

# 并联机器人

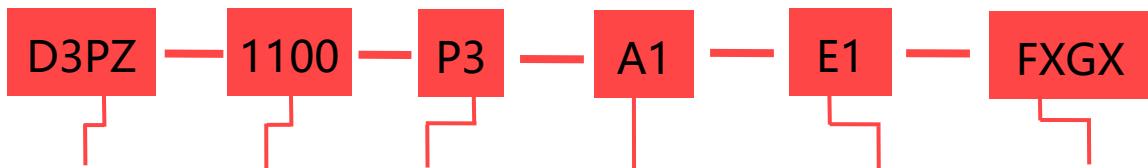
## 选型手册

### Parallel Robot Selection Manual

### D3PZ

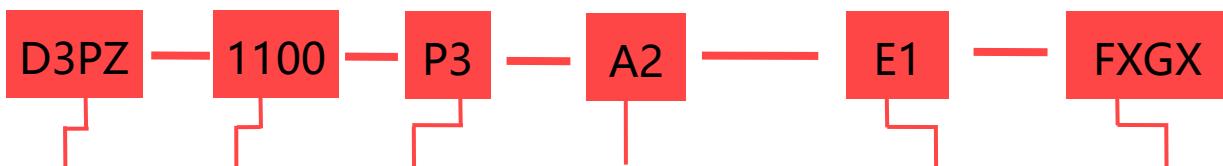


## ● 型号和符号



机型	型号	负载	控制器类型	控制柜类型	视觉
D3PZ	800	P0.5: 0.5kg P1: 1kg P3: 3kg	A1: ATOMCONTROL	E1: Atom-Unit-01 E2: Atom-unit-02 E3: 定制	FOG0: 无视觉 FXGX: 有视觉
	1100				
	1300				
	1400				
	1600				

## ● Model and Symbol



Robot type	Type	Load Type	Control Type	Control Cabinet	Vision Type
D3PZ	800	P0.5: 0.5kg P1: 1kg P3: 3kg	A1: ATOMCONTROL	E1: ATOM-01 E2: ATOM-02 E3: Custom	FOG0: Without vision FXGX: With vision
	1100				
	1300				
	1400				
	1600				

## D3PZ-700-P0.5

**高速度****High speed****高精度****High precision****高稳定性****High stability****一体铸造****Whole body cast**

型号 Type		D3PZ-700-P0.5
轴数 Axes		3+1
最大负载 Payload		0.5kg
机器人本体 Manipulator	重量 Weight	85kg
	工作空间直径 Diameter	700mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
允许负载最大旋转惯量 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	28°
	下摆 Down	60°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	6KVA	
额定功率 Rated Power	2.35kw	
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/IP67	

- ◆ 标准循环时间小于0.4s, 满足追求最高速度和最小体积需求

The standard cycle time is less than 0.4s, meeting your pursuit for the maximum speed and economic.

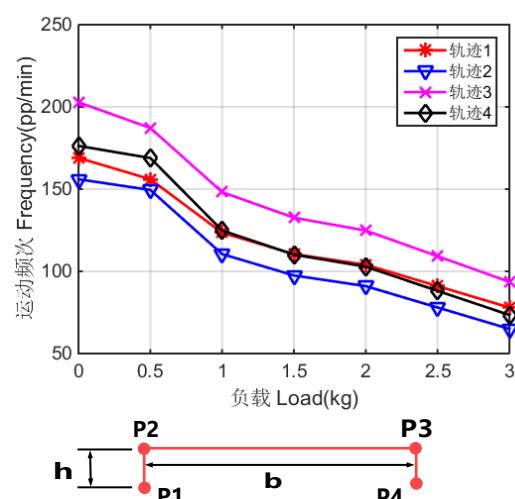
- ◆ 特殊旋转轴铰链设计, 轻松应对高强度高频次重复运动需求

Advanced design of Hooke joint in the rotational axis, enables the robot to easily cope with the high -intensity repetitive operation.

- ◆ 非常适于食品、医药等行业的高速生产作业, 主要用于小型物料的装配、搬运、分拣等

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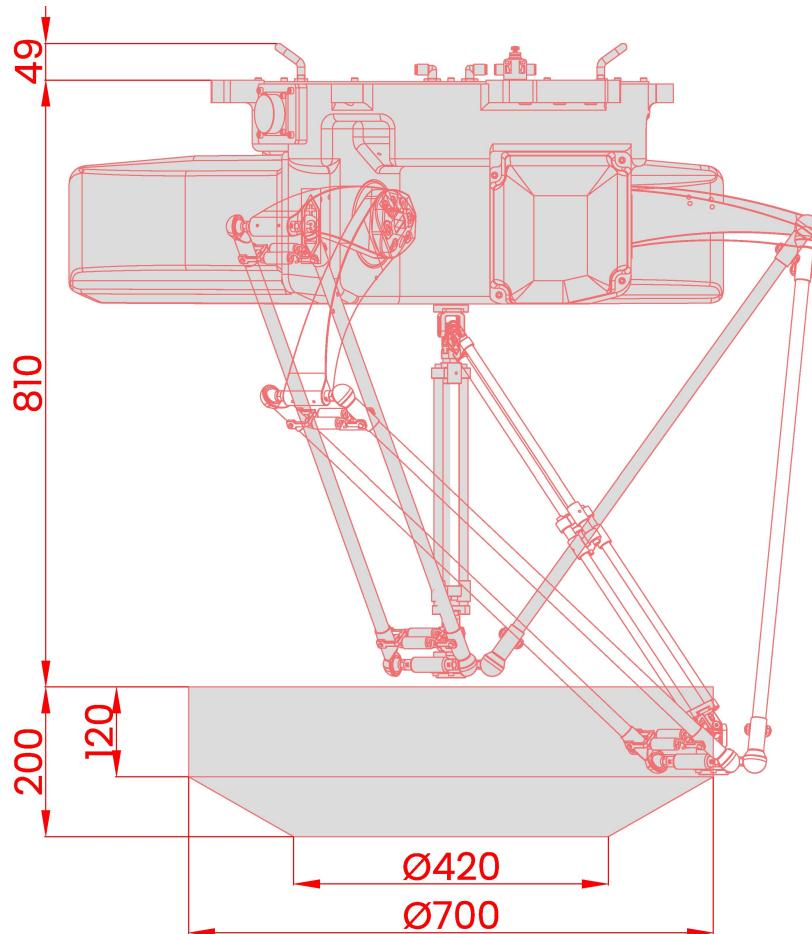
### ● 负载-频次 Load-Frequency



