QJRB15-1



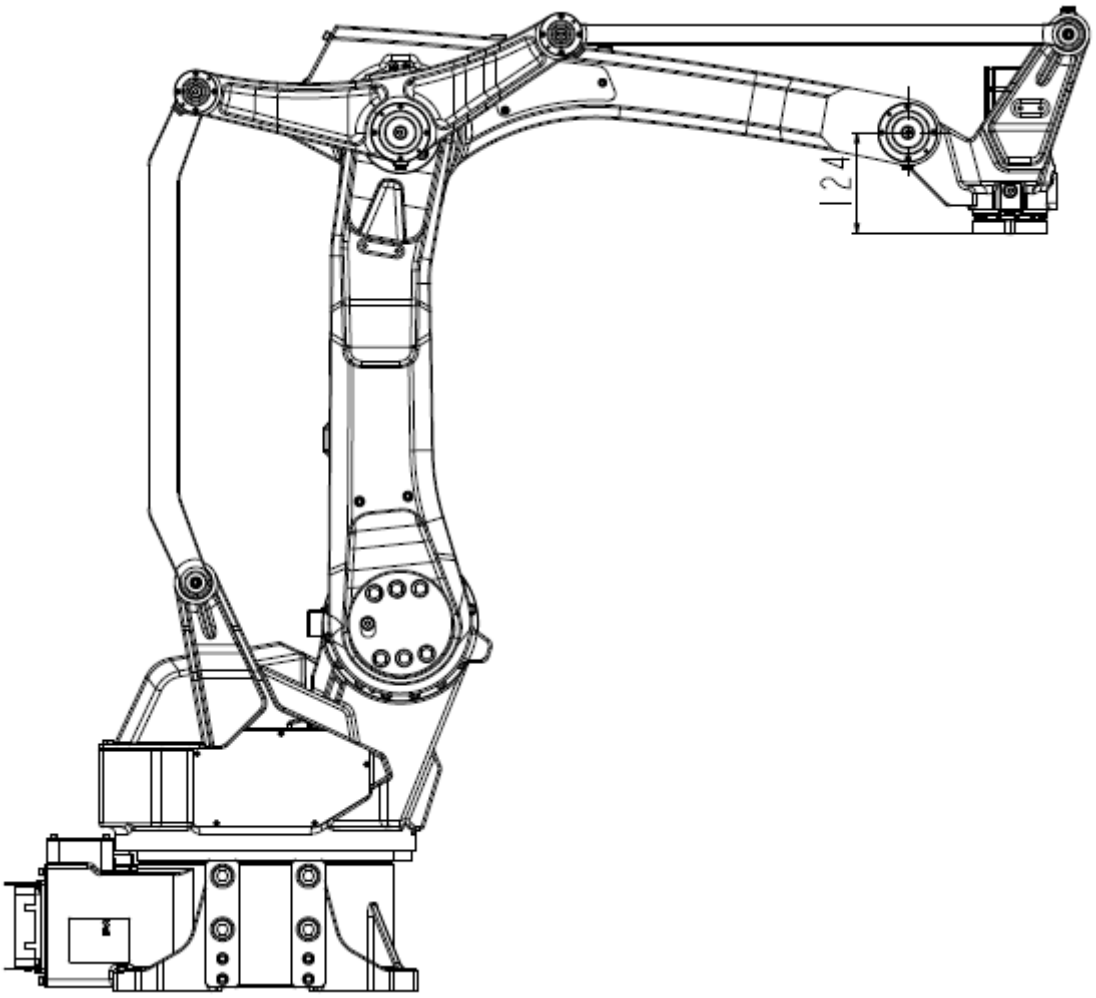
Authorized distributor HASKOM Automation s.r.o.
Find out more at qjar.eu

