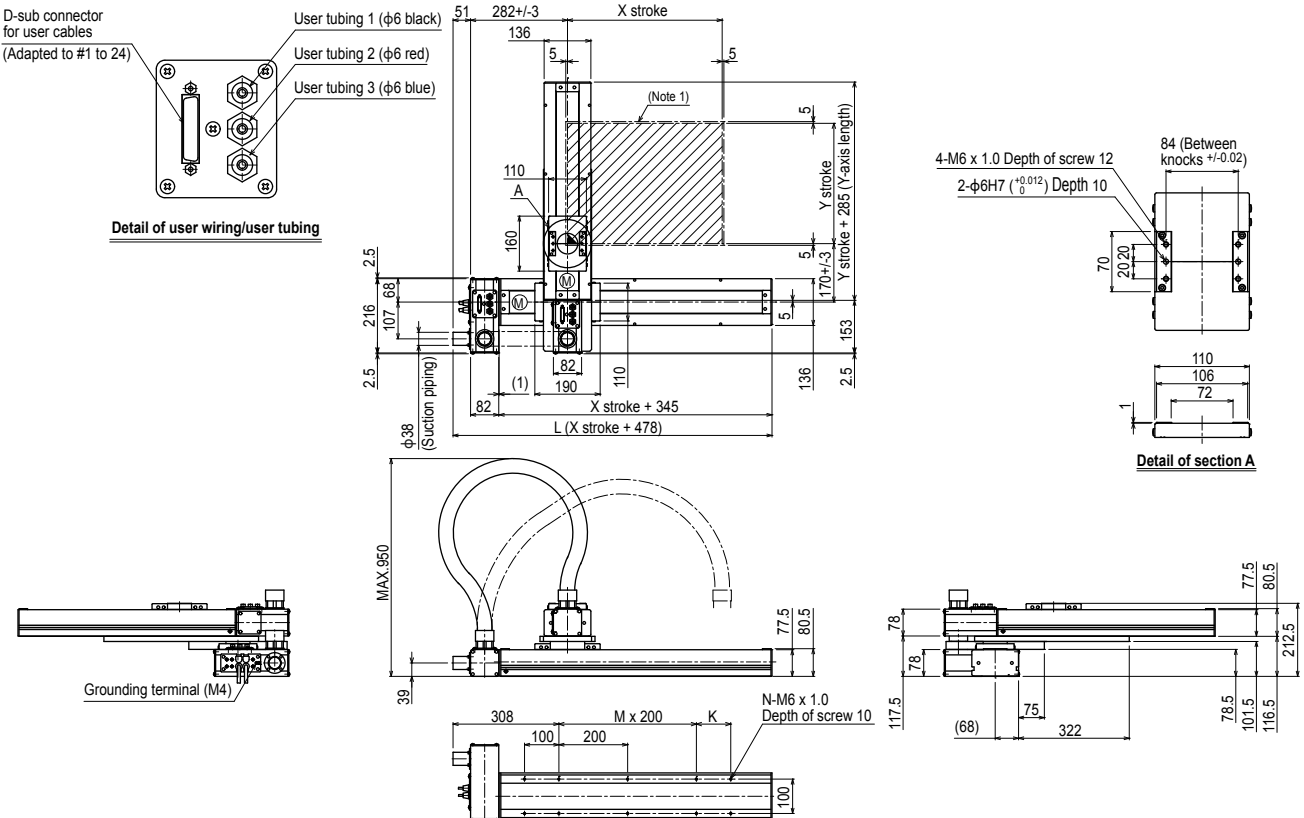
## Maximum payload (kg)

Y stroke (mm)	XY 2 axes
150	20
250	17
350	15
450	13
550	11
650	9

## Controller

Controller	Operation method
RCX222	Programming / I/O point trace / Remote command / Operation using RS-232C communication

## SXYxC 2 axes T1

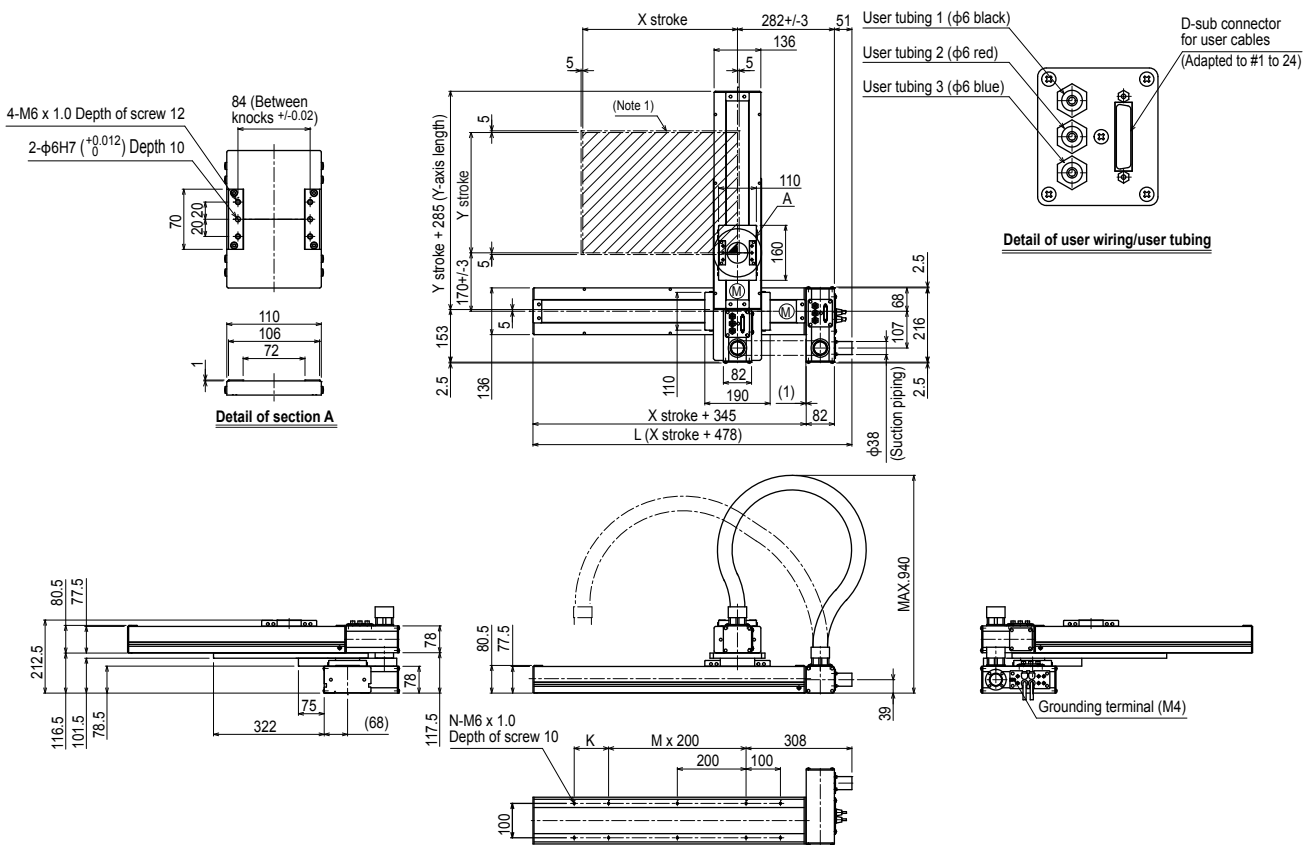


X stroke	150	250	350	450	550	650	750	850	950	1050	
	L	628	728	828	928	1028	1128	1228	1328	1428	1528
K	200	100	200	100	200	100	200	100	200	100	
M	0	1	1	2	2	3	3	4	4	5	
N	6	8	8	10	10	12	12	14	14	16	
Y stroke	150	250	350	450	550	650					
<b>Maximum speed for each stroke (mm/sec)</b> <sup>Note 2</sup>	1000						800	650	550		
<b>Speed setting</b>	-						80%	65%	55%		

Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.

Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

SXYxC 2 axes T3



X stroke	150	250	350	450	550	650	750	850	950	1050
L	628	728	828	928	1028	1128	1228	1328	1428	1528
K	200	100	200	100	200	100	200	100	200	100
M	0	1	1	2	2	3	3	4	4	5
N	6	8	8	10	10	12	12	14	14	16
Y stroke	150	250	350	450	550	650				
Maximum speed for each stroke (mm/sec) <sup>Note 2</sup>	X axis			1000			800	650	550	
Speed setting				-			80%	65%	55%	

Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.

Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

# SXYxC

3 axes / ZSC

- Clean type
- Cable duct
- Z-axis shaft vertical type

## Ordering method

**SXYxC - D** [ ] [ ] [ ] [ ] **15** [ ] **RCX340-3** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

**Model** **Cable** **Combination** **X axis stroke** **Y axis stroke** **ZR axis** **Z axis stroke** **Cable length** **Controller / Number of controllable axes** **Safety standard** **Option A (OP.A)** **Option B (OP.B)** **Option C (OP.C)** **Option D (OP.D)** **Option E (OP.E)** **Absolute battery**

**D:** Cable duct **T1:** T1 **T3:** T3 **15 to 105cm:** 15 to 105cm **15 to 65cm:** 15 to 65cm **ZSC12:** ZSC12 **ZSC6:** ZSC6 **3L: 3.5m:** 3L: 3.5m **5L: 5m:** 5L: 5m **10L: 10m:** 10L: 10m

**RCX240S** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

**Controller** **CE Marking** **Expansion I/O** **Network option** **iVY System** **Gripper** **Battery**

Specify various controller setting items. RCX340 ▶ **P.544**

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis: ZSC12	Z axis: ZSC6
<b>Axis construction</b> <small>Note 1</small>	C14H	C14	-	-
<b>AC servo motor output (W)</b>	200	100	60	60
<b>Repeatability</b> <small>Note 2</small> (mm)	+/-0.01	+/-0.01	+/-0.02	+/-0.02
<b>Drive system</b>	Ball screw	Ball screw	Ball screw	Ball screw
<b>Ball screw lead</b> <small>Note 3</small> (Deceleration ratio) (mm)	20	20	12	6
<b>Maximum speed</b> <small>Note 4</small> (mm/sec)	1000	1000	1000	500
<b>Moving range (mm)</b>	150 to 1050	150 to 650	150	150
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Degree of cleanliness</b>	CLASS 10 <small>Note 5</small>			
<b>Intake air (Nl/min)</b>	90 <small>Note 6</small>			

- Note 1. Use caution that the frame machining (installation holes, tap holes) differs from single-axis robots.  
 Note 2. Positioning repeatability in one direction.  
 Note 3. Leads not listed in the catalog are also available. Contact us for details.  
 Note 4. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 5. Per 1cf (0.1µm base), when suction blower is used.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

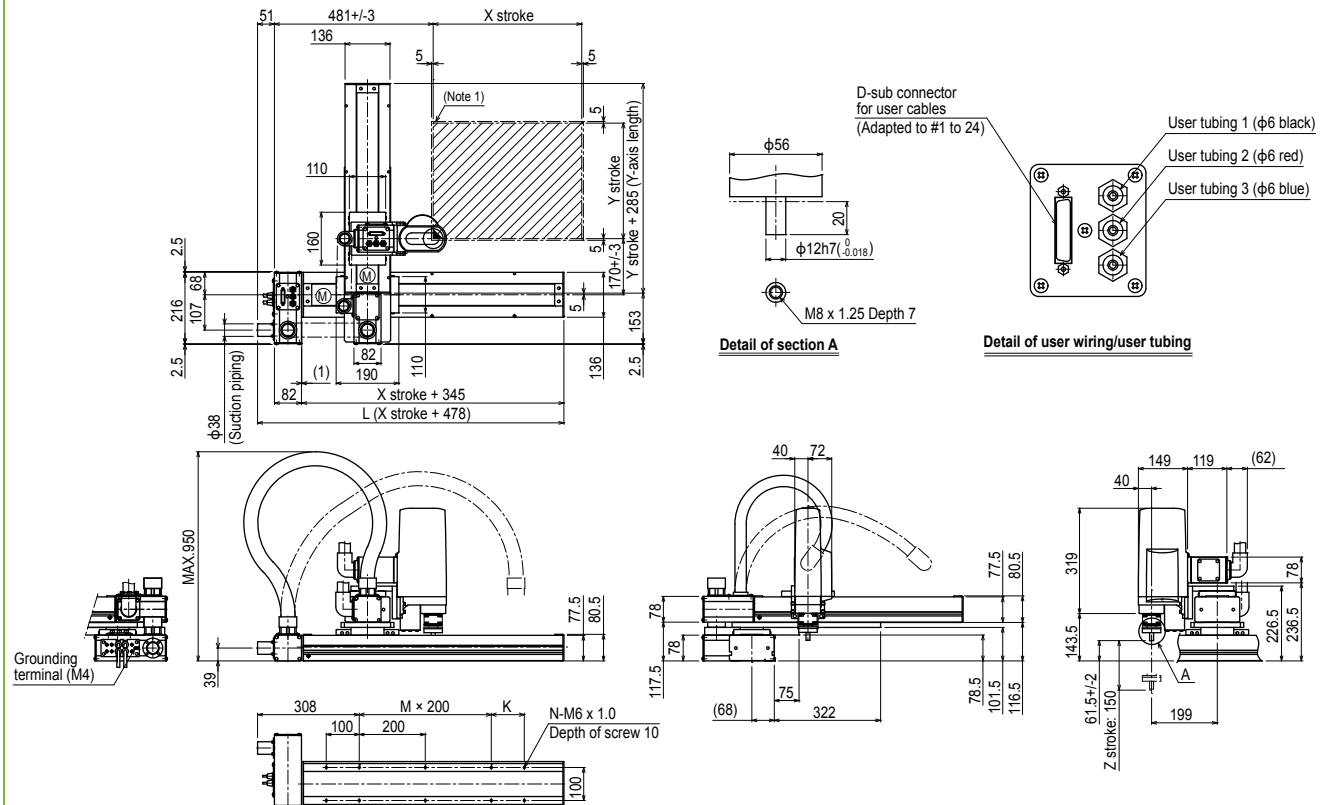
## Maximum payload (kg)

Y stroke (mm)	ZSC12	ZSC6
150 to 650	3	5

## Controller

Controller	Operation method
RCX340 RCX240S	Programming / I/O point trace / Remote command / Operation using RS-232C communication