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→P4→P2→P1	$h=25, b=305$
轨迹4 Trajectory4	P1→P2→P3→P2→P1	$h=25, b=500$

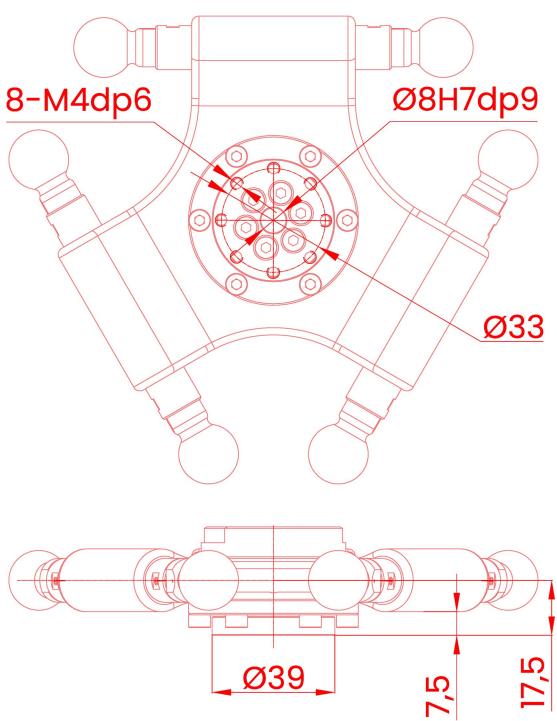
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外形尺寸及运动范围  
Outline dimensions and Working range (mm)

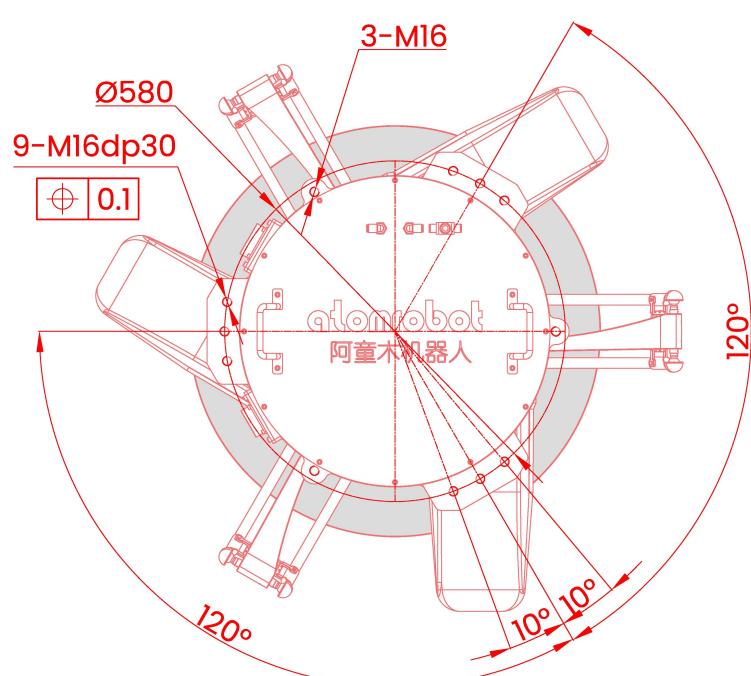


**Instruction:**  
The bottom gray part is the workplace of bottom surface's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the bottom.

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-800-P1



**高速度** High speed  
**高精度** High precision  
**高稳定性** High stability  
**一体铸造** Whole body cast

型号 Type		D3PZ-800-P1
轴数 Axes		3+1
最大负载 Payload		1kg
机器人本体 Manipulator	重量 Weight	86kg
	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°
允许负载最大旋转惯量 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	32°
	下摆 Down	60°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	6KVA	
额定功率 Rated Power	2.35kw	
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/IP67	

- ◆ 标准循环时间小于0.4s, 满足追求最高速度和最小体积需求

The standard cycle time is less than 0.4s, meeting your pursuit for the maximum speed and economic.