Specifications and Drawings of QJRB15-1

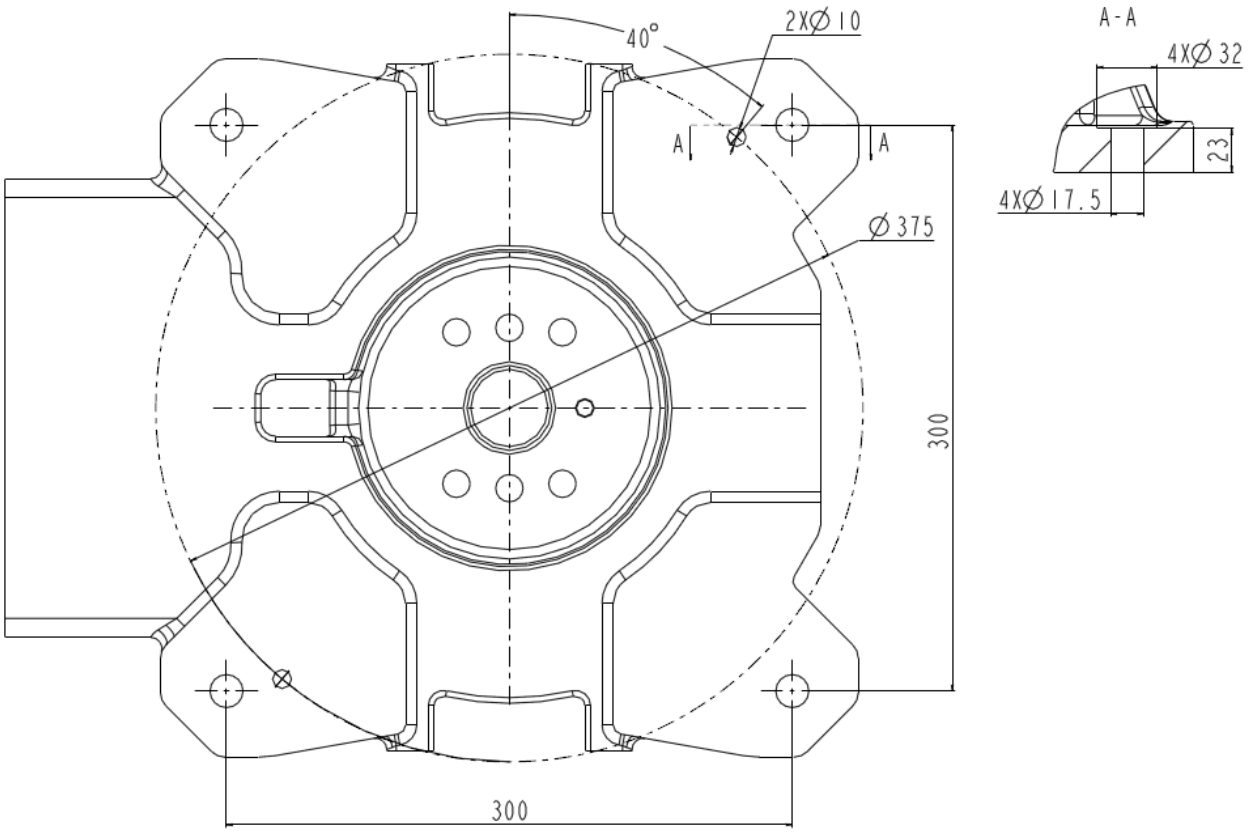
I. QJRB15-1 Robot basic specification table

QJRB15-1Basic specification sheet			
Body shape		Vertical multiarticular	
Degrees of freedom		4	
The payload		15kg	
Arm span		1510mm	
Repeated positioning accuracy ^2		±0.05mm	
Mechanical limit range	1axis	±168°	
	2axis	+105° , -50°	
	3axis	+105° , -25°	
	4axis	±360°	
Maximum speed	1axis	3.7 rad/s	211 °/s
	2axis	3.7 rad/s	211 °/s
	3axis	4.2 rad/s	240 °/s
	4axis	10 rad/s	572 °/s
Maximum acceleration	1axis	12rad/s2	687 °/s^2
	2axis	12rad/s2	687 °/s^2
	3axis	30 rad/s2	1145 °/s^2
	4axis	60 rad/s2	3437 °/s^2
Allow the torque	4axis	29.4 N.m	
Inertia moment	4axis	0.6 kg.m2	
Body weight		160 kg	
Protection level		IP30/IP65	
Installation environment	temperature	0~45 ℃	
	humidity	20%~80% RH(No condensation)	
	vibration	<4.9m/s2 (0.5G)	
	other	Avoid flammable, corrosive gases and liquids; Avoid contact with water, oil, dust, etc. Keep away from electrical noise sources.	
The power capacity		2.7kVA	