## SXYxC 3 axes / ZSC (T1)

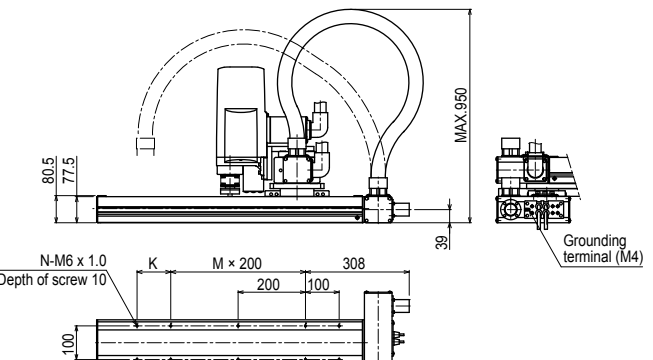
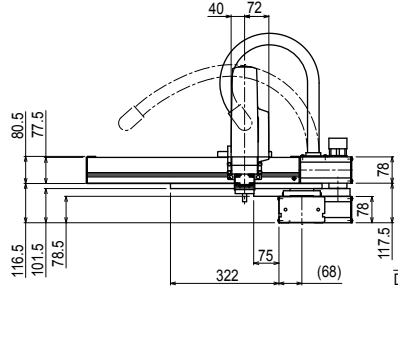
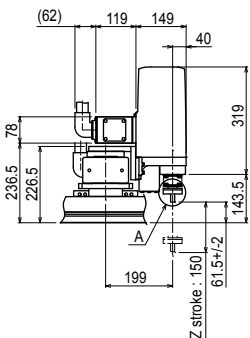
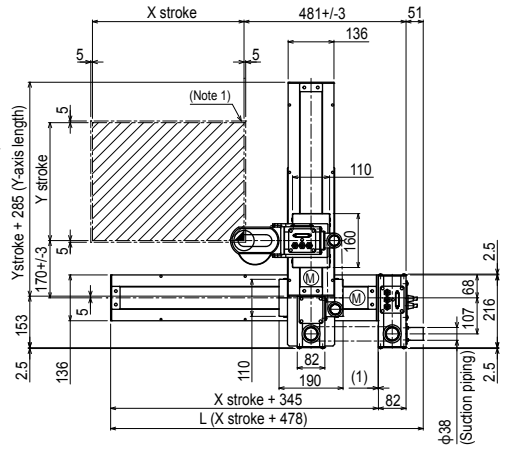
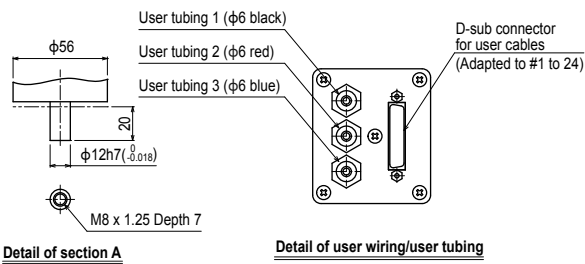


X stroke	150	250	350	450	550	650	750	850	950	1050	
<b>L</b>	628	728	828	928	1028	1128	1228	1328	1428	1528	
<b>K</b>	200	100	200	100	200	100	200	100	200	100	
<b>M</b>	0	1	1	2	2	3	3	4	4	5	
<b>N</b>	6	8	8	10	10	12	12	14	14	16	
<b>Y stroke</b>	150	250	350	450	550	650					
<b>Z stroke</b>	150										
<b>Maximum speed for each stroke (mm/sec)</b> <small>Note 2</small>	<b>X axis</b>	1000				800	650	550			
	<b>Speed setting</b>	-				80%	65%	55%			

Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.

Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

SXYxC 3 axes / ZSC T3



X stroke	150	250	350	450	550	650	750	850	950	1050	
L	628	728	828	928	1028	1128	1228	1328	1428	1528	
K	200	100	200	100	200	100	200	100	200	100	
M	0	1	1	2	2	3	3	4	4	5	
N	6	8	8	10	10	12	12	14	14	16	
Y stroke	150	250	350	450	550	650					
Z stroke	150										
Maximum speed for each stroke (mm/sec)	X axis		1000				800		650	550	
Speed setting	Note 2		-				80%		65%	55%	

Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.

Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

# SXYxC 4 axes / ZRSC

- Clean type
- Cable duct
- ZR-axis integrated type



## Ordering method

**SXYxC - D** [ ] [ ] [ ] [ ] **15** [ ] [ ] [ ] [ ] [ ] [ ]

**Model** - **Cable** - **Combination** - **X axis stroke** - **Y axis stroke** - **ZR axis** - **Z axis stroke** - **Cable length**

D: Cable duct  
T1: T3  
15 to 105cm  
15 to 65cm  
ZRSC12  
ZRSC6  
3L: 3.5m  
5L: 5m  
10L: 10m

**RCX340-4** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

**Controller / Number of controllable axes** - **Safety standard** - **Option A (OP.A)** - **Option B (OP.B)** - **Option C (OP.C)** - **Option D (OP.D)** - **Option E (OP.E)** - **Absolute battery**

Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240S** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

**Controller** - **CE Marking** - **Expansion I/O** - **Network option** - **IVY System** - **Gripper** - **Battery**

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis ZRSC12	Z axis ZRSC6	R axis
<b>Axis construction</b> Note 1	C14H	C14	-	-	R5
<b>AC servo motor output (W)</b>	200	100	60	60	100
<b>Repeatability</b> Note 2 (XYZ: mm) (R: °)	+/-0.01	+/-0.01	+/-0.02	+/-0.02	+/-0.005
<b>Drive system</b>	Ball screw	Ball screw	Ball screw	Ball screw	Harmonic gear
<b>Ball screw lead</b> Note 3 (Deceleration ratio) (mm)	20	20	12	6	(1/50)
<b>Maximum speed</b> Note 4 (XYZ: mm/sec) (R: °/sec)	1000	1000	1000	500	1020
<b>Moving range (XYZ: mm) (R: °)</b>	150 to 1050	150 to 650	150	150	360
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10				
<b>Degree of cleanliness</b>	CLASS 10 Note 5				
<b>Intake air (Nl/min)</b>	90 Note 6				

Note 1. Use caution that the frame machining (installation holes, tap holes) differs from single-axis robots.  
 Note 2. Positioning repeatability in one direction.  
 Note 3. Leads not listed in the catalog are also available. Contact us for details.  
 Note 4. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table below.  
 Note 5. Per 1cf (0.1µm base), when suction blower is used.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

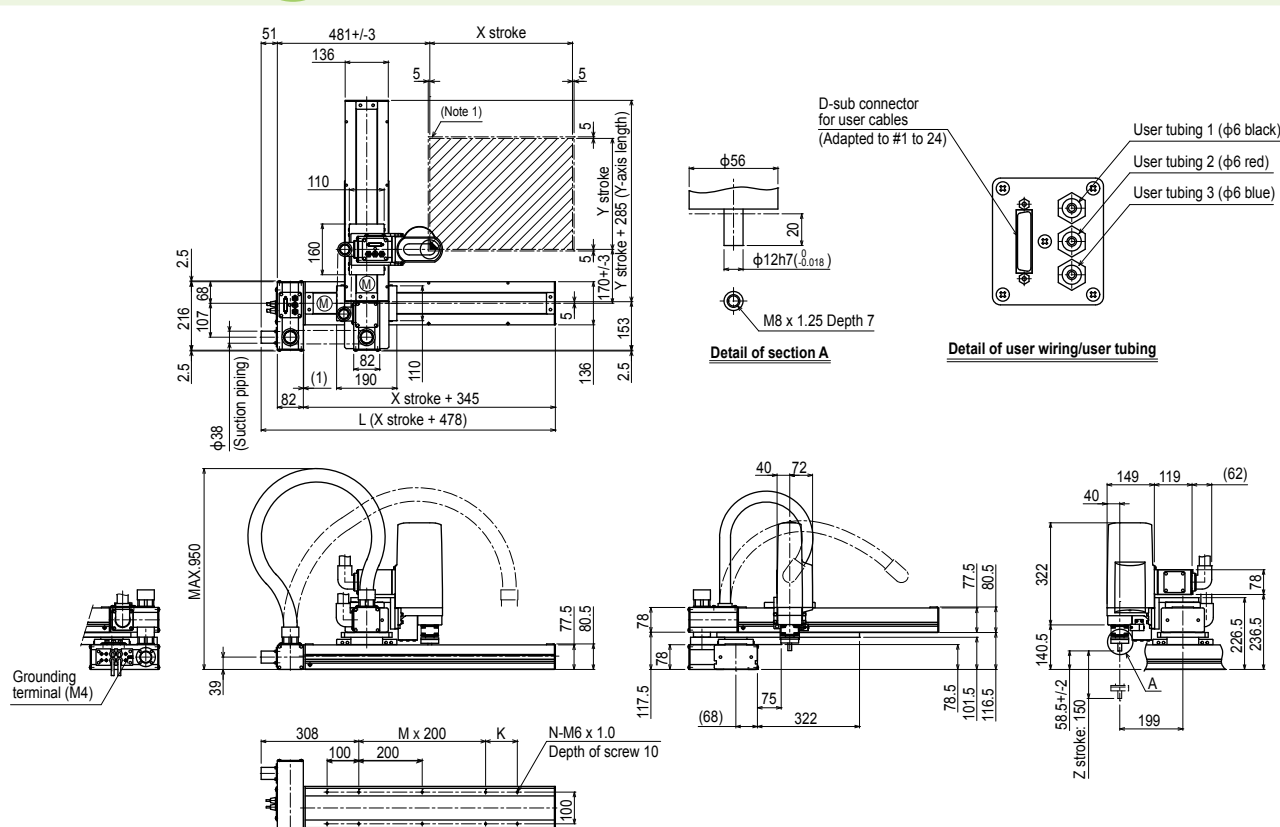
## Maximum payload (kg)

Y stroke (mm)	ZRSC12	ZRSC6
150	3	5
250		
350		
450		
550		
650	4	

## Controller

Controller	Operation method
RCX340 RCX240S	Programming / I/O point trace / Remote command / Operation using RS-232C communication

## SXYxC 4 axes / ZRSC (T1)



		150	250	350	450	550	650	750	850	950	1050	
<b>X stroke</b>	L	628	728	828	928	1028	1128	1228	1328	1428	1528	
	K	200	100	200	100	200	100	200	100	200	100	
	M	0	1	1	2	2	3	3	4	4	5	
	N	6	8	8	10	10	12	12	14	14	16	
<b>Y stroke</b>		150	250	350	450	550	650					
<b>Z stroke</b>		150										
<b>Maximum speed for each stroke (mm/sec)</b> Note 2	X axis	1000					800	650	550			
	Speed setting	-					80%	65%	55%			

Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.

Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.



SXYxC 4 axes / ZRSC T3

**Detail of section A**

**Detail of user wiring/user tubing**

User tubing 1 (φ6 black)  
User tubing 2 (φ6 red)  
User tubing 3 (φ6 blue)  
D-sub connector for user cables (Adapted to #1 to 24)  
φ56  
φ12h7(0/-0.018)  
M8 x 1.25 Depth 7

**Dimensions:**  
X stroke: 481+/-3  
Y stroke: 285 (Y-axis length)  
Z stroke: 150  
L (X stroke + 478)  
MAX 950  
φ38 (Suction piping)  
Grounding terminal (M4)

**Notes:**  
Note 1. The moving range when returning to origin and the stop position when stopping by mechanical stopper.  
Note 2. When the X-axis stroke is longer than 850mm, resonance of the ball screw may occur depending on the operation conditions (critical speed). In this case, reduce the speed setting on the program by referring to the maximum speeds shown in the table at the left.

X stroke	150	250	350	450	550	650	750	850	950	1050	
L	628	728	828	928	1028	1128	1228	1328	1428	1528	
K	200	100	200	100	200	100	200	100	200	100	
M	0	1	1	2	2	3	3	4	4	5	
N	6	8	8	10	10	12	12	14	14	16	
Y stroke	150	250	350	450	550	650					
Z stroke	150										
Maximum speed for each stroke (mm/sec)	X axis		1000				800		650		550
Speed setting			-				80%		65%		55%

# YK180XC

Clean type: Extra small type

Note. Built-to-order product. Contact us for the delivery period.

- Arm length 180mm
- Maximum payload 1kg

## Ordering method

YK180XC - 100

Model	Z axis stroke	Cable length
	100: 100mm	3L: 3.5m
		5L: 5m
		10L: 10m

RCX340-4

Controller / Number of controllable axes	Safety standard	Option A (OP.A)	Option B (OP.B)	Option C (OP.C)	Option D (OP.D)	Option E (OP.E)	Absolute battery
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Specify various controller setting items. RCX340 ▶ P.544

RCX240S

Controller	CE Marking	Expansion I/O	Network option	iVY System	Gripper	Battery
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Specify various controller setting items. RCX240/RCX240S ▶ P.534

## Basic specifications

	X axis	Y axis	Z axis	R axis
<b>Axis specifications</b>				
Arm length (mm)	71	109	100	—
Rotation angle (°)	+/-120	+/-140	—	+/-360
<b>AC servo motor output (W)</b>	50	30	30	30
<b>Repeatability</b> Note 1 (XYZ: mm) (R: °)	+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>	3.3		0.7	1700
<b>Maximum payload (kg)</b>	1.0			
<b>Standard cycle time: with 0.1kg payload</b> Note 2 (sec)	0.42			
<b>R-axis tolerable moment of inertia</b> Note 3 (kgm <sup>2</sup> )	0.01			
<b>User wiring (sq × wires)</b>	0.1 × 8			
<b>User tubing (Outer diameter)</b>	φ3 × 2			
<b>Travel limit</b>	1.Soft limit, 2.Mechanical limit (X, Y, Z axis)			
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Weight (kg) (Excluding robot cable)</b> Note 4	6.5			
<b>Robot cable weight</b>	1.5kg (3.5m) 2.1kg (5m) 4.2kg (10m)			
<b>Degree of cleanliness</b>	CLASS 10 (0.1 μm base)			
<b>Intake air (Nℓ/min)</b>	30			

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

Note 2. When moving 25mm in vertical direction and 100mm in horizontal direction reciprocally.

