

并联机器人

选型手册

Parallel Robot Selection Manual

D5



• 型号和符号

	D5	1200	P2	A1	E1	FXGX
机型	型号	负载	控制器类型	控制柜类型	视觉	
D5	800	P2: 2kg P25: 25kg	A1: ATOMCONTROL A2: KEBA CONTROL	E1: ATOM-01 E2: ATOM-02 E3: 定制	F0G0: 无视觉 FXGX: 有视觉	
	1200					
	1600					

• Model and Symbol

	D5	1200	P2	A1	E1	FXGX
Robot type	Type	Load Type	Control Type	Control Cabinet	Vision Type	
D5	800	P2: 2kg P25: 25kg	A1: ATOMCONTROL A2: KEBA CONTROL	E1: ATOM-01 E2: ATOM-02 E3: Custom	F0G0: Without vision FXGX: With vision	
	1200					
	1600					

D5-800-P2



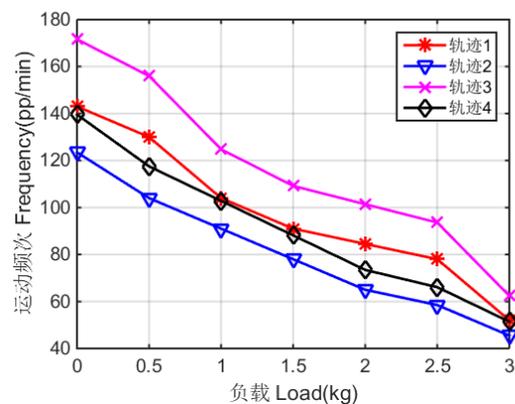
高速度
高精度
高稳定性
高自由度
小巧、敏捷

High speed
High precision
High stability
More degrees
Small and Agile

型号 Type		D5-800-P2
轴数 Axes		3+2
最大负载 Payload		2kg
机器人本体 Manipulator	重量 Weight	85kg
	工作空间直径 Diameter	800mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
俯仰范围 Vertical rotation range		±90°
允许负载最大旋转惯量 (水平旋转) Allowable maximum moment of inertia		$31 \times 10^{-4} \text{kg} \cdot \text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	36.5°
	下摆 Down	70.5°
输入电源 Power supply		三相 Three-phase 380VAC -10%~+10%, 49~61HZ
电源容量 Power capacity		3KVA
额定功率 Rated Power		2.7kw
保存温度 Storage temperature		-10°C~70°C
工作环境 Work environment		-10°C~50°C, RH≤80%
防护等级 Protection		IP55

- ◆ 具备3+2自由度，轻松满足复杂摆放场景。
With 3+2-DOF movement in three-dimensional space, robot can be used for more complicated handling operations
- ◆ 标准循环时间小于0.5s,满足追求最高速度和最小体积需求
The standard cycle time is less than 0.5s, meeting your pursuit for the maximum speed and the minimum volume.
- ◆ 特殊旋转轴铰链设计，轻松应对高强度高频次重复运动需求
Advanced design of Hooke joint in the rotational axis, enables the robot to easily cope with the high-intensity repetitive operation.
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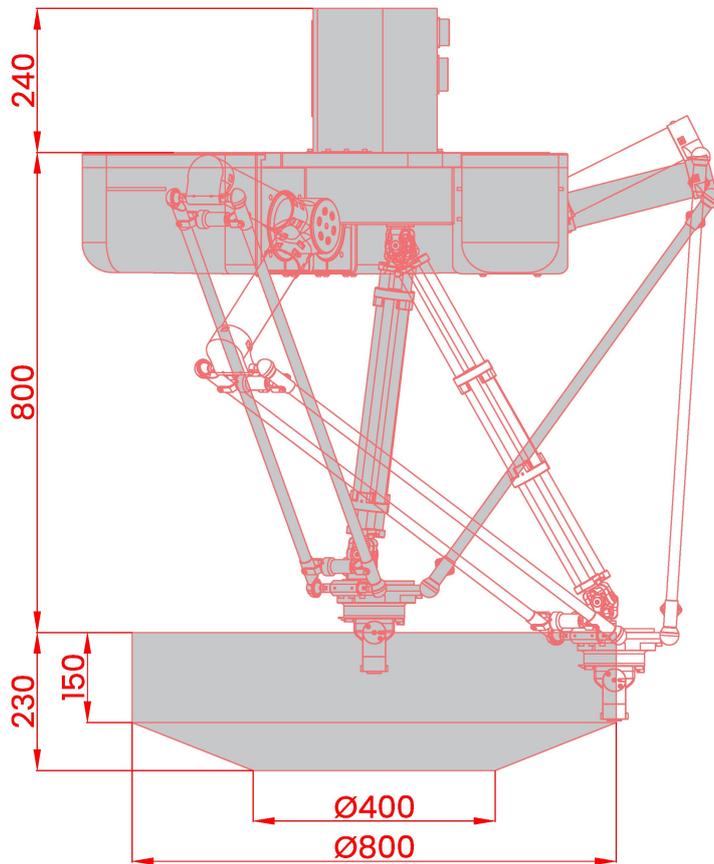
● 负载-频次 Load-Frequency