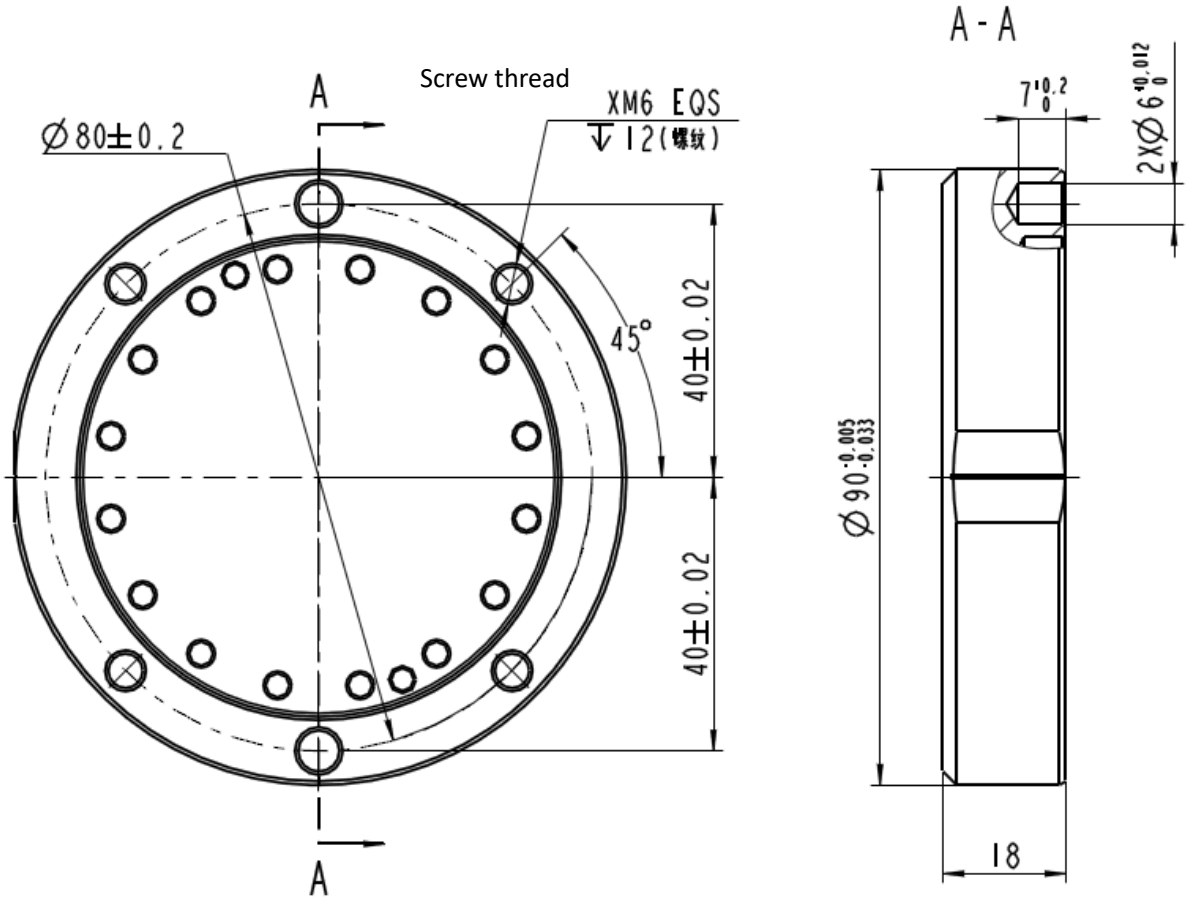
II. QJRB15-1 Diagram of the robot's overall size and maximum motion range