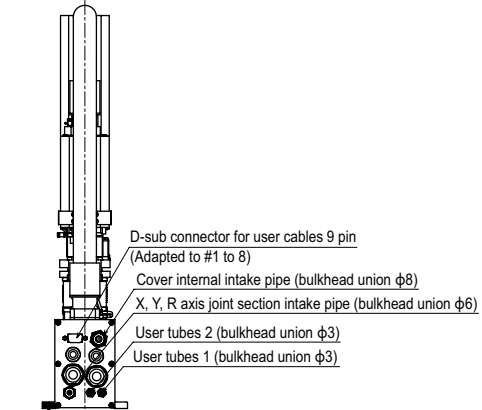
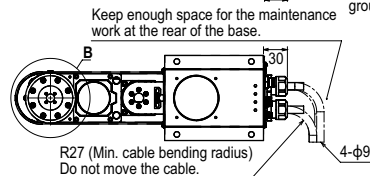
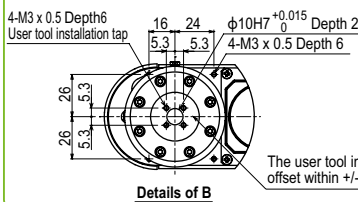
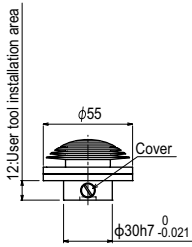
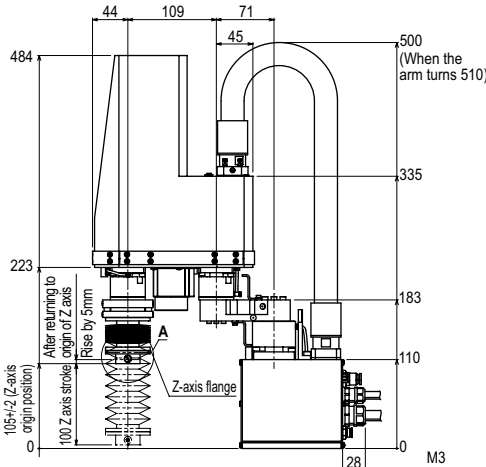
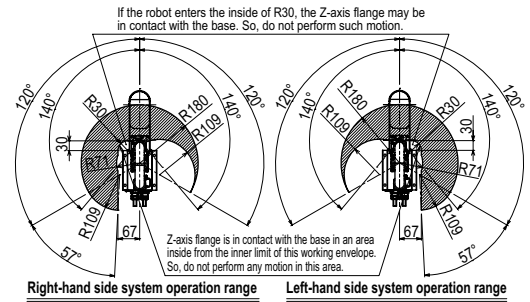
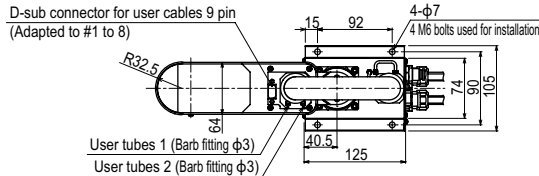
Note 3. There are limits to acceleration coefficient settings.

Note 4. The total robot weight is the sum of the robot body weight and the cable weight.

## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	500	Programming / I/O point trace / Remote command / Operation using RS-232C communication

## YK180XC



**X-axis and Y-axis origin positions**  
Move counterclockwise in advance from the above position when performing origin return.

# YK220XC

Clean type: Extra small type

Note. Built-to-order product. Contact us for the delivery period.

- Arm length 220mm
- Maximum payload 1kg

## Ordering method

### YK220XC - 100

<b>Model</b>	<b>Z axis stroke</b>	<b>Cable length</b>
	100: 100mm	3L: 3.5m
		5L: 5m
		10L: 10m

### RCX340-4

<b>Controller / Number of controllable axes</b>	<b>Safety standard</b>	<b>Option A (OP.A)</b>	<b>Option B (OP.B)</b>	<b>Option C (OP.C)</b>	<b>Option D (OP.D)</b>	<b>Option E (OP.E)</b>	<b>Absolute battery</b>
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Specify various controller setting items. RCX340 ▶ **P.544**

### RCX240S

<b>Controller</b>	<b>CE Marking</b>	<b>Expansion I/O</b>	<b>Network option</b>	<b>iVY System</b>	<b>Gripper</b>	<b>Battery</b>
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Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

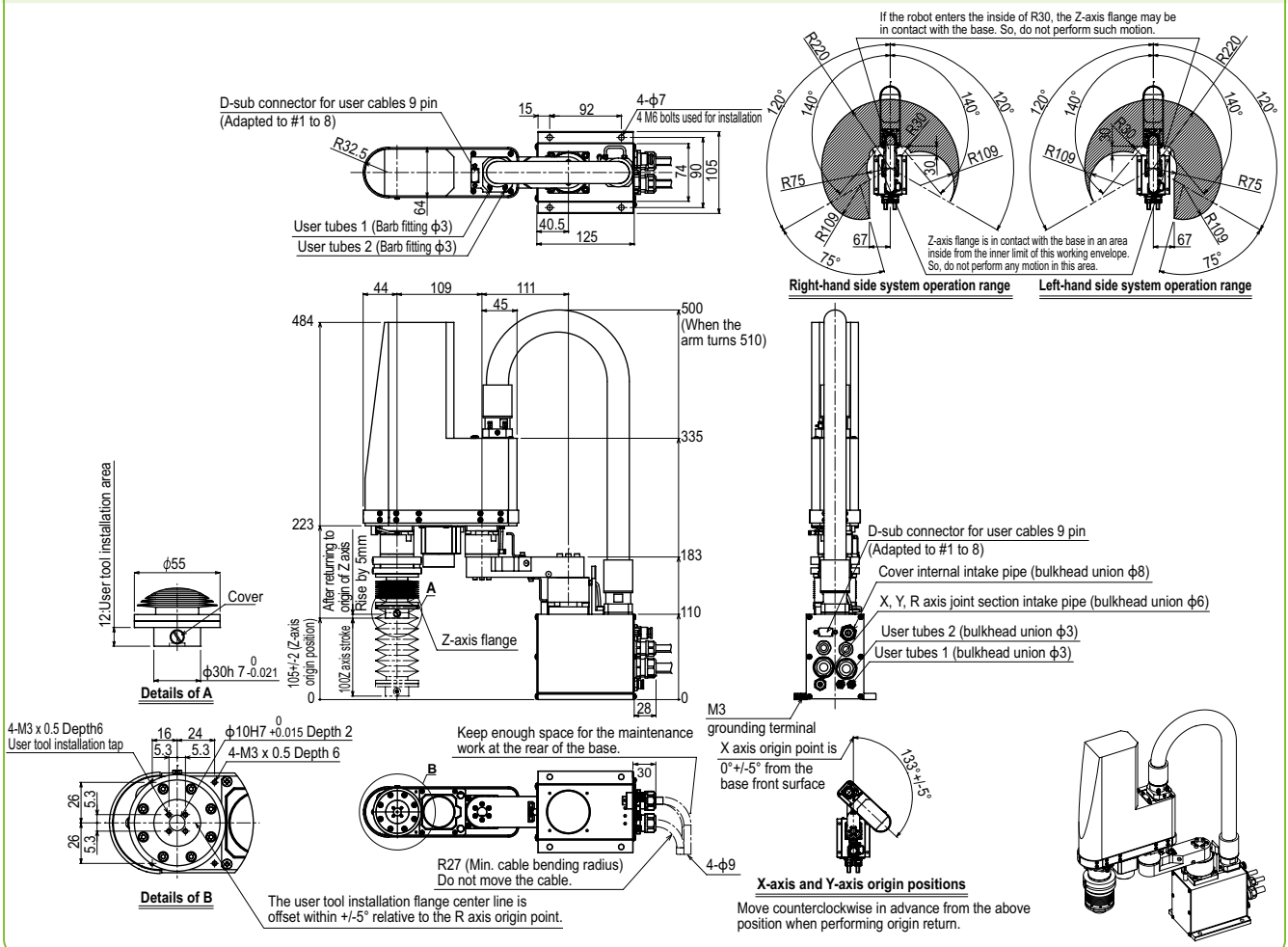
Axis specifications	X axis	Y axis	Z axis	R axis
<b>Arm length (mm)</b>	111	109	100	-
<b>Rotation angle (°)</b>	+/-120	+/-140	-	+/-360
<b>AC servo motor output (W)</b>	50	30	30	30
<b>Repeatability<sup>Note 1</sup> (XYZ: mm) (R: °)</b>	+/-0.01			
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>	3.4			
<b>Maximum payload (kg)</b>	1.0			
<b>Standard cycle time: with 0.1kg payload<sup>Note 2</sup> (sec)</b>	0.45			
<b>R-axis tolerable moment of inertia<sup>Note 3</sup> (kgm<sup>2</sup>)</b>	0.01			
<b>User wiring (sq x wires)</b>	0.1 x 8			
<b>User tubing (Outer diameter)</b>	φ3 x 2			
<b>Travel limit</b>	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Weight (kg) (Excluding robot cable)<sup>Note 4</sup></b>	6.5			
<b>Robot cable weight</b>	1.5kg (3.5m) 2.1kg (5m) 4.2kg (10m)			
<b>Degree of cleanliness</b>	CLASS 10 (0.1μm base)			
<b>Intake air (Nℓ/min)</b>	30			

Note 1. This is the value at a constant ambient temperature.  
 Note 2. When reciprocating 100mm in horizontal and 25mm in vertical directions.  
 Note 3. There are limits to acceleration coefficient settings.  
 Note 4. The total robot weight is the sum of the robot body weight and the cable weight.

## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	500	Programming / I/O point trace / Remote command / Operation using RS-232C communication

## YK220XC



Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSEVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XY-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

CONTROLLER INFORMATION

Single-axis  
Cartesian  
SCARA

# YK250XGC

Clean type: Small type



- Arm length 250mm
- Maximum payload 4kg

## Ordering method

**YK250XGC - 150**

**S**

<b>Model</b>	<b>Z axis stroke</b>	<b>Tool flange</b>	<b>Hollow shaft</b>	<b>Cable length</b>
	150: 150mm	No entry: None F: With tool flange	S: With hollow shaft	3L: 3.5m 5L: 5m 10L: 10m

**RCX340-4**

Controller / Number of controllable axes Safety standard Option A (OP.A) Option B (OP.B) Option C (OP.C) Option D (OP.D) Option E (OP.E) Absolute battery

Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240S**

Controller CE Marking Expansion I/O Network option iVY System Gripper Battery

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis	R axis
<b>Axis specifications</b>				
<b>Arm length (mm)</b>	100	150	150	-
<b>Rotation angle (°)</b>	+/-129	+/-134	-	+/-360
<b>AC servo motor output (W)</b>	200	150	50	100
<b>Repeatability</b> <sup>Note 1</sup> (XYZ: mm) (R: °)	+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>	4.5		1.1	1020
<b>Maximum payload (kg)</b>	4			
<b>Standard cycle time: with 2kg payload (sec)</b> <sup>Note 2</sup>	0.57			
<b>R-axis tolerable moment of inertia</b> <sup>Note 3</sup> (kgm <sup>2</sup> )	0.05			
<b>User wiring (sq x wires)</b>	0.2x10			
<b>User tubing (Outer diameter)</b>	φ4x4			
<b>Travel limit</b>	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Weight (kg)</b>	21.5			
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO 14644-1) <sup>Note 4+ESD</sup> <sup>Note 5</sup>			
<b>Intake air (Nℓ/min)</b>	30 <sup>Note 6</sup>			

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. When reciprocating 25mm in vertical direction and 300mm in horizontal direction (rough-positioning arch motion).  
 Note 3. There are limits to acceleration coefficient settings. See P.609.  
 Note 4. Class 10 (0.1μm) equivalent to FED-STD-209D  
 Note 5. ESD (ElectroStatic Discharge) prevention is an option. Please contact our distributor.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

## Controller

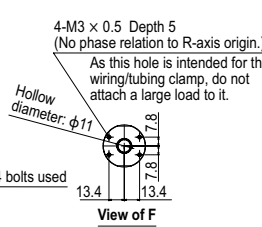
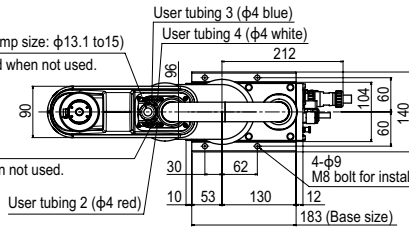
Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	1000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
 See our robot manuals (installation manuals) for detailed information.  
 Note. To set the standard coordinates with high accuracy, use a standard coordinate setting jig (option). Refer to the user's manual (installation manual) for more details.

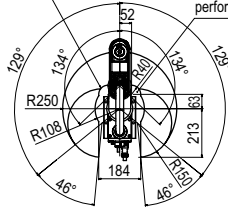
Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

## YK250XGC

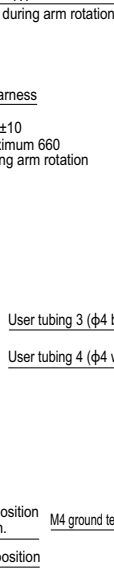
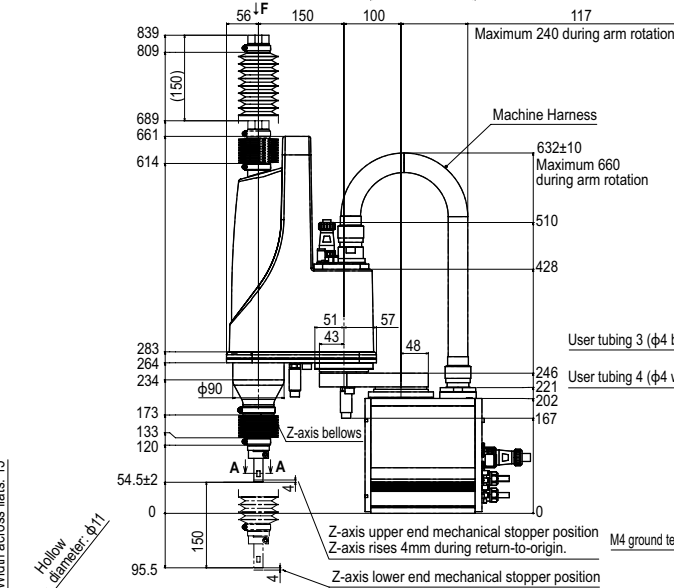
Connector for user wiring (No.1 to 10 usable, cable clamp size: φ13.1 to15)  
 Cover with the caps provided when not used.