名称 Name	循环模式 Model	运动距离 Distance
轨迹1 Trajectory1	P1 → P2 → P3 → P4 → P3 → P2 → P1	h=25, b=305
轨迹2 Trajectory2	P1 → P2 → P3 → P4 → P3 → P2 → P1	h=25, b=500
轨迹3 Trajectory3	P1 → P2 → P3 → P2 → P1	h=25, b=305
轨迹4 Trajectory4	P1 → P2 → P3 → P2 → P1	h=25, b=500

特别注意：图中节拍时间在实际条件下测得，并且未包含俯仰运动，根据实际运用情况的不同（工具数据、路径半径、夹具启动等），节拍时间也会发生变化。

外形尺寸及运动范围
Outline dimensions and Working range (mm)



说明:

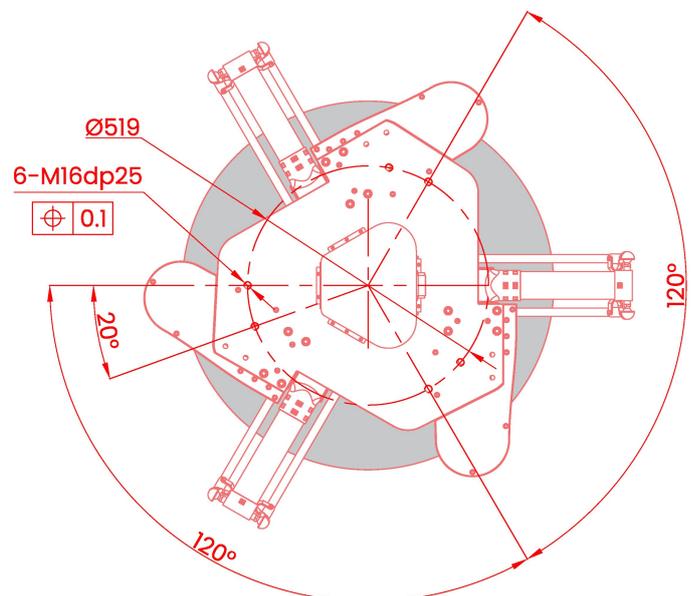
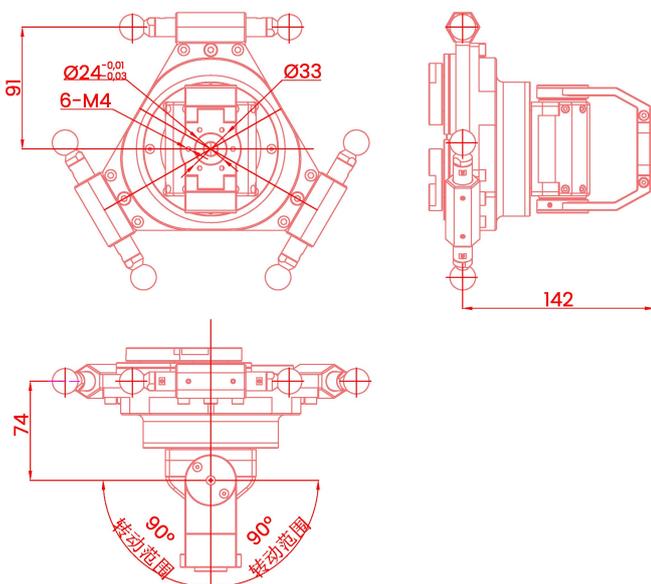
图示下部灰色工作空间代表末端俯仰转轴的中心点所能到达的区域。