III. QJRB15-1 Robot base mounting dimension drawing

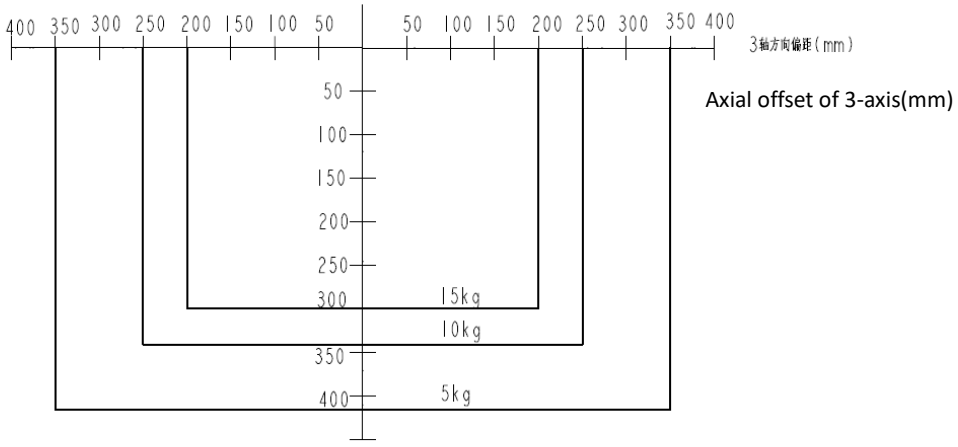


IV. QJRB15-1 Installation dimension drawing of robot end



V. QJRB15-1 Load capacity diagram

The center of 4 axis is zero point

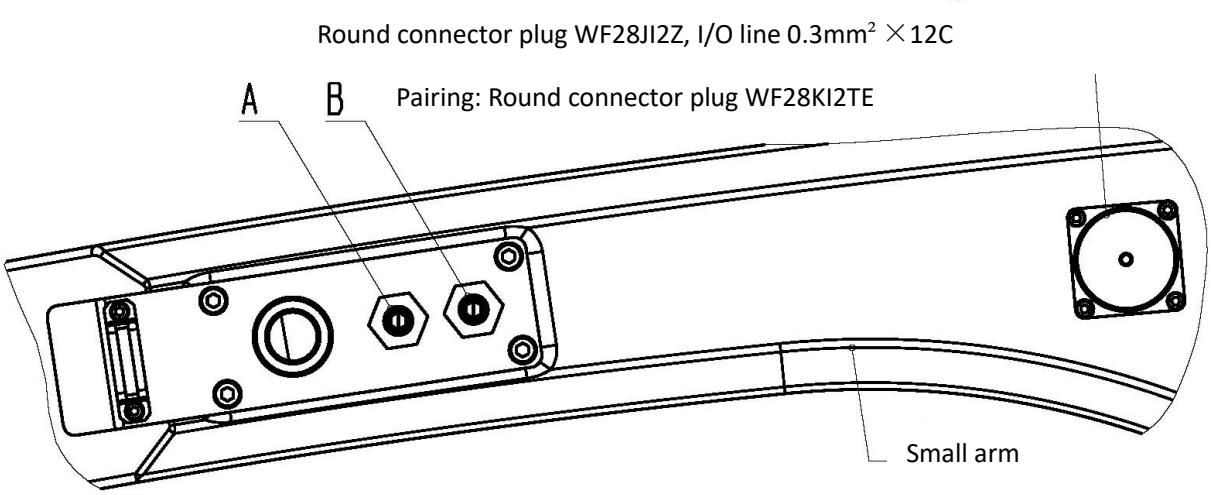


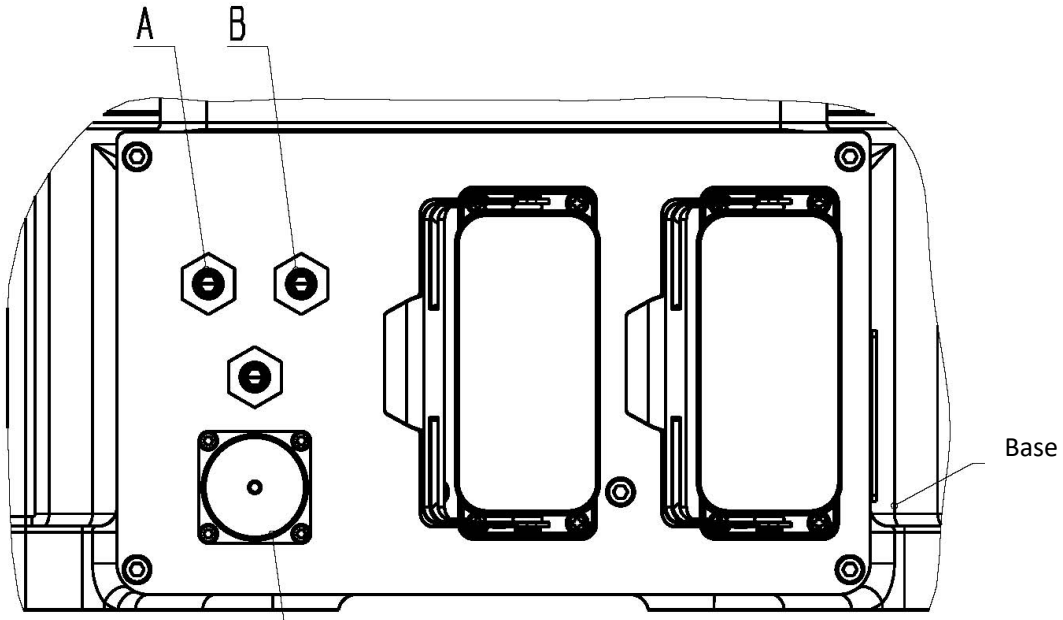
Axial offset of 3-axis(mm)