If the robot enters the inside from the inner limit of the working envelope, the Z-axis bellows may be in contact with the base or the arm may be in contact with the machine harness. So, do not perform such motion.  
 If the robot enters the inside of R40, the Z-axis bellows may be in contact with the base. So, do not perform such motion.

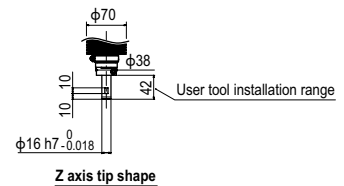
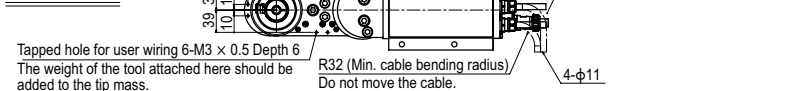


• Note that the robot cannot be used at a position where the base flange, robot cable, spline, bellows, and tool flange interfere with each other in the working envelope shown above.  
 • X-axis mechanical stopper position : 131°  
 • Y-axis mechanical stopper position : 136°

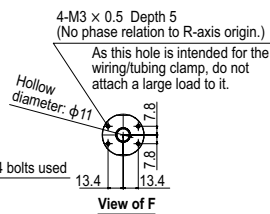
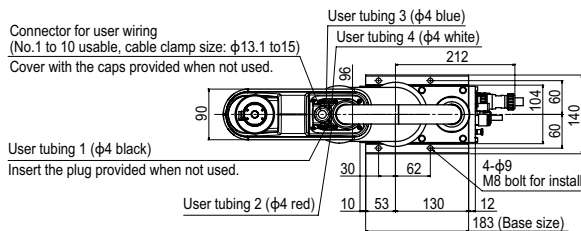


User tubing 1 (φ4 black)  
 Insert the plug provided when not used.  
 User tubing 2 (φ4 red)  
 Since this port is not used, cover it with the cap supplied with the joint.  
 Connector for user wiring (No.1 to 10 usable, cable clamp size: φ13.1 to15)  
 Cover with the caps provided when not used.

### Cross section A-A

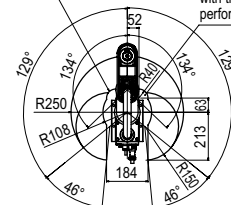


## YK250XGC Tool flange mount type

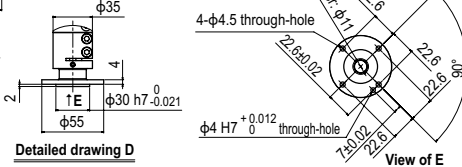
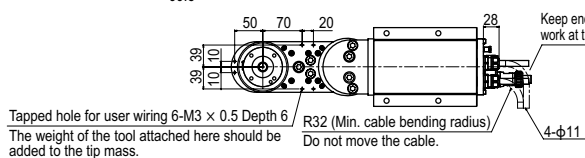
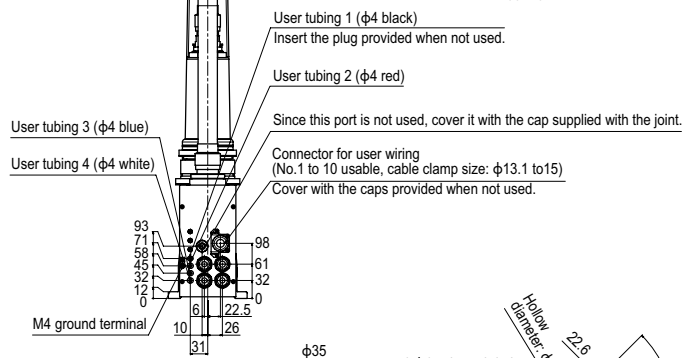
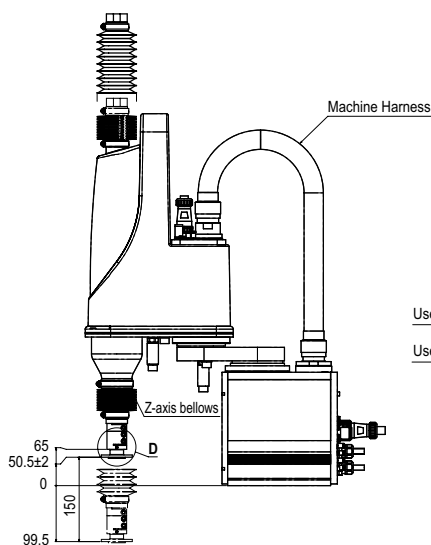


If the robot enters the inside from the inner limit of the working envelope, the Z-axis bellows may be in contact with the base or the arm may be in contact with the machine harness. So, do not perform such motion.

If the robot enters the inside of R40, the Z-axis bellows may be in contact with the base. So, do not perform such motion.



- Note that the robot cannot be used at a position where the base flange, robot cable, spline, bellows, and tool flange interfere with each other in the working envelope shown above.
- X-axis mechanical stopper position : 131°
- Y-axis mechanical stopper position : 136°





# YK350XGC

Clean type: Small type

- Arm length 350mm
- Maximum payload 4kg

## Ordering method

**YK350XGC - 150**

<b>Model</b>	<b>Z axis stroke</b> 150: 150mm	<b>Tool flange</b> No entry: None F: With tool flange	<b>Hollow shaft</b> S: With hollow shaft	<b>Cable length</b> 3L: 3.5m 5L: 5m 10L: 10m
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**S**

**RCX340-4**

<b>Controller / Number of controllable axes</b>	<b>Safety standard</b>	<b>Option A (OP.A)</b>	<b>Option B (OP.B)</b>	<b>Option C (OP.C)</b>	<b>Option D (OP.D)</b>	<b>Option E (OP.E)</b>	<b>Absolute battery</b>
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Specify various controller setting items. RCX340 ▶ **P544**

**RCX240S**

<b>Controller</b>	<b>CE Marking</b>	<b>Expansion I/O</b>	<b>Network option</b>	<b>iVY System</b>	<b>Gripper</b>	<b>Battery</b>
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Specify various controller setting items. RCX240/RCX240S ▶ **P534**

## Basic specifications

	X axis	Y axis	Z axis	R axis
<b>Axis specifications</b>				
<b>Arm length (mm)</b>	200	150	150	-
<b>Rotation angle (°)</b>	+/-129	+/-134	-	+/-360
<b>AC servo motor output (W)</b>	200	150	50	100
<b>Repeatability</b> <sup>Note 1</sup> (XYZ: mm) (R: °)	+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>	5.6		1.1	1020
<b>Maximum payload (kg)</b>	4			
<b>Standard cycle time: with 2kg payload (sec)</b> <sup>Note 2</sup>	0.57			
<b>R-axis tolerable moment of inertia</b> <sup>Note 3</sup> (kgm <sup>2</sup> )	0.05			
<b>User wiring (sq × wires)</b>	0.2×10			
<b>User tubing (Outer diameter)</b>	φ4×4			
<b>Travel limit</b>	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Weight (kg)</b>	22			
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO 14644-1) <sup>Note 4</sup> +ESD <sup>Note 5</sup>			
<b>Intake air (Nl/min)</b>	30 <sup>Note 6</sup>			

- Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. When reciprocating 25mm in vertical direction and 300mm in horizontal direction (rough-positioning arch motion).  
 Note 3. There are limits to acceleration coefficient settings. See P.609.  
 Note 4. Class 10 (0.1µm) equivalent to FED-STD-209D  
 Note 5. ESD (ElectroStatic Discharge) prevention is an option. Please contact our distributor.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

## Controller

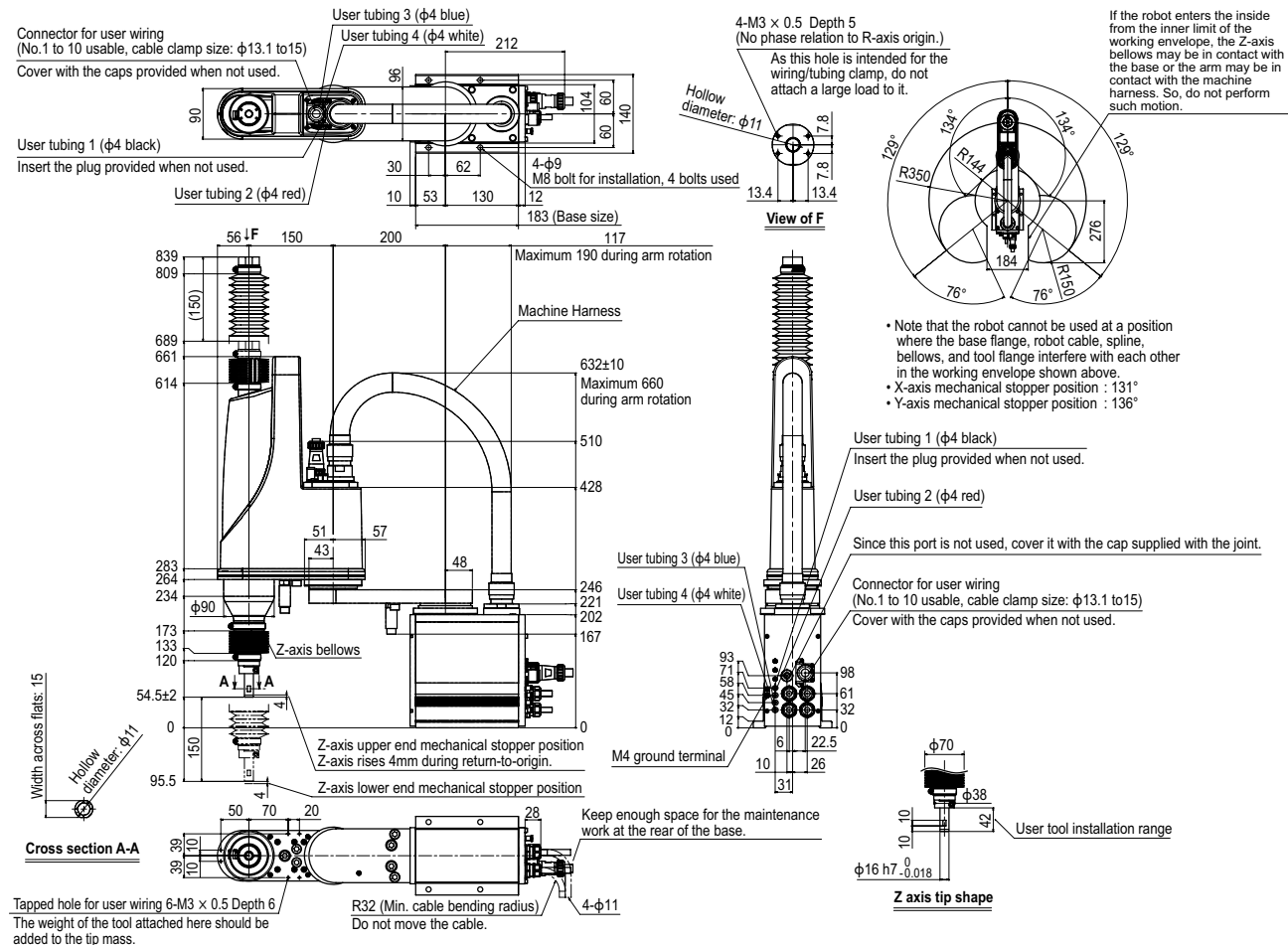
Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	1000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
 See our robot manuals (installation manuals) for detailed information.

Note. To set the standard coordinates with high accuracy, use a standard coordinate setting jig (option). Refer to the user's manual (installation manual) for more details.

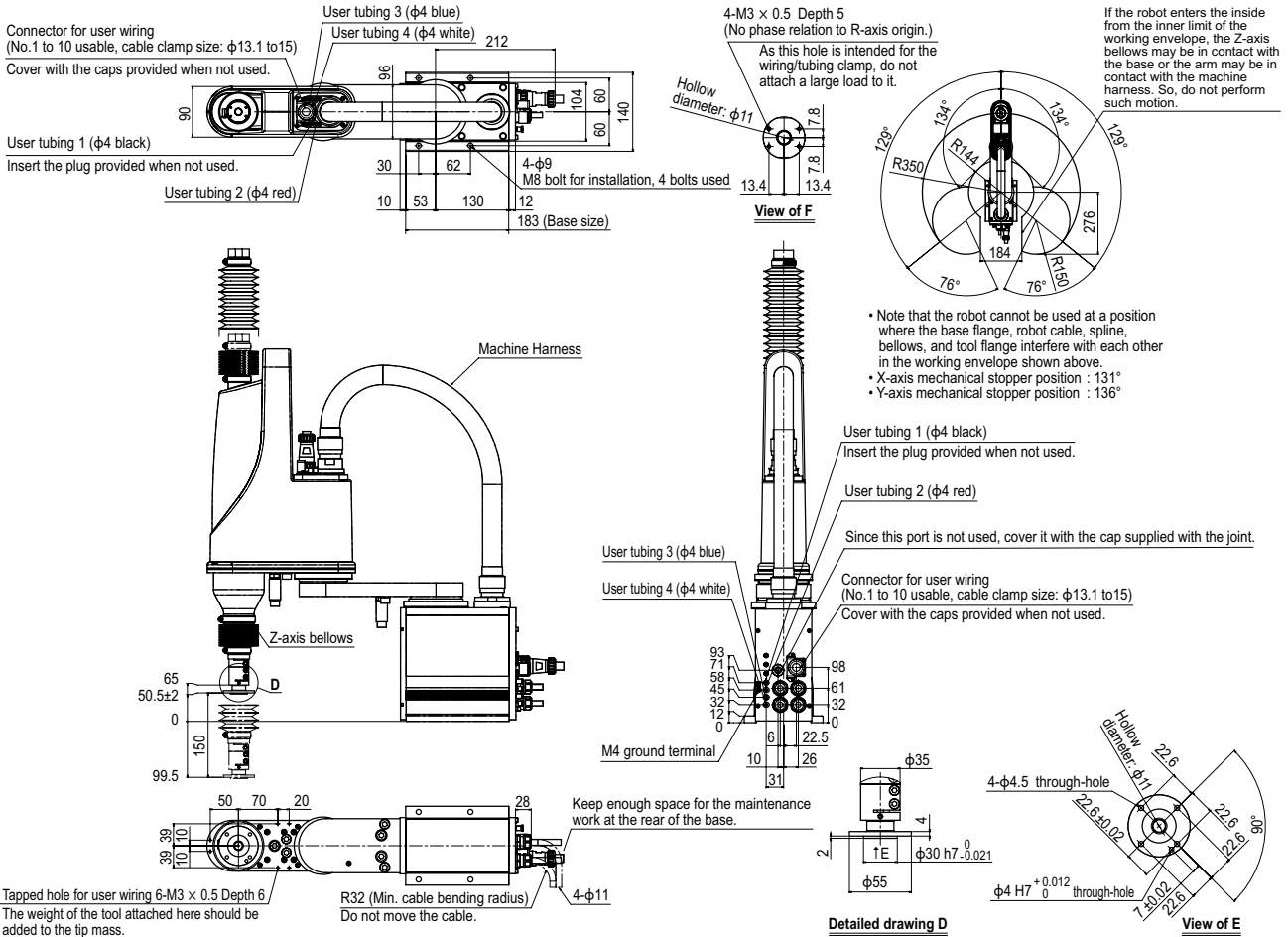
Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