Instruction:

The bottom gray workspace in the figure represents the area that can be reached by the center point of the end pitch axis.

法兰 Flange (mm)

底座安装 Base installation (mm)



D5-1200-P2



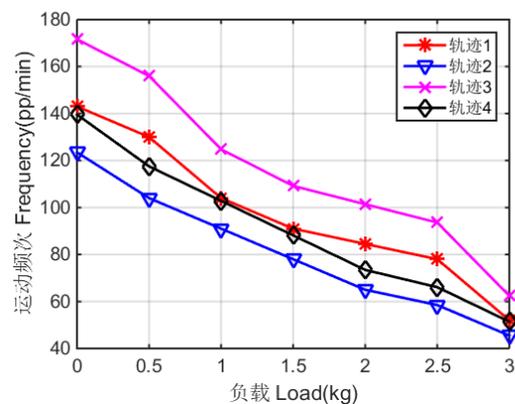
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型号 Type		D5-1200-P2
轴数 Axes		3+2
最大负载 Payload		2kg
机器人本体 Manipulator	重量 Weight	90kg
	工作空间直径 Diameter	1200mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
俯仰范围 Vertical rotation range		±90°
允许负载最大旋转惯量 (水平旋转) Allowable maximum moment of inertia		$31 \times 10^{-4} \text{kg} \cdot \text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	36.5°
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输入电源 Power supply		三相 Three-phase 380VAC -10%~+10%, 49~61HZ
电源容量 Power capacity		3KVA
额定功率 Rated Power		6.4kw
保存温度 Storage temperature		-10°C~70°C
工作环境 Work environment		-10°C~50°C, RH≤80%
防护等级 Protection		IP55