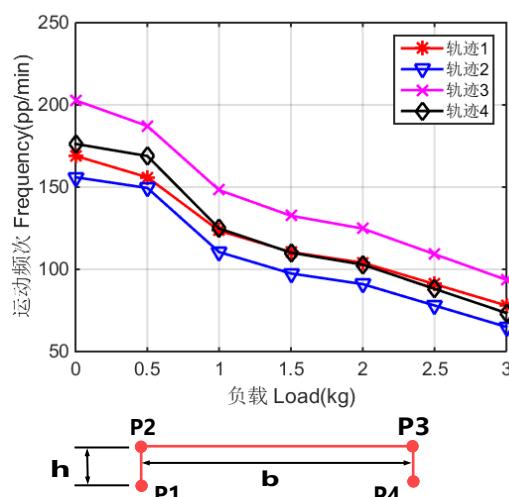
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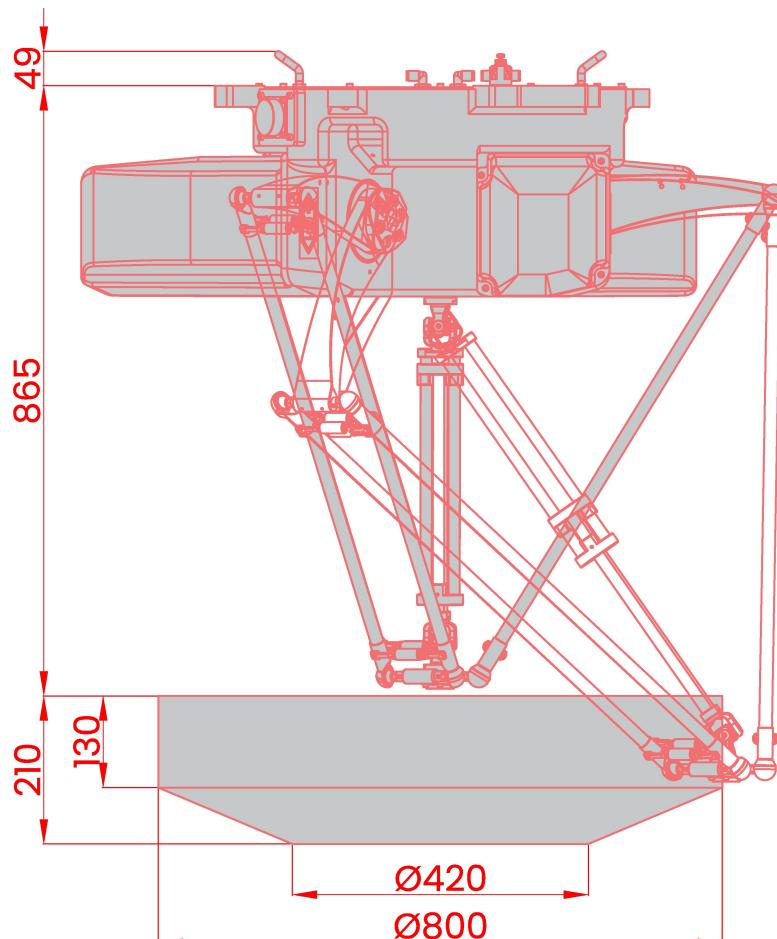
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名称 Name	循环模式 Model	运动距离 Distance
轨迹1 Trajectory1	P1→P2→P3→P4→P3→P2→P1	$h=25, b=305$
轨迹2 Trajectory2	P1→P2→P3→P4→P3→P2→P1	$h=25, b=500$
轨迹3 Trajectory3	P1→P2→P3→P2→P1	$h=25, b=305$
轨迹4 Trajectory4	P1→P2→P3→P2→P1	$h=25, b=500$

特别注意：图中节拍时间在实际条件下测得，但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)



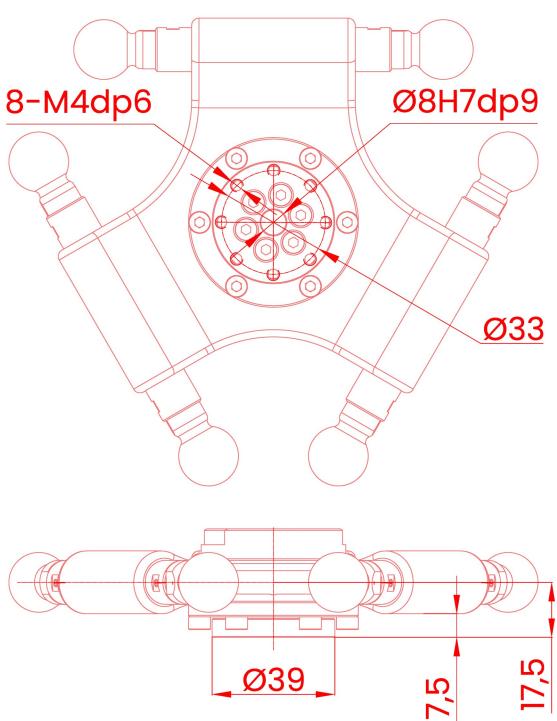
## 说明:

图示下部加深部分为机器人末端下表面几何中心的运动范围，上部为圆柱空间，并在下部向内收敛。

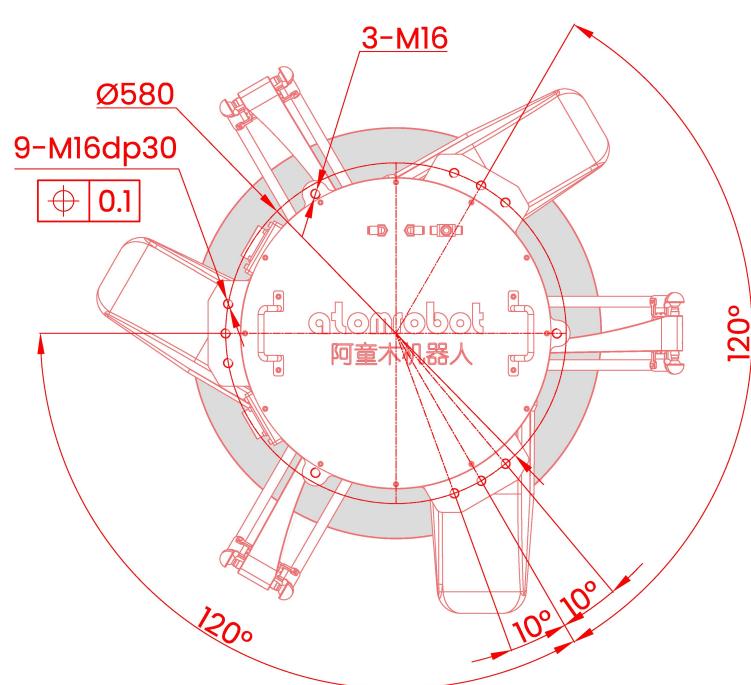
## Instruction:

The bottom gray part is the workplace of bottom surface 's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the bottom.