## YK350XGC





YK350XGC Tool flange mount type



# YK400XGC

Clean type: Small type



- Arm length 400mm
- Maximum payload 4kg

## Ordering method

**YK400XGC - 150** **S** **RCX340-4**

Model: Z axis stroke 150: 150mm; Tool flange: No entry: None, F: With tool flange; Hollow shaft: S: With hollow shaft; Cable length: 3L: 3.5m, 5L: 5m, 10L: 10m

Controller / Number of controllable axes: RCX340-4; Safety standard; Option A (OP.A); Option B (OP.B); Option C (OP.C); Option D (OP.D); Option E (OP.E); Absolute battery

Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240S**

Controller; CE Marking; Expansion I/O; Network option; IVY System; Gripper; Battery

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis	R axis
<b>Axis specifications</b>				
Arm length (mm)	250	150	150	-
Rotation angle (°)	+/-129	+/-144	-	+/-360
<b>AC servo motor output (W)</b>	200	150	50	100
<b>Repeatability</b> <sup>Note 1</sup> (XYZ: mm) (R: °)	+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed</b> (XYZ: m/sec) (R: °/sec)	6.1		1.1	1020
<b>Maximum payload (kg)</b>	4			
<b>Standard cycle time: with 2kg payload (sec)</b> <sup>Note 2</sup>	0.57			
<b>R-axis tolerable moment of inertia</b> <sup>Note 3</sup> (kgm <sup>2</sup> )	0.05			
<b>User wiring (sq x wires)</b>	0.2x10			
<b>User tubing (Outer diameter)</b>	φ4x4			
<b>Travel limit</b>	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>	Standard: 3.5 Option: 5, 10			
<b>Weight (kg)</b>	22.5			
<b>Degree of cleanliness</b>	ISO CLASS 3 (ISO 14644-1) <sup>Note 4+ESD</sup> <sup>Note 5</sup>			
<b>Intake air (Nl/min)</b>	30 <sup>Note 6</sup>			

## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	1000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

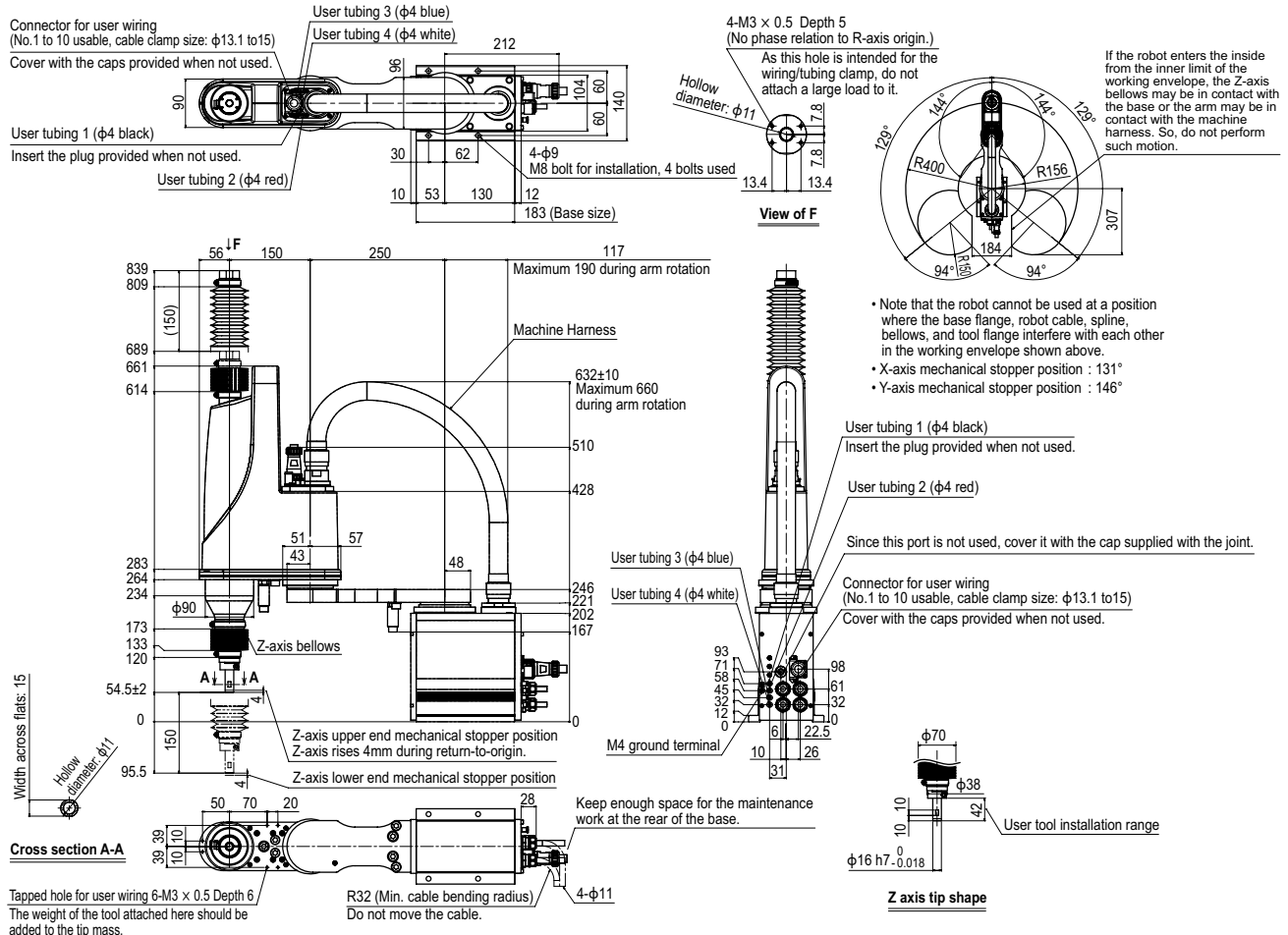
Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
See our robot manuals (installation manuals) for detailed information.

Note. To set the standard coordinates with high accuracy, use a standard coordinate setting jig (option). Refer to the user's manual (installation manual) for more details.

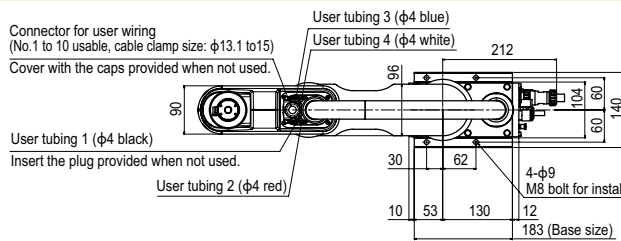
Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
Note 2. When reciprocating 25mm in vertical direction and 300mm in horizontal direction (rough-positioning arch motion).  
Note 3. There are limits to acceleration coefficient settings. See P.610.  
Note 4. Class 10 (0.1µm) equivalent to FED-STD-209D  
Note 5. ESD (ElectroStatic Discharge) prevention is an option. Please contact our distributor.  
Note 6. The necessary intake amount varies depending on the use conditions and environment.

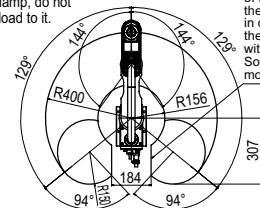
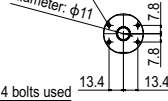
## YK400XGC



## YK400XGC Tool flange mount type

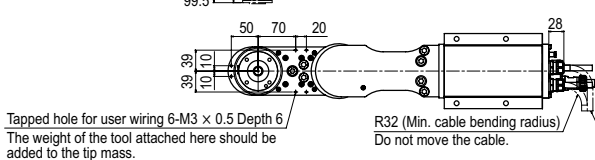
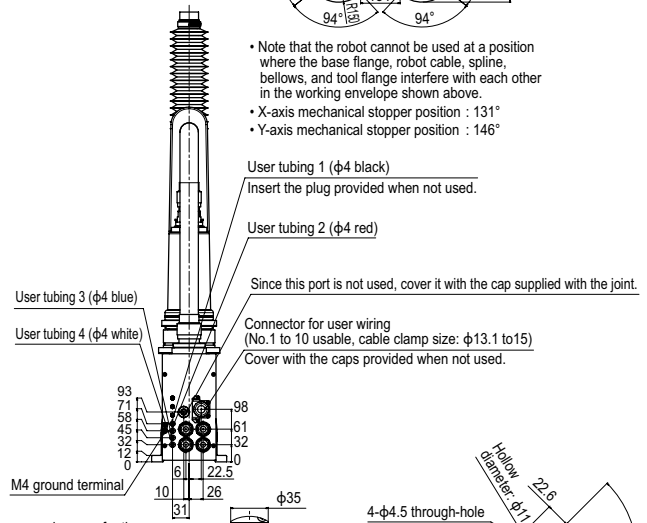
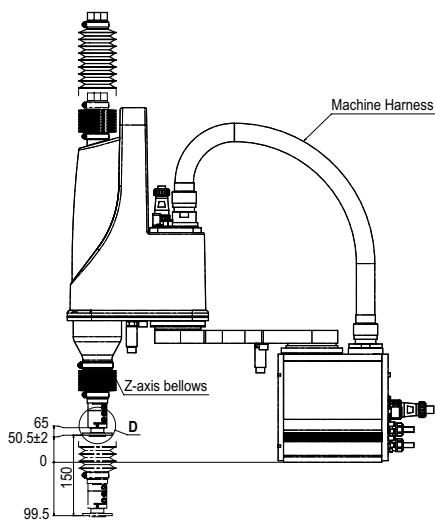


4-M3  $\times$  0.5 Depth 5  
(No phase relation to R-axis origin.)  
As this hole is intended for the wiring/tubing clamp, do not attach a large load to it.



If the robot enters the inside from the inner limit of the working envelope, the Z-axis bellows may be in contact with the base or the arm may be in contact with the machine harness. So, do not perform such motion.

- Note that the robot cannot be used at a position where the base flange, robot cable, spline, bellows, and tool flange interfere with each other in the working envelope shown above.
- X-axis mechanical stopper position :  $131^\circ$
- Y-axis mechanical stopper position :  $146^\circ$



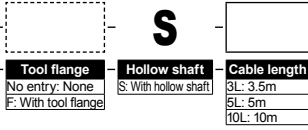
# YK500XGLC

Clean type: Medium type

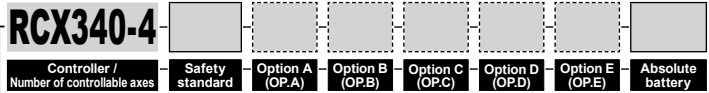
- Arm length 500mm
- Maximum payload 4kg

## Ordering method

**YK500XGLC - 150**

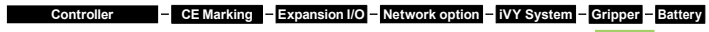


**S**



Specify various controller setting items. RCX340 ▶ P.544

**RCX240S**



Specify various controller setting items. RCX240/RCX240S ▶ P.534

## Basic specifications

Axis specifications	Arm length (mm)	X axis	Y axis	Z axis	R axis
	Rotation angle (°)	+/-129	+/-144	-	+/-360
<b>AC servo motor output (W)</b>		200	150	50	100
<b>Repeatability<sup>Note 1</sup> (XYZ: mm) (R: °)</b>		+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>		5.1		1.1	1020
<b>Maximum payload (kg)</b>		4			
<b>Standard cycle time: with 2kg payload (sec)<sup>Note 2</sup></b>		0.74			
<b>R-axis tolerable moment of inertia<sup>Note 3</sup> (kgm<sup>2</sup>)</b>		0.05			
<b>User wiring (sq x wires)</b>		0.2x10			
<b>User tubing (Outer diameter)</b>		φ4x4			
<b>Travel limit</b>		1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>		Standard: 3.5 Option: 5, 10			
<b>Weight (kg)</b>		25			
<b>Degree of cleanliness</b>		ISO CLASS 3 (ISO 14644-1) <sup>Note 4</sup> +ESD <sup>Note 5</sup>			
<b>Intake air (Nl/min)</b>		30 <sup>Note 6</sup>			

- Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. When reciprocating 25mm in vertical direction and 300mm in horizontal direction (rough-positioning arch motion).  
 Note 3. There are limits to acceleration coefficient settings. See P.610.  
 Note 4. Class 10 (0.1µm) equivalent to FED-STD-209D  
 Note 5. ESD (ElectroStatic Discharge) prevention is an option. Please contact our distributor.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