Axial offset of 4-axis(mm)

VI. Schematic diagram of robot reserved gas path and I / O interface position

1. Protection level IP30 status :

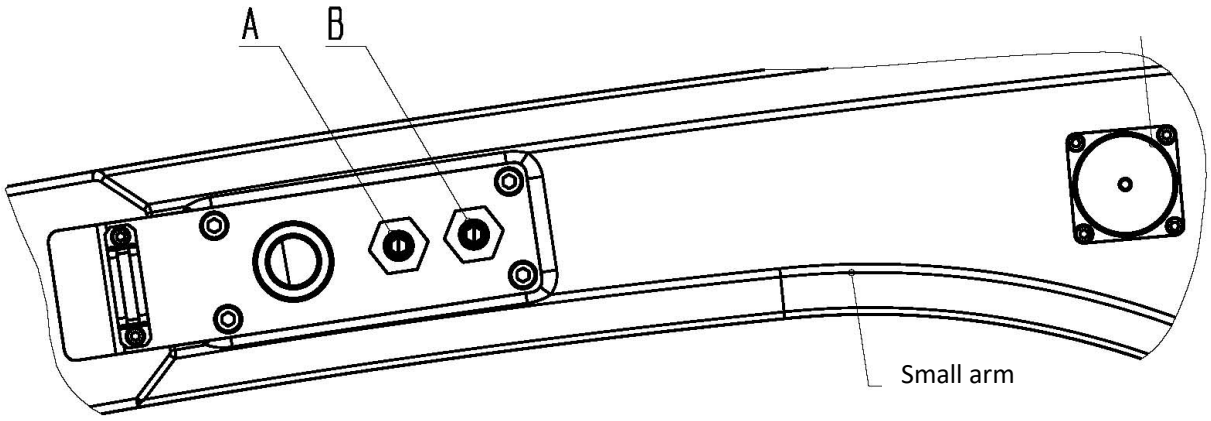


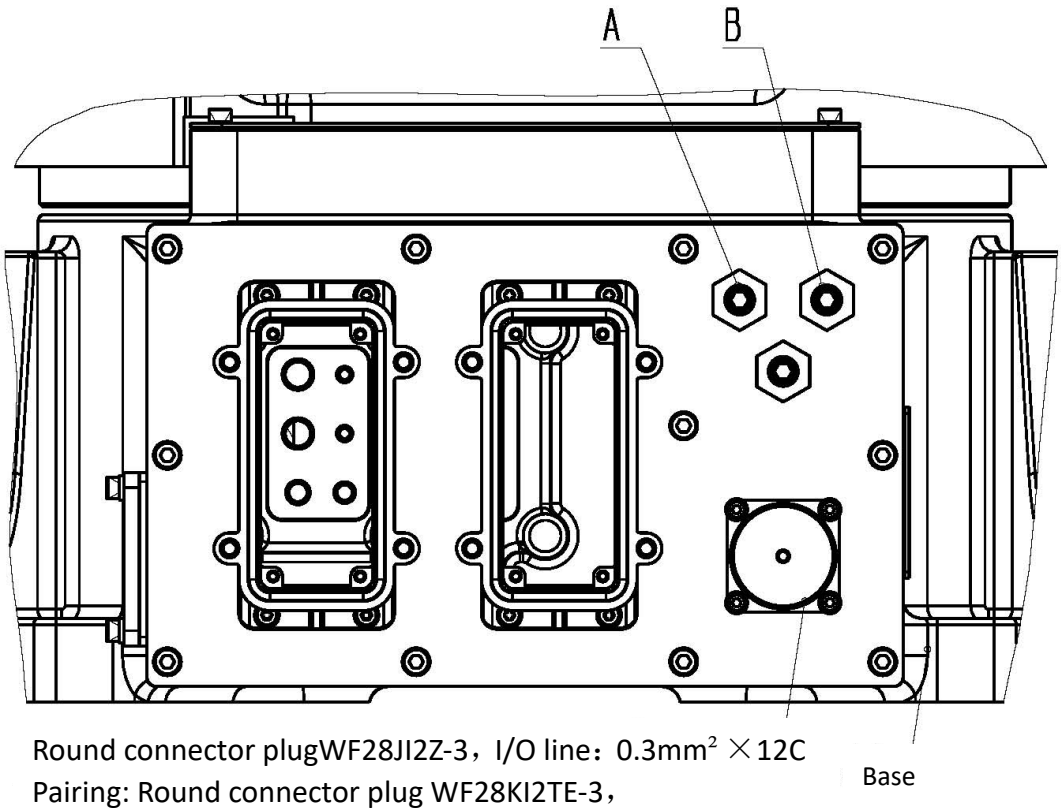


Round connector plugWF28JI2Z-3，I/O line：0.3mm² ×12C
Pairing: Round connector plug WF28KI2TE-3，
10A cold pressing female YK1.5-20.4-1.OAU
（1.OAU is optional according to the need）
explain:
1、Base A and B are air inlet, RI/8 screw thread, with cone plug, the external diameter is Φ8mm
2、Small arm A and B are air outlet, RI/8 screw thread, with cone plug, the external diameter is Φ8mm
3、Base and the small arm position circular connector plug are connected in the same position

2. Protection level IP65 status：

Round connector plugWF28JI2Z-3，I/O line：0.3mm^2 ×12C
Pairing: Round connector plug WF28KI2TE





Round connector plugWF28JI2Z-3，I/O line：0.3mm^2 ×12C
Pairing: Round connector plug WF28KI2TE-3，
10A cold pressing female YK1.5-20.4-1.OAU
（1.OAU is optional according to the need）
explain:
4、Base A and B are air inlet, RI/8 screw thread, with cone plug, the external diameter is Φ8mm
5、Small arm A and B are air outlet, RI/8 screw thread, with cone plug, the external diameter is Φ8mm
6、Base and the small arm position circular connector plug are connected in the same position

VII. QJRB15-1 Configuration table of robot products

QIRB15-1 Configuration table of robot products	
Motor	TAMAGAWA/Gaohuachuangke
RV Reducer	Nabtesco/Chinese reducer
Harmonic reducer	Shimpo
Controller	QJAR
Drive	Tsino dynatron

VIII. QJRB15-1 Controller cabinet

QJRB15-1 controller cabinet	
Control hardware	QJAR controller