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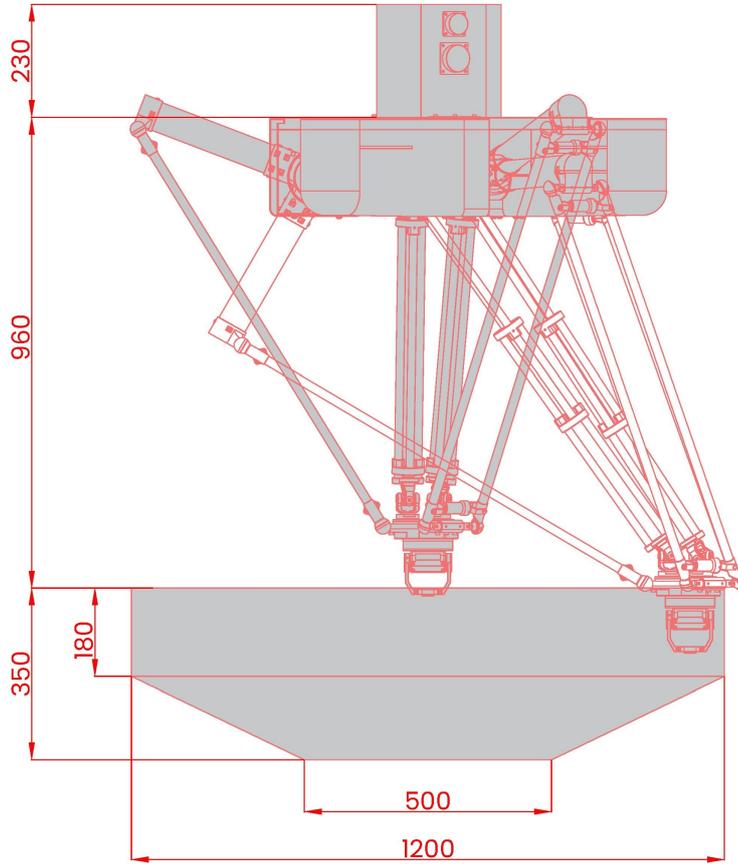
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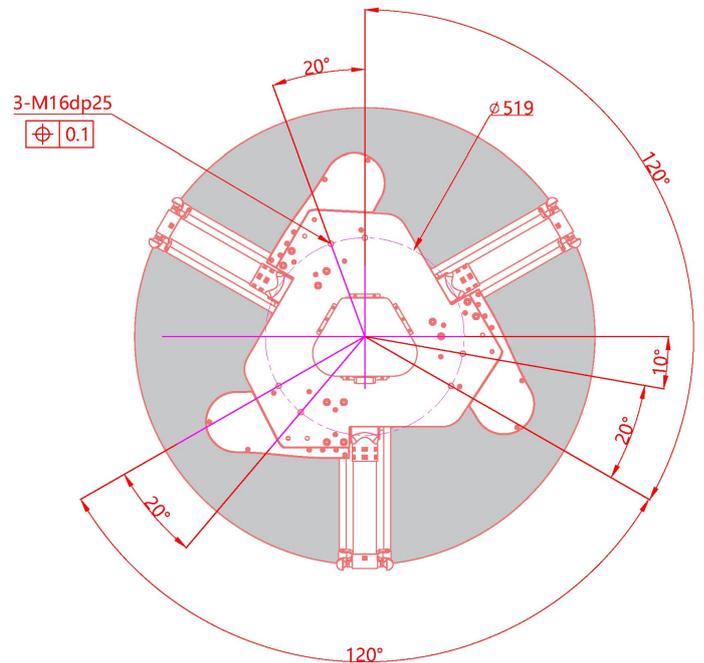
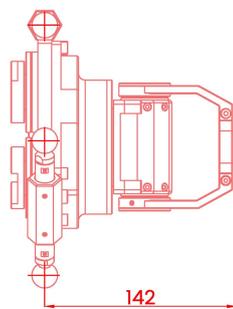
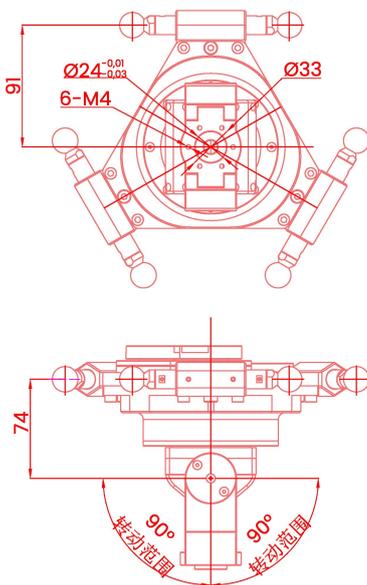
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Instruction:

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法兰 Flange (mm)

基座安装 Base installation (mm)