## Controller

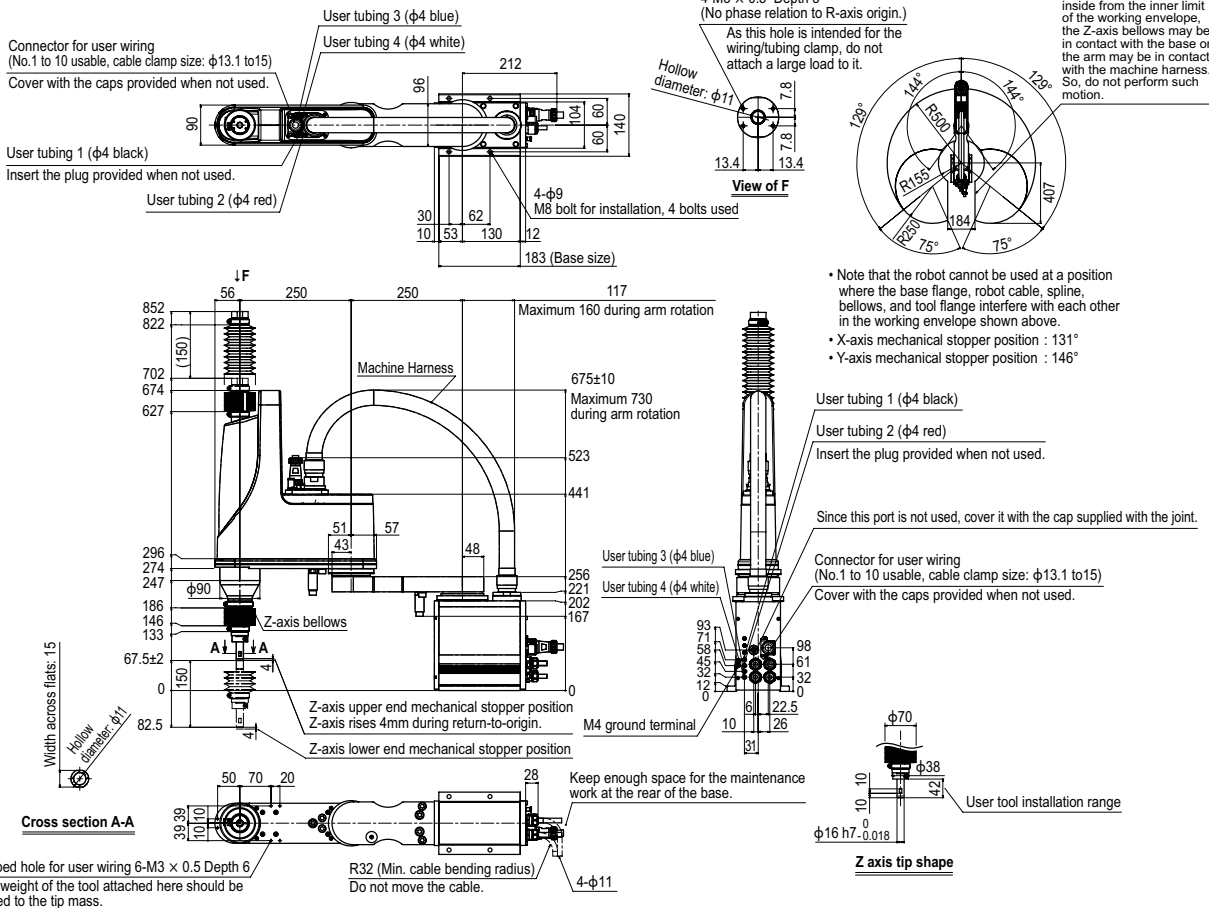
Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	1000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
 See our robot manuals (installation manuals) for detailed information.

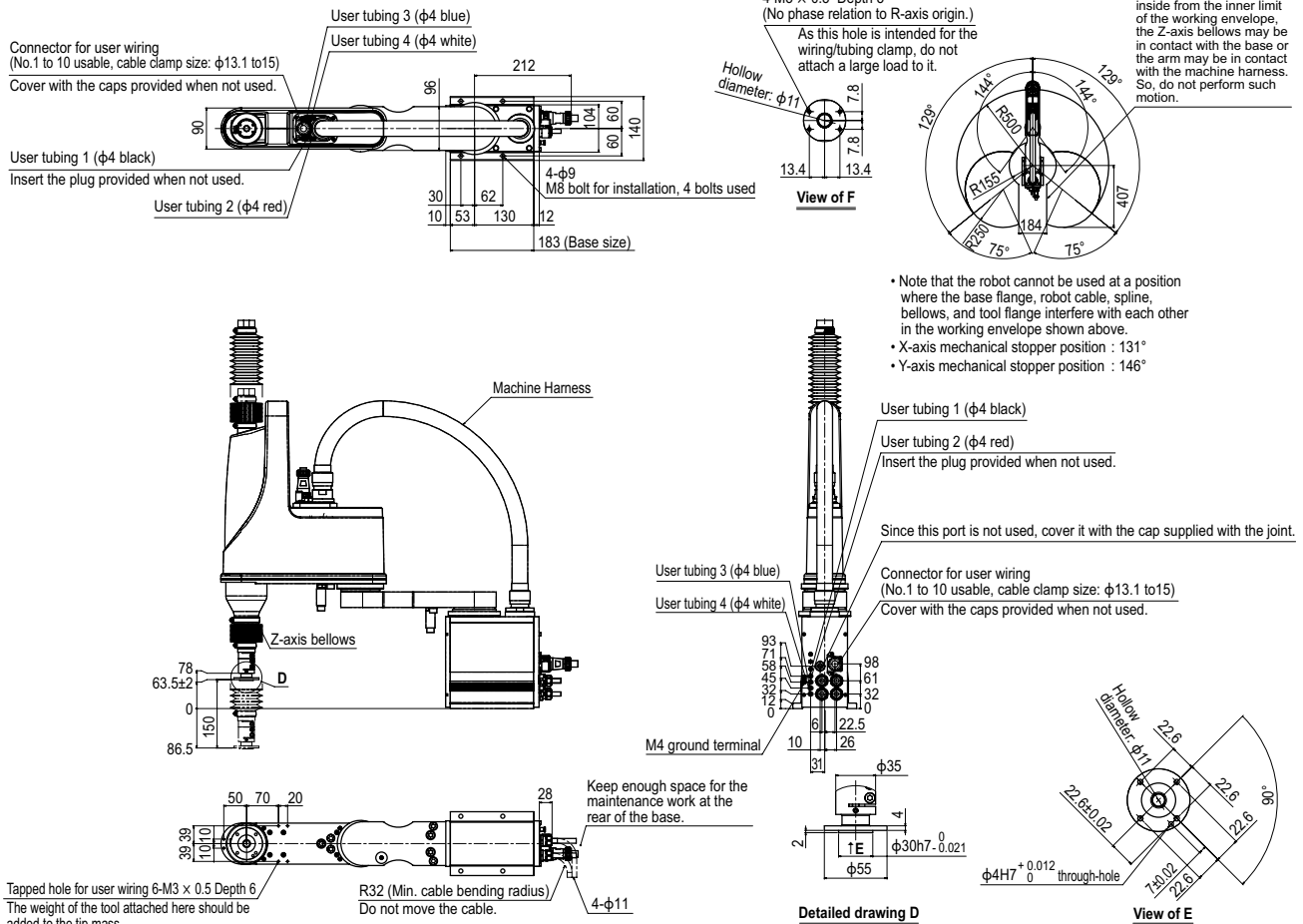
Note. To set the standard coordinates with high accuracy, use a standard coordinate setting jig (option). Refer to the user's manual (installation manual) for more details.

Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
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## YK500XGLC



YK500XGLC Tool flange mount type



# YK500XC

Clean type: Medium type



- Arm length 500mm
- Maximum payload 10kg

## Ordering method

**YK500XC**   **RCX340-4**

Model	Z axis stroke	Cable length	Controller / Number of controllable axes	Safety standard	Option A (OP.A)	Option B (OP.B)	Option C (OP.C)	Option D (OP.D)	Option E (OP.E)	Absolute battery
	200: 200mm 300: 300mm	3L: 3.5m 5L: 5m 10L: 10m								

Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240**  **R**

Controller	CE Marking	Regenerative unit	Expansion I/O	Network option	IVY System	Gripper	Battery

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

Axis specifications	Arm length (mm)	X axis	Y axis	Z axis	R axis
Rotation angle (°)		+/-120	+/-142	-	+/-180
AC servo motor output (W)		400	200	200	100
Repeatability <sup>Note 1</sup> (XYZ: mm) (R: °)		+/-0.02		+/-0.01	+/-0.005
Maximum speed (XYZ: m/sec) (R: °/sec)		4.9		1.7	876
Maximum payload (kg)		10			
Standard cycle time: with 2kg payload (sec)		0.53			
R-axis tolerable moment of inertia <sup>Note 2</sup> (kgm <sup>2</sup> )		0.12			
User wiring (sq x wires)		0.2 x 20			
User tubing (Outer diameter)		φ6 x 3			
Travel limit		1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
Robot cable length (m)		Standard: 3.5 Option: 5, 10			
Weight (kg)		31			
Degree of cleanliness		CLASS 10 <sup>Note 3</sup>			
Intake air (Nl/min)		60 <sup>Note 4</sup>			

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. There are limits to acceleration coefficient settings.  
 Note 3. Per 1cf (0.1μm base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

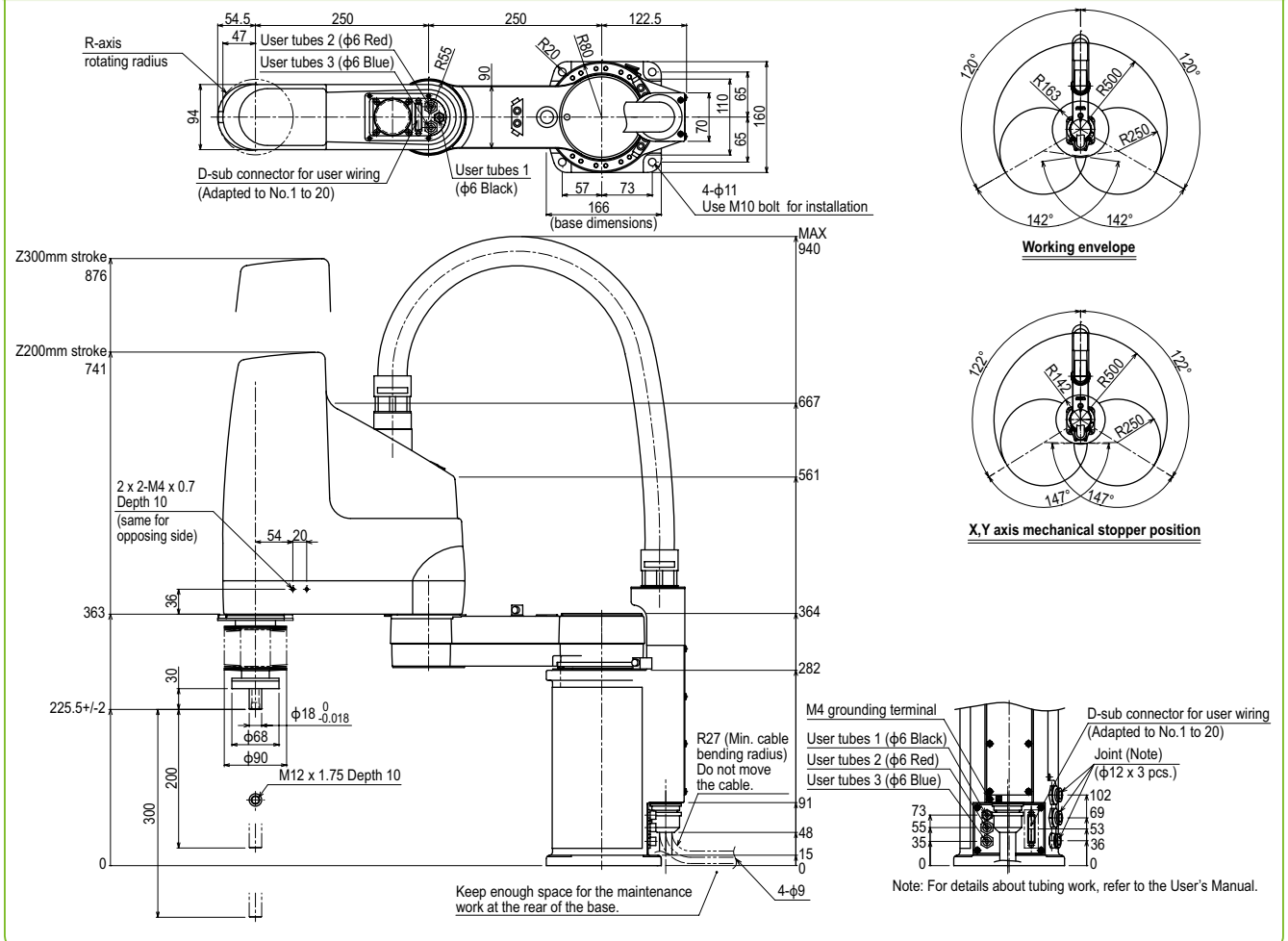
## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240-R	1500	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
 See our robot manuals (installation manuals) for detailed information.

Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

## YK500XC





# YK600XGLC

Clean type: Medium type

- Arm length 600mm
- Maximum payload 4kg

## Ordering method

**YK600XGLC - 150**

<b>Model</b>	<b>Z axis stroke</b> 150: 150mm	<b>Tool flange</b> No entry: None F: With tool flange	<b>Hollow shaft</b> S: With hollow shaft	<b>Cable length</b> 3L: 3.5m 5L: 5m 10L: 10m
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**S**

**RCX340-4**

<b>Controller / Number of controllable axes</b>	<b>Safety standard</b>	<b>Option A (OP.A)</b>	<b>Option B (OP.B)</b>	<b>Option C (OP.C)</b>	<b>Option D (OP.D)</b>	<b>Option E (OP.E)</b>	<b>Absolute battery</b>
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Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240S**

<b>Controller</b>	<b>CE Marking</b>	<b>Expansion I/O</b>	<b>Network option</b>	<b>IVY System</b>	<b>Gripper</b>	<b>Battery</b>
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Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

Axis specifications	Arm length (mm)	X axis	Y axis	Z axis	R axis
	Rotation angle (°)	+/-129	+/-144	-	+/-360
<b>AC servo motor output (W)</b>		200	150	50	100
<b>Repeatability<sup>Note 1</sup> (XYZ: mm) (R: °)</b>		+/-0.01		+/-0.01	+/-0.004
<b>Maximum speed (XYZ: m/sec) (R: °/sec)</b>		4.9		1.1	1020
<b>Maximum payload (kg)</b>		4			
<b>Standard cycle time: with 2kg payload (sec)<sup>Note 2</sup></b>		0.74			
<b>R-axis tolerable moment of inertia<sup>Note 3</sup> (kgm<sup>2</sup>)</b>		0.05			
<b>User wiring (sq x wires)</b>		0.2x10			
<b>User tubing (Outer diameter)</b>		φ4x4			
<b>Travel limit</b>		1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
<b>Robot cable length (m)</b>		Standard: 3.5 Option: 5, 10			
<b>Weight (kg)</b>		26			
<b>Degree of cleanliness</b>		ISO CLASS 3 (ISO 14644-1) <sup>Note 4</sup> +ESD <sup>Note 5</sup>			
<b>Intake air (Nl/min)</b>		30 <sup>Note 6</sup>			

- Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. When reciprocating 25mm in vertical direction and 300mm in horizontal direction (rough-positioning arch motion).  
 Note 3. There are limits to acceleration coefficient settings. See P.610.  
 Note 4. Class 10 (0.1μm) equivalent to FED-STD-209D  
 Note 5. ESD (ElectroStatic Discharge) prevention is an option. Please contact our distributor.  
 Note 6. The necessary intake amount varies depending on the use conditions and environment.

## Controller

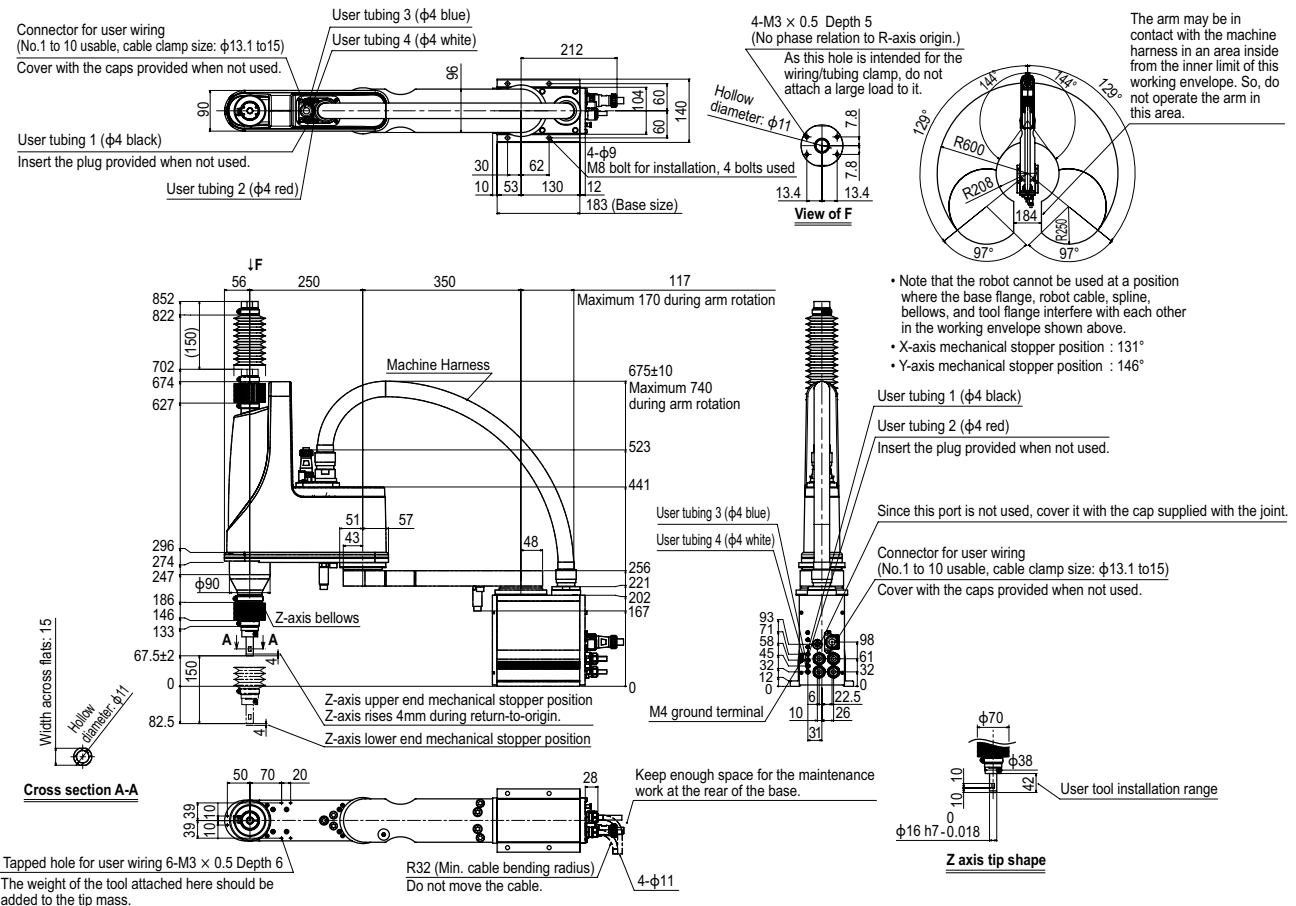
Controller	Power capacity (VA)	Operation method
RCX340 RCX240S	1000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.) See our robot manuals (installation manuals) for detailed information.

Note. To set the standard coordinates with high accuracy, use a standard coordinate setting jig (option). Refer to the user's manual (installation manual) for more details.

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## YK600XGLC



Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSERVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XX-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

CONTROLLER INFORMATION

Single-axis  
Cartesian  
SCARA

Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSEVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XY-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

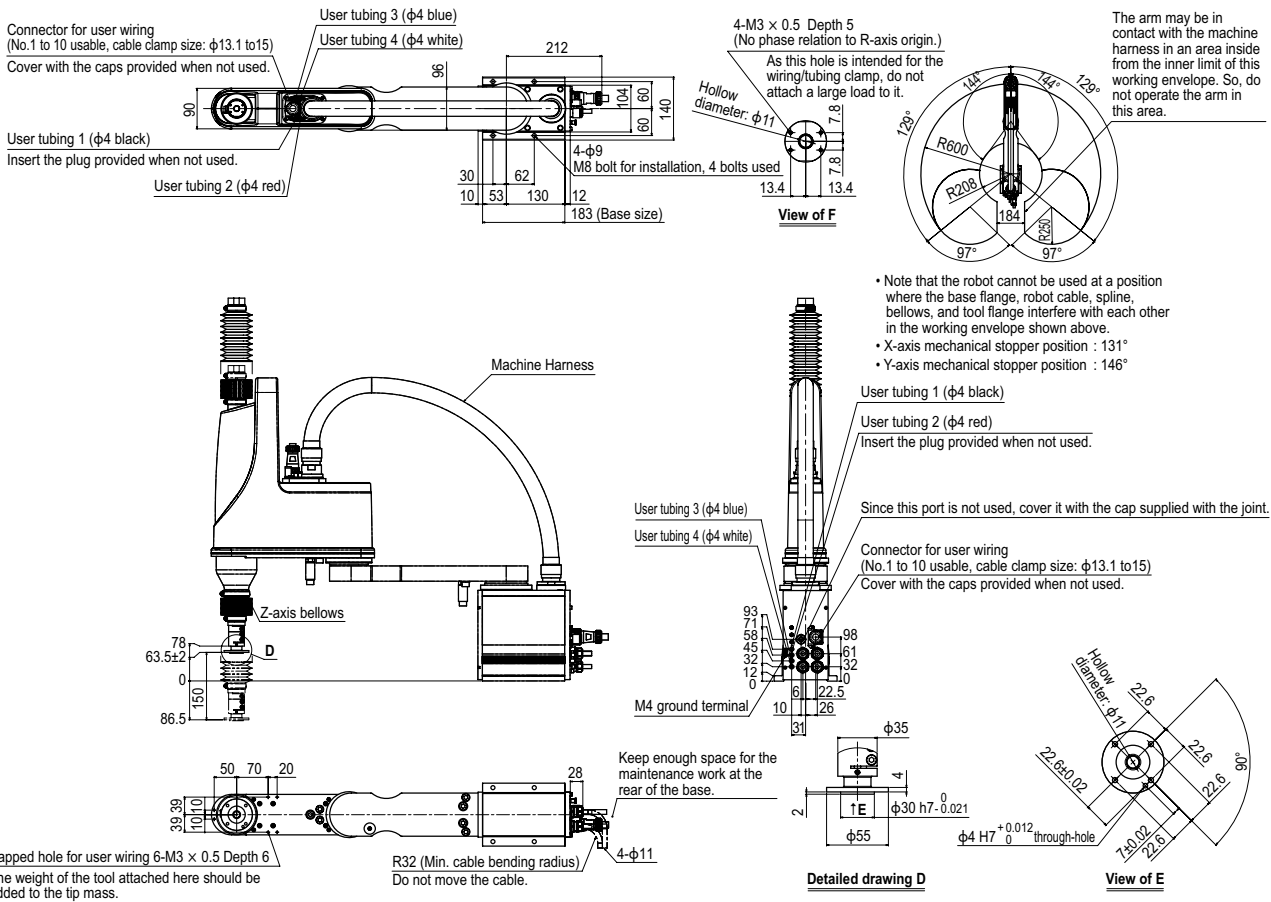
CONTROLLER INFORMATION

Single-axis

Cartesian

SCARA

## YK600XGLC Tool flange mount type



# YK600XC

Clean type: Medium type

- Arm length 600mm
- Maximum payload 10kg



## Ordering method

**YK600XC** [ ] [ ] **RCX340-4** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Model      Z axis stroke      Cable length      Controller / Number of controllable axes      Safety standard      Option A (OP.A)      Option B (OP.B)      Option C (OP.C)      Option D (OP.D)      Option E (OP.E)      Absolute battery

Z axis stroke: 200: 200mm, 300: 300mm  
Cable length: 3L: 3.5m, 5L: 5m, 10L: 10m

**Specify various controller setting items. RCX340 ▶ P.544**

**RCX240** [ ] **R** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Controller      CE Marking      Regenerative unit      Expansion I/O      Network option      iVY System      Gripper      Battery

**Specify various controller setting items. RCX240/RCX240S ▶ P.534**

## Basic specifications

Axis specifications	Arm length (mm)	X axis	Y axis	Z axis	R axis
Rotation angle (°)		+/-120	+/-145	-	+/-180
AC servo motor output (W)		400	200	200	100
Repeatability <sup>Note 1</sup> (XYZ: mm) (R: °)		+/-0.02		+/-0.01	+/-0.005
Maximum speed (XYZ: m/sec) (R: °/sec)		5.6		1.7	876
Maximum payload (kg)		10			
Standard cycle time: with 2kg payload (sec)		0.56			
R-axis tolerable moment of inertia <sup>Note 2</sup> (kgm <sup>2</sup> )		0.12			
User wiring (sq x wires)		0.2 x 20			
User tubing (Outer diameter)		φ6 x 3			
Travel limit		1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
Robot cable length (m)		Standard: 3.5 Option: 5, 10			
Weight (kg)		33			
Degree of cleanliness		CLASS 10 <sup>Note 3</sup>			
Intake air (Nl/min)		60 <sup>Note 4</sup>			

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. There are limits to acceleration coefficient settings.  
 Note 3. Per 1cf (0.1μm base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

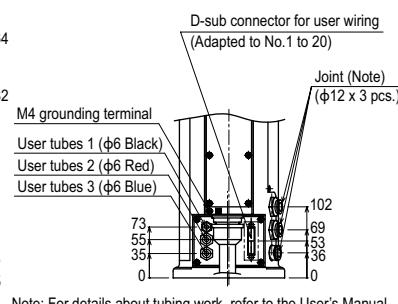
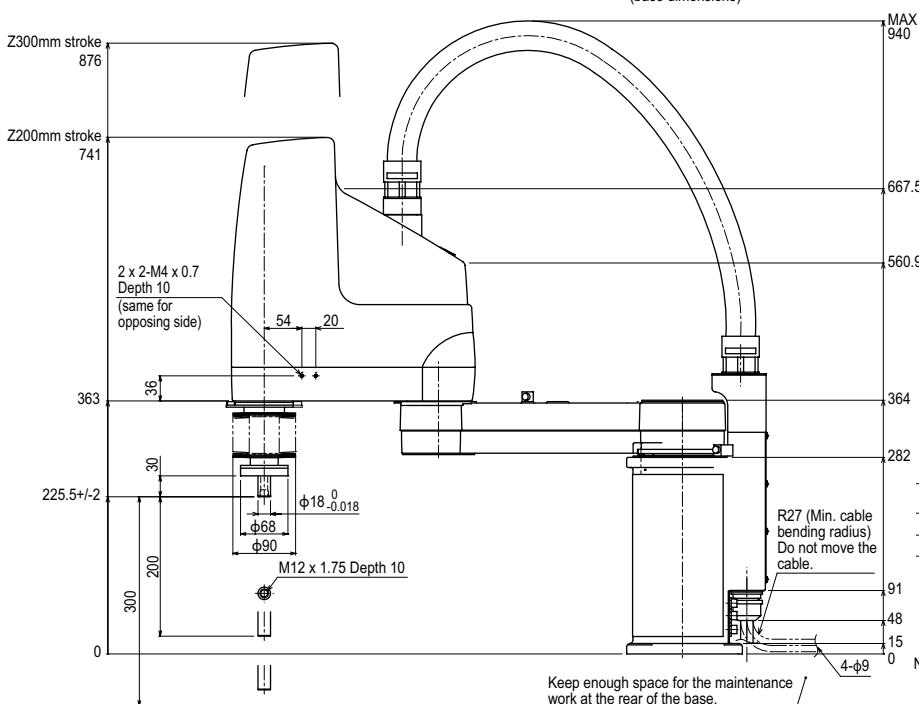
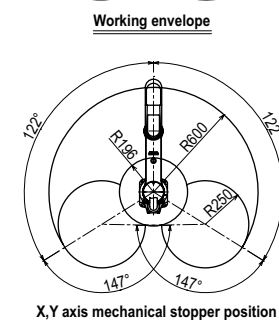
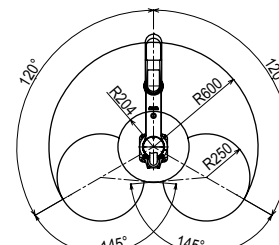
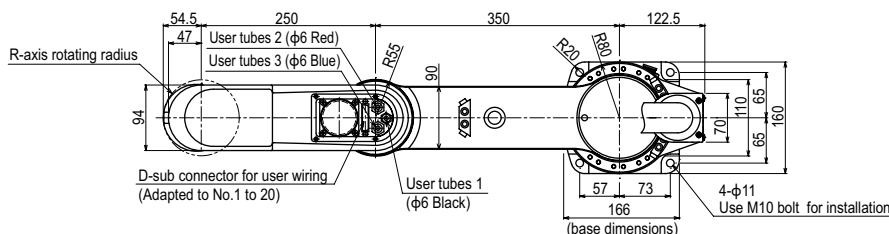
## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240-R	1500	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
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## YK600XC



Note: For details about tubing work, refer to the User's Manual.

Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSEVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XX-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

CONTROLLER INFORMATION

Single-axis  
Cartesian

SCARA

# YK700XC

Clean type: Large type



- Arm length 700mm
- Maximum payload 20kg

## Ordering method

**YK700XC** [ ] [ ] **RCX340-4** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Model      Z axis stroke      Cable length      Controller / Number of controllable axes      Safety standard      Option A (OP.A)      Option B (OP.B)      Option C (OP.C)      Option D (OP.D)      Option E (OP.E)      Absolute battery

Z axis stroke: 200: 200mm, 400: 400mm  
Cable length: 3L: 3.5m, 5L: 5m, 10L: 10m

**Specify various controller setting items. RCX340 ▶ P.544**

**RCX240** [ ] **R** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Controller      CE Marking      Regenerative unit      Expansion I/O      Network option      iVY System      Gripper      Battery

**Specify various controller setting items. RCX240/RCX240S ▶ P.534**

## Basic specifications

Axis specifications	Arm length (mm)	X axis	Y axis	Z axis	R axis
Rotation angle (°)		+/-120	+/-145	-	+/-180
AC servo motor output (W)		800	400	400	200
Repeatability <sup>Note 1</sup> (XYZ: mm) (R: °)		+/-0.02		+/-0.01	+/-0.005
Maximum speed (XYZ: m/sec) (R: °/sec)		6.7		1.7	600
Maximum payload (kg)		20			
Standard cycle time: with 2kg payload (sec)		0.57			
R-axis tolerable moment of inertia <sup>Note 2</sup> (kgm <sup>2</sup> )		0.32			
User wiring (sq x wires)		0.2 x 20			
User tubing (Outer diameter)		φ6 x 3			
Travel limit		1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
Robot cable length (m)		Standard: 3.5 Option: 5, 10			
Weight (kg)		57			
Degree of cleanliness		CLASS 10 <sup>Note 3</sup>			
Intake air (Nl/min)		60 <sup>Note 4</sup>			

## Controller

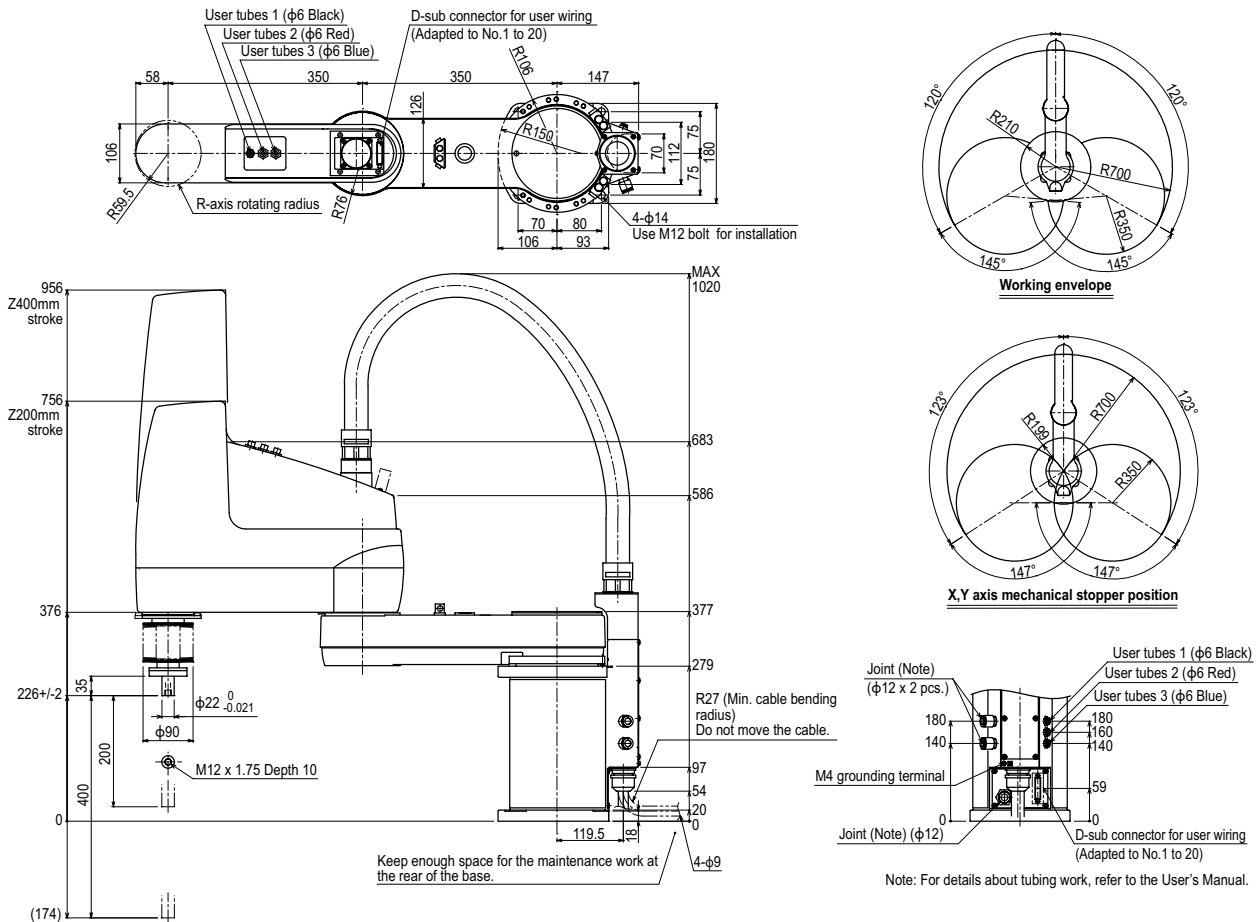
Controller	Power capacity (VA)	Operation method
RCX340 RCX240-R	2000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.) See our robot manuals (installation manuals) for detailed information.

Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
Note 2. There are limits to acceleration coefficient settings.  
Note 3. Per 1cf (0.1μm base), when suction blower is used.  
Note 4. The necessary intake amount varies depending on the use conditions and environment.

## YK700XC



# YK800XC

Clean type: Large type

- Arm length 800mm
- Maximum payload 20kg



## Ordering method

**YK800XC**

Model	Z axis stroke 200: 200mm 400: 400mm	Cable length 3L: 3.5m 5L: 5m 10L: 10m	<b>RCX340-4</b>							
			Controller / Number of controllable axes	Safety standard	Option A (OP.A)	Option B (OP.B)	Option C (OP.C)	Option D (OP.D)	Option E (OP.E)	Absolute battery

Specify various controller setting items. RCX340 ▶ **P.544**

<b>RCX240</b>	<b>R</b>								
Controller	CE Marking	Regenerative unit	Expansion I/O	Network option	IVY System	Gripper	Battery		

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis	R axis
Axis specifications				
Arm length (mm)	450	350	200 400	-
Rotation angle (°)	+/-120	+/-145	-	+/-180
AC servo motor output (W)	800	400	400	200
Repeatability <sup>Note 1</sup> (XYZ: mm) (R: °)	+/-0.02		+/-0.01	+/-0.005
Maximum speed (XYZ: m/sec) (R: °/sec)	7.3		1.7	600
Maximum payload (kg)	20			
Standard cycle time: with 2kg payload (sec)	0.57			
R-axis tolerable moment of inertia <sup>Note 2</sup> (kgm <sup>2</sup> )	0.32			
User wiring (sq x wires)	0.2 x 20			
User tubing (Outer diameter)	φ6 x 3			
Travel limit	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)			
Robot cable length (m)	Standard: 3.5 Option: 5, 10			
Weight (kg)	58			
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>			
Intake air (Nl/min)	60 <sup>Note 4</sup>			

Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. There are limits to acceleration coefficient settings.  
 Note 3. Per 1cf (0.1μm base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

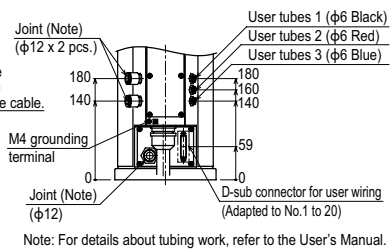
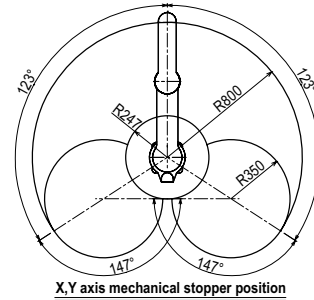
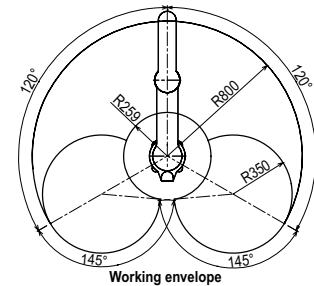
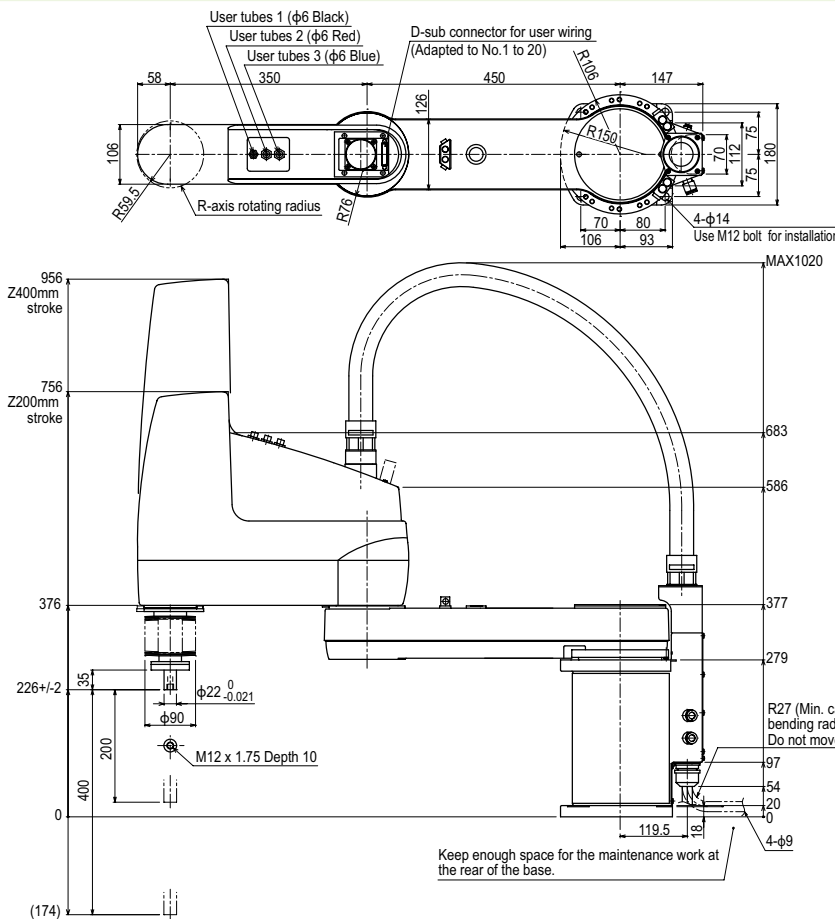
## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240-R	2000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.)  
 See our robot manuals (installation manuals) for detailed information.

Our robot manuals (installation manuals) can be downloaded from our website at the address below:  
<https://global.yamaha-motor.com/business/robot/>

## YK800XC



Articulated robots  
YA

Linear conveyor modules  
LCM100

Compact single-axis robots  
TRANSEVO

Single-axis robots  
FLIP-X

Linear motor single-axis robots  
PHASER

Cartesian robots  
XX-X

SCARA robots  
YK-X

Pick & place robots  
YP-X

CLEAN

CONTROLLER INFORMATION

Single-axis

Cartesian

SCARA



# YK1000XC

Clean type: Large type



- Arm length 1000mm
- Maximum payload 20kg

## Ordering method

**YK1000XC** [ ] [ ] **RCX340-4** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Model	Z axis stroke	Cable length	Controller / Number of controllable axes	Safety standard	Option A (OP.A)	Option B (OP.B)	Option C (OP.C)	Option D (OP.D)	Option E (OP.E)	Absolute battery
	200: 200mm 400: 400mm	3L: 3.5m 5L: 5m 10L: 10m								

Specify various controller setting items. RCX340 ▶ **P.544**

**RCX240** [ ] **R** [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ] [ ]

Controller	CE Marking	Regenerative unit	Expansion I/O	Network option	IVY System	Gripper	Battery

Specify various controller setting items. RCX240/RCX240S ▶ **P.534**

## Basic specifications

	X axis	Y axis	Z axis		R axis
Axis specifications			200	400	-
Arm length (mm)	550	450			
Rotation angle (°)	+/-120	+/-145			+/-180
AC servo motor output (W)	800	400	400		200
Repeatability <sup>Note 1</sup> (XYZ: mm) (R: °)	+/-0.02		+/-0.01		+/-0.005
Maximum speed (XYZ: m/sec) (R: °/sec)	8.0		1.7		600
Maximum payload (kg)			20		
Standard cycle time: with 2kg payload (sec)			0.60		
R-axis tolerable moment of inertia <sup>Note 2</sup> (kgm <sup>2</sup> )			0.32		
User wiring (sq x wires)			0.2 x 20		
User tubing (Outer diameter)			φ6 x 3		
Travel limit	1.Soft limit, 2.Mechanical stopper (X, Y, Z axes)				
Robot cable length (m)	Standard: 3.5 Option: 5, 10				
Weight (kg)	59				
Degree of cleanliness	CLASS 10 <sup>Note 3</sup>				
Intake air (Nl/min)	60 <sup>Note 4</sup>				

## Controller

Controller	Power capacity (VA)	Operation method
RCX340 RCX240-R	2000	Programming / I/O point trace / Remote command / Operation using RS-232C communication

Note. The movement range can be limited by changing the positions of X and Y axis mechanical stoppers. (The movement range is set to the maximum at the time of shipment.) See our robot manuals (installation manuals) for detailed information.

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Note 1. This is the value at a constant ambient temperature. (X,Y axes)  
 Note 2. There are limits to acceleration coefficient settings.  
 Note 3. Per 1cf (0.1μm base), when suction blower is used.  
 Note 4. The necessary intake amount varies depending on the use conditions and environment.

## YK1000XC