Control cabinet software	QJAR pulse operation system
Power Supply	Single phase AC220V(+10%,-10%)
Rated power	4.2KW
Power capacity	2.7KVA
Size of control cabinet	580x600x960mm
Weight of control cabinet	100kg
ambient temperature	0-45℃
Maximum humidity	20%~80% RH (no condensation)
Protection level	IP54
operation panel	On the control cabinet
Programming unit	Color touch screen teaching box
Security	Emergency stop, automatic mode stop, remote mode stop
Input and output	Digital IO ,15 input, 21 output

QJRB15-1 controller cabinet	
Control hardware	QJAR controller
Control cabinet software	QJAR Bus operating system
Power Supply	Three phase four wire AC380V (+ 10%, - 10%)
Rated power	4.2KW
Power capacity	2.7KVA
Size of control cabinet	580x600x960mm
Weight of control cabinet	100kg
ambient temperature	0-45℃
Maximum humidity	20%~80% RH (no condensation)
Protection level	IP21
operation panel	On the control cabinet
Programming unit	Color touch screen teaching box
Security	Emergency stop, automatic mode stop, remote mode stop
Input and output	Digital IO 15 input 21output

QJRB15-1 controller cabinet	
Control hardware	KEBA controller
Control cabinet software	KEBA system
Power Supply	Three phase four wire AC380V (+ 10%, - 10%)
Rated power	4.2KW
Power capacity	2.7KVA
Size of control cabinet	580x600x960mm
Weight of control cabinet	100kg
ambient temperature	0-45℃
Maximum humidity	20%~80% RH (no condensation)
Protection level	IP21
operation panel	On the control cabinet
Programming unit	Color touch screen teaching box
Security	Emergency stop, automatic mode stop, remote mode stop
Input and output	Digital IO 26 input 32 output