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-800-P3



型号 Type		D3PZ-800-P3
轴数 Axes		3+1
最大负载 Payload		3kg
机器人本体 Manipulator	重量 Weight	88.8kg
	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°
允许负载最大旋转惯量 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	30.2°
	下摆 Down	63.6°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	6KVA	
额定功率 Rated Power	2.35kw	
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/IP67	

高速度

High speed

高精度

High precision

高稳定性

High stability

一体铸造

Whole body cast

- ◆ 标准循环时间小于0.45s, 满足追求最高速度和最小体积需求

The standard cycle time is less than 0.45s, meeting your pursuit for the maximum speed and economic.

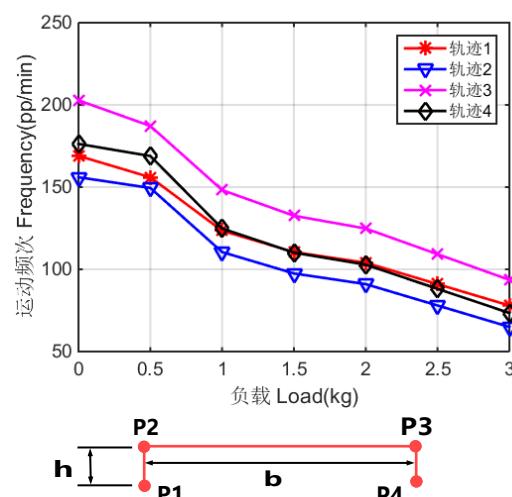
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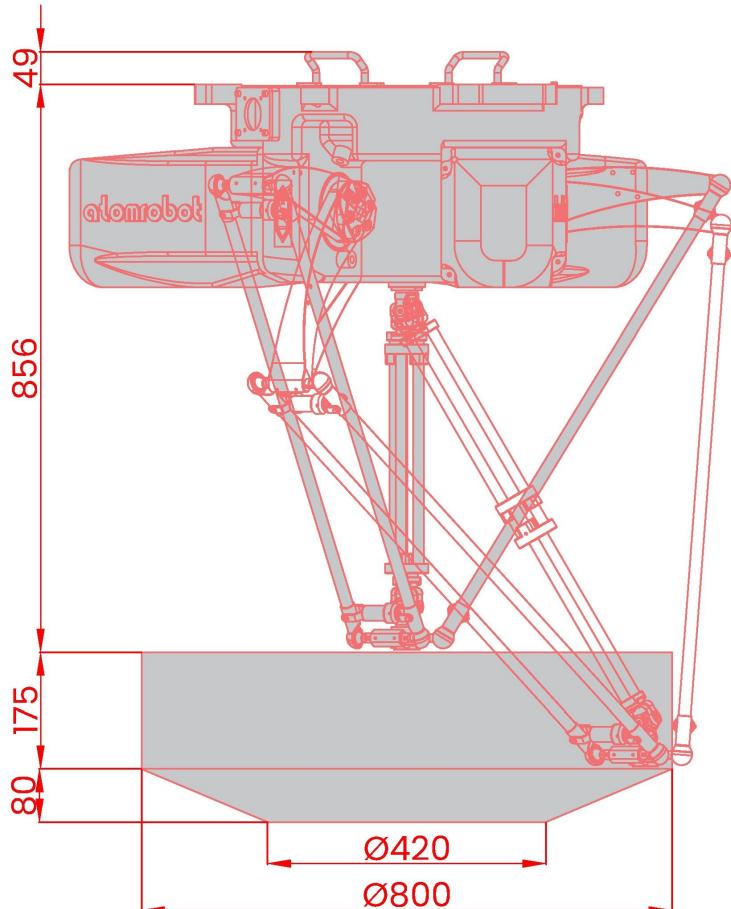
### ● 负载-频次 Load-Frequency



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，但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)



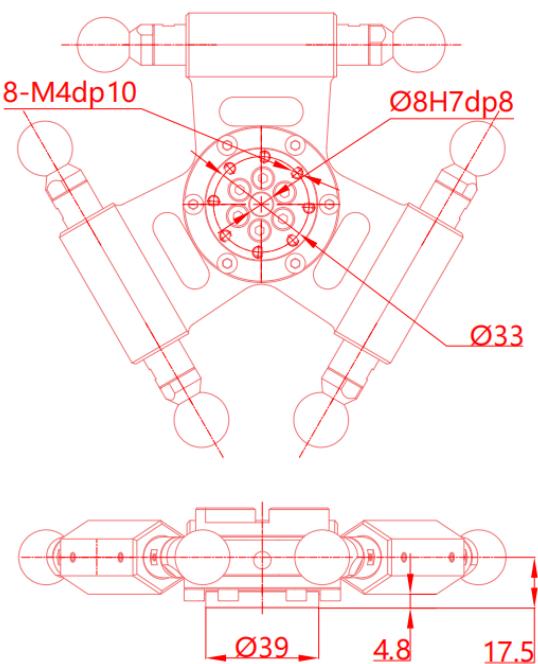
## 说明:

图示下部加深部分为机器人末端下表面几何中心的运动范围，上部为圆柱空间，并在下部向内收敛。

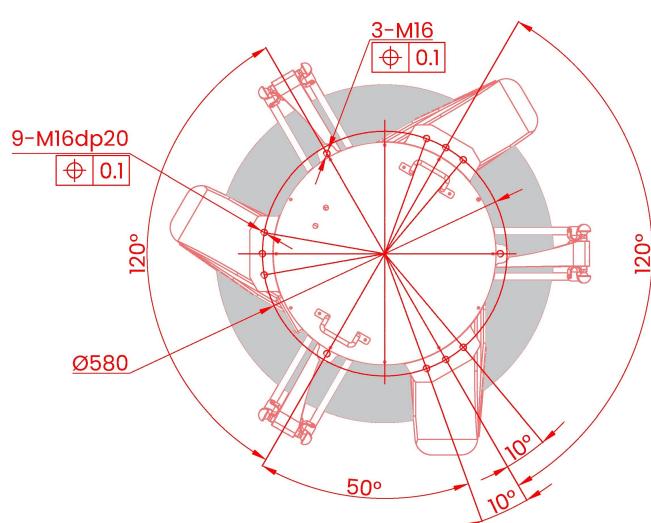
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The bottom gray part is the workplace of bottom surface 's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the bottom.

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-1100-P1



型号 Type		D3PZ-1100-P1
轴数 Axes		3+1
最大负载 Payload		1kg
机器人本体 Manipulator	重量 Weight	93kg
	工作空间直径 Diameter	1100mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
允许负载最大旋转惯量 Allowable maximum moment of inertia		$80 \times 10^{-4} \text{kg}\cdot\text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	24.5°
	下摆 Down	73.5°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	10KVA	
额定功率 Rated Power	6.1kw	
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/IP67	

高速度  
高精度  
高稳定性  
一体铸造

High speed  
High precision  
High stability  
Whole body cast

- ◆ 标准循环时间小于0.35s, 满足追求最高速度和最经济需求

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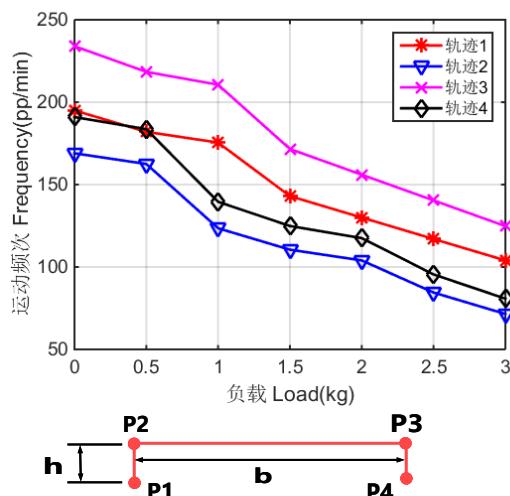
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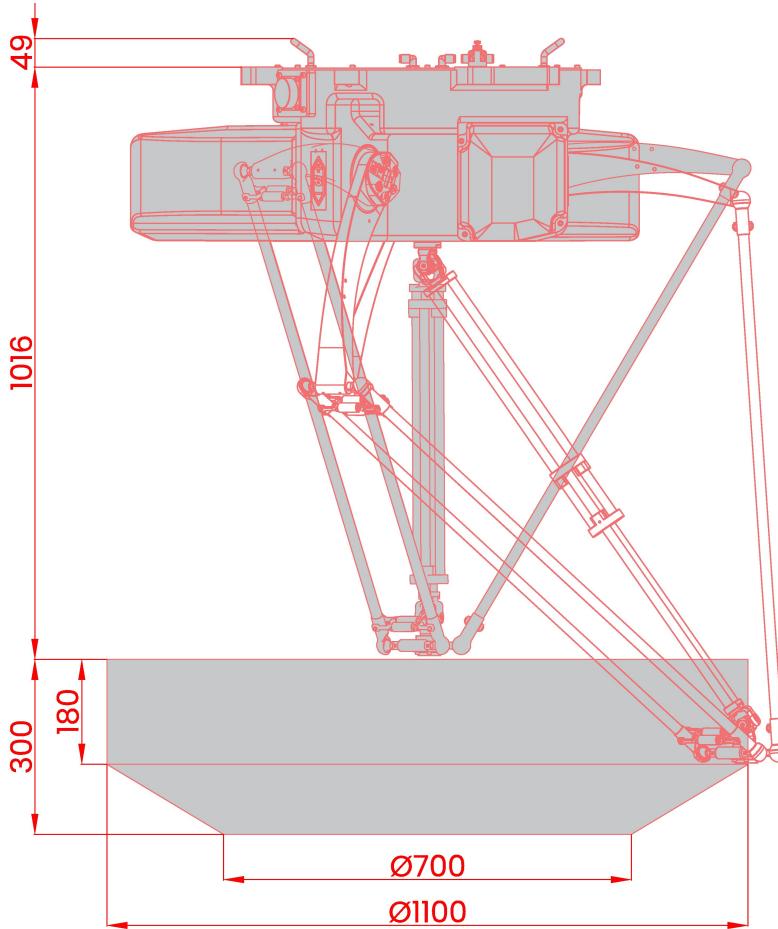
### ● 负载-频次 Load-Frequency



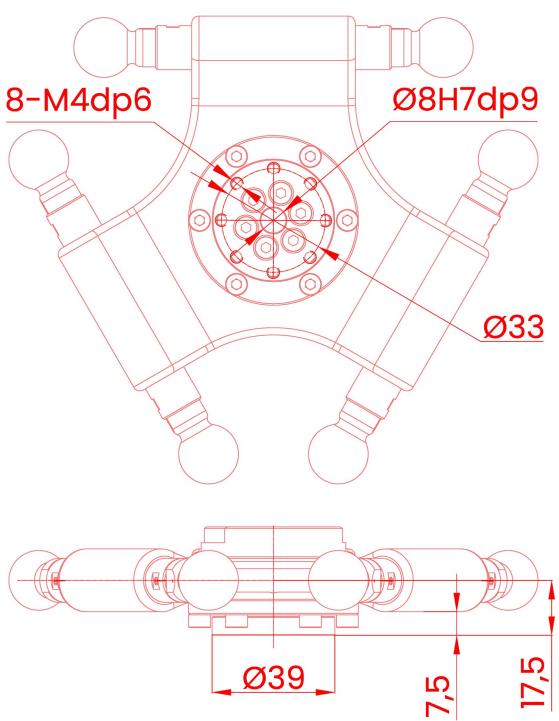
名称 Name	循环模式 Model	运动距离 Distance
轨迹1 Trajectory1	P1→P2→P3→P4→P3→P2→P1	$h=25, b=305$
轨迹2 Trajectory2	P1→P2→P3→P4→P3→P2→P1	$h=25, b=500$
轨迹3 Trajectory3	P1→P2→P3→P2→P1	$h=25, b=305$
轨迹4 Trajectory4	P1→P2→P3→P2→P1	$h=25, b=500$

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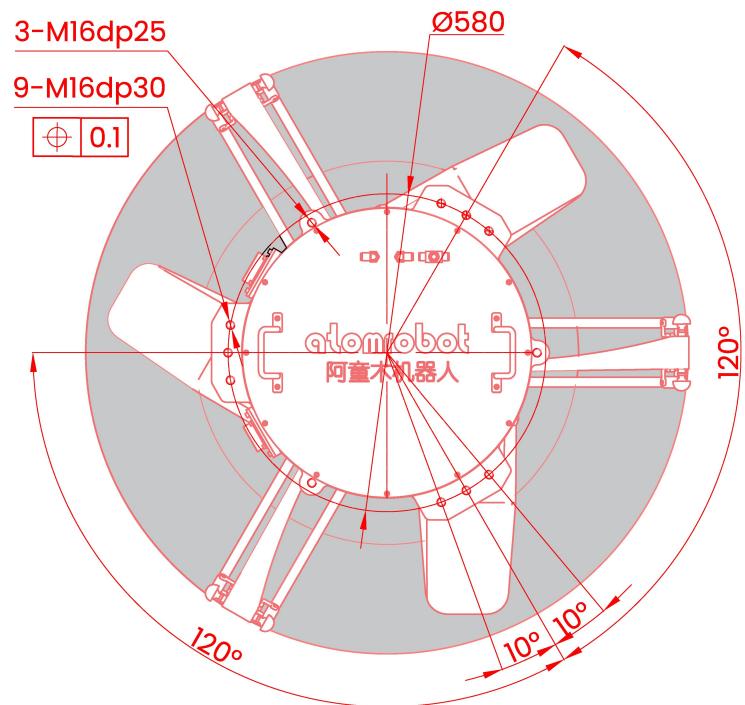
外形尺寸及运动范围  
Outline dimensions and Working range (mm)



法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-1100-P3



**高速度** High speed  
**高精度** High precision  
**高稳定性** High stability  
**一体铸造** Whole body cast

<b>型号 Type</b>		D3PZ-1100-P3
<b>轴数 Axes</b>		3+1
<b>最大负载 Payload</b>		3kg
<b>机器人本体 Manipulator</b>	<b>重量 Weight</b>	90.5kg
	<b>工作空间直径 Diameter</b>	1100mm
<b>重复定位精度 repeatability</b>	<b>位置 Position</b>	0.05mm
	<b>旋转 Rotation</b>	0.1°
<b>旋转范围 Rotation range</b>		±360°
<b>允许负载最大旋转惯量 Allowable maximum moment of inertia</b>		$80 \times 10^{-4} \text{kg}\cdot\text{m}^2$
<b>主动臂角度范围 Angle range of actuated arm</b>	<b>上摆 Up</b>	24.5°
	<b>下摆 Down</b>	73.5°
<b>输入电源 Power supply</b>	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
<b>电源容量 Power capacity</b>	10KVA	
<b>额定功率 Rated Power</b>	6.1kw	
<b>保存温度 Storage temperature</b>	-10°C~70°C	
<b>工作环境 Work environment</b>	-10°C~50°C, RH≤80%	
<b>防护等级 Protection</b>	IP55/IP67	

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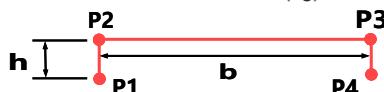
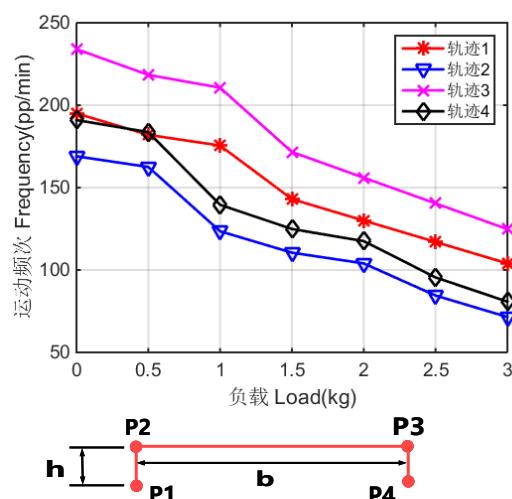
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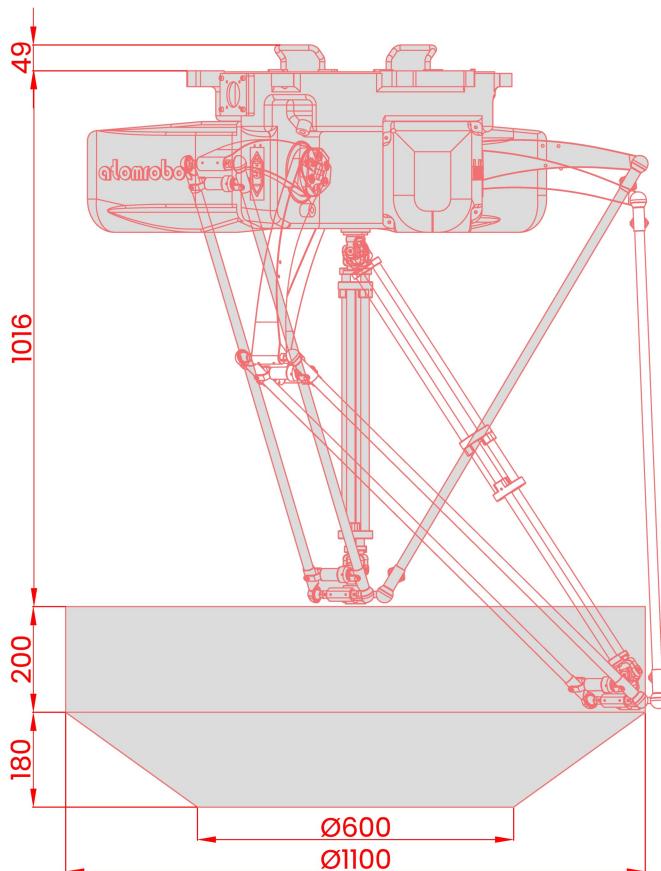
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轨迹2 Trajectory2	P1→P2→P3→P4→P3→P2→P1	$h=25, b=500$
轨迹3 Trajectory3	P1→P2→P3→P2→P1	$h=25, b=305$
轨迹4 Trajectory4	P1→P2→P3→P2→P1	$h=25, b=500$

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



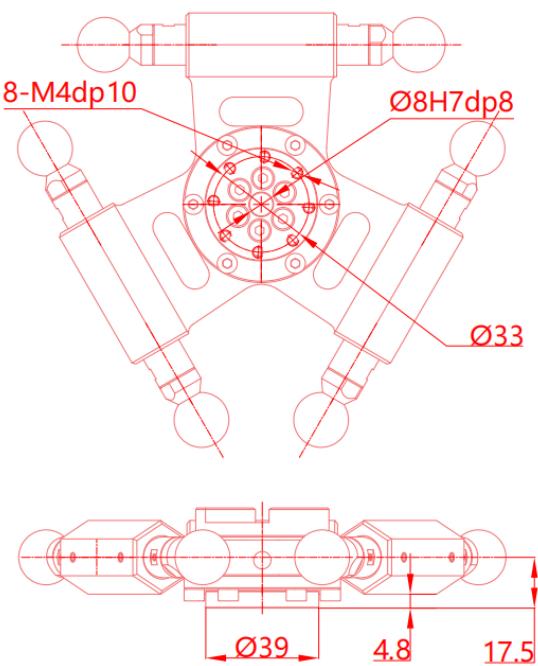
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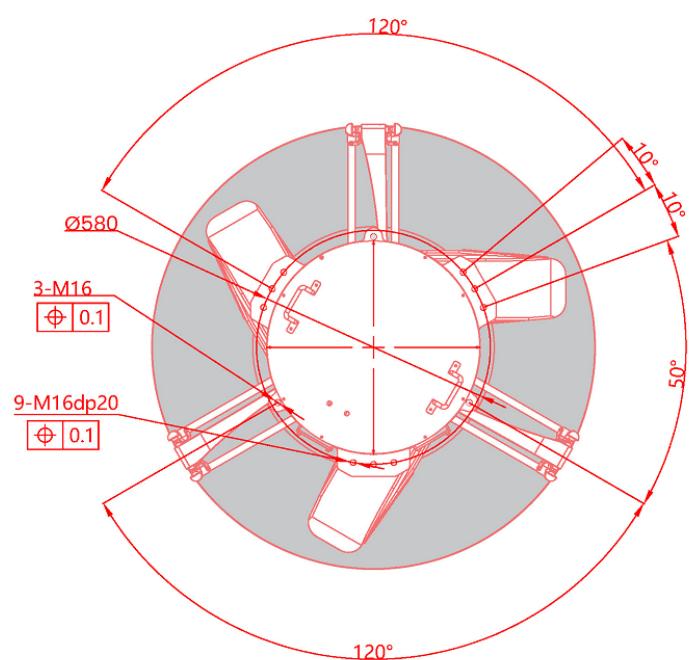
**Instruction:**

The bottom gray part is the workplace of bottom surface's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the bottom.

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-1300-P3



**高速度  
高稳定性  
大空间  
经济实用**

**High speed  
High stability  
Large space  
Economic & Practi-**

型号 Type		D3PZ-1300-P3
轴数 Axes		3+1
最大负载 Payload		3kg
机器人本体 Manipulator	重量 Weight	93.5kg
	工作空间直径 Diameter	1300mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
允许负载最大旋转惯量 Allowable maximum moment of inertia		$80 \times 10^{-4} \text{ kg} \cdot \text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	24.6°
	下摆 Down	78.5°
输入电源 Power supply		三相 Three-phase 380VAC -10%~+10%, 49~61HZ
电源容量 Power capacity		10KVA
额定功率 Rated Power		6.1kw
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

- ◆ 标准循环时间小于0.4s,满足追求最高速度和最经济需求

The standard cycle time is less than 0.4s, meeting your pursuit for the maximum speed and economic.

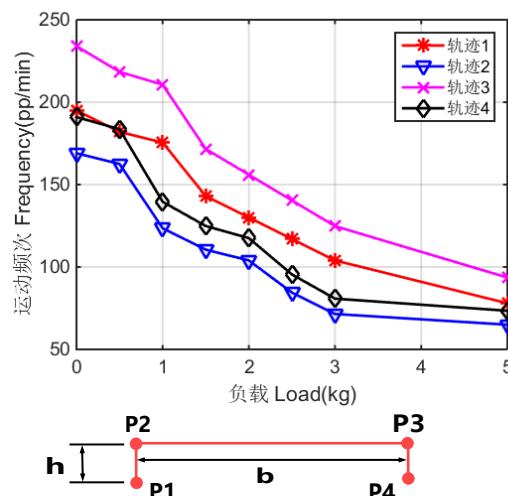
- ◆ 特殊旋转轴铰链设计, 轻松应对高强度高频次重复运动需求

Advanced design of Hooke joint in the rotational axis, enables the robot to easily cope with the high-intensity repetitive operation.

- ◆ 非常适于食品、医药等行业的高速生产作业, 主要用于小型物料的装配、搬运、分拣等

The robot is ideal for high-speed production in food and medicine industry. Widely used in assembly, handling and pick-and-place of small materials.

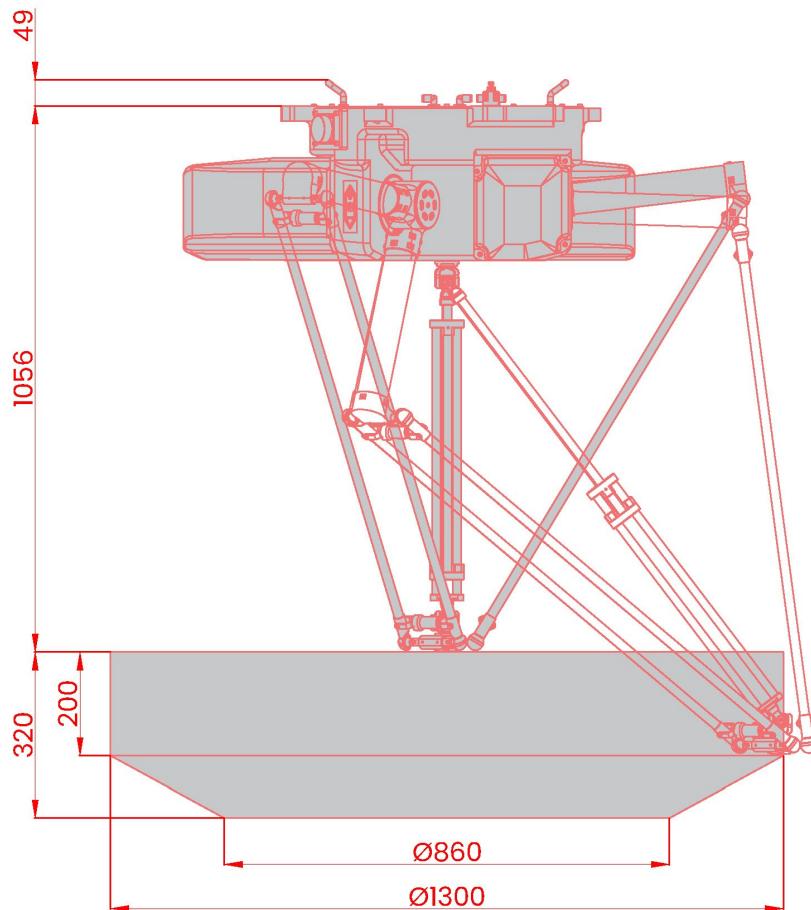
### ● 负载-频次 Load-Frequency



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, 但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)



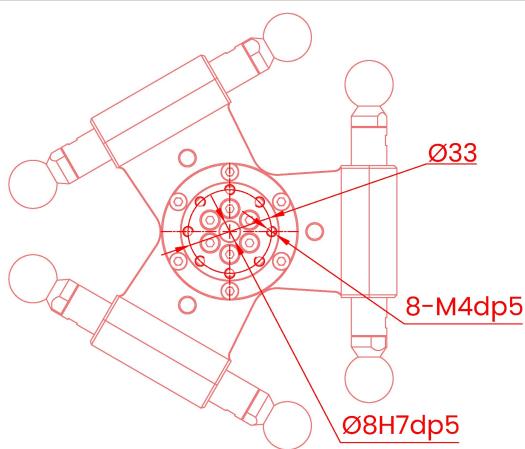
**说明:**

图示下部加深部分为机器人末端下表面几何中心的运动范围，上部为圆柱空间，并在下部向内收敛。

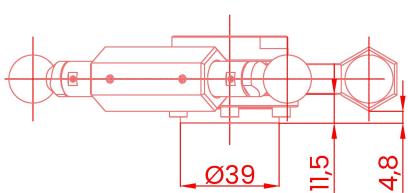