D5-P-1600-P25



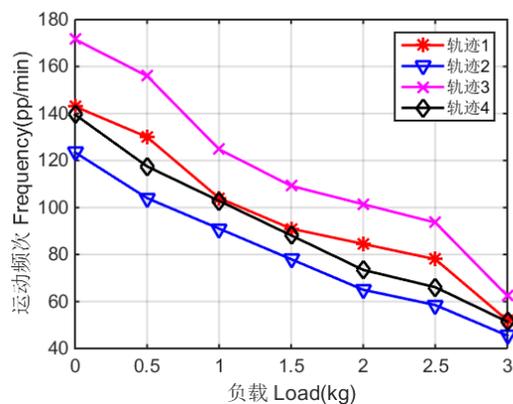
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型号 Type		D5-P-1600-P25
轴数 Axes		3+2
最大负载 Payload		25kg
机器人本体 Manipulator	重量 Weight	150kg
	工作空间直径 Diameter	1600mm
重复定位精度 repeatability	位置 Position	0.1mm
	旋转 Rotation	0.2°
四轴旋转范围 Rotation range		±360°
五轴旋转范围 Rotation range		±360°
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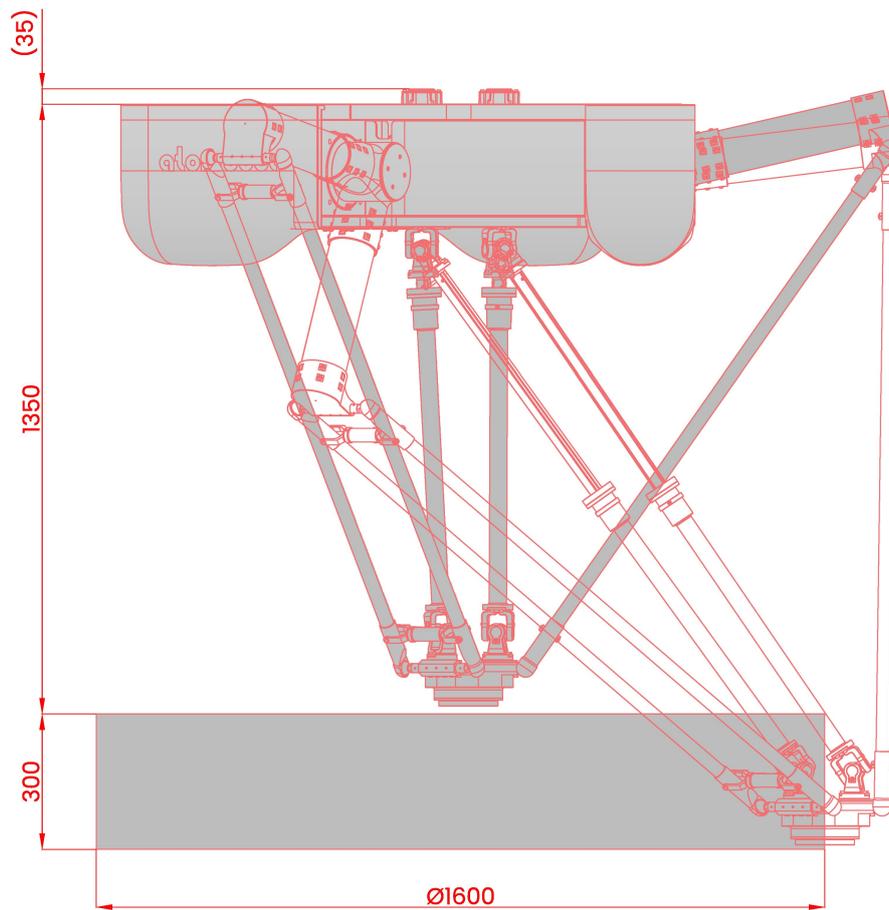
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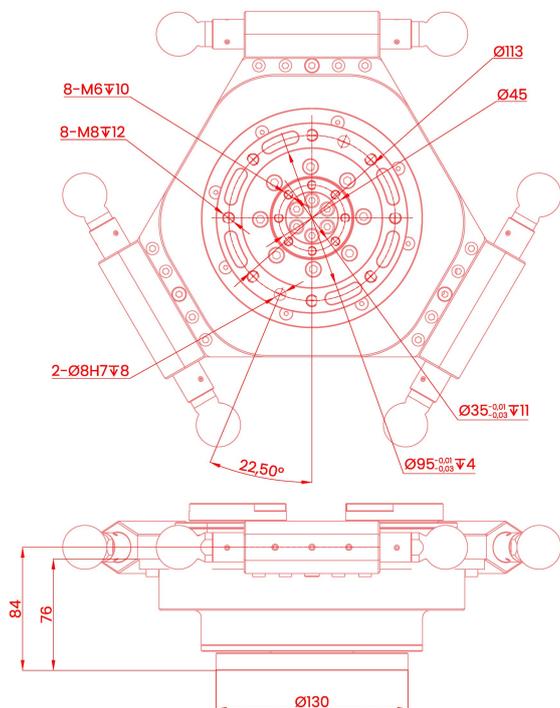
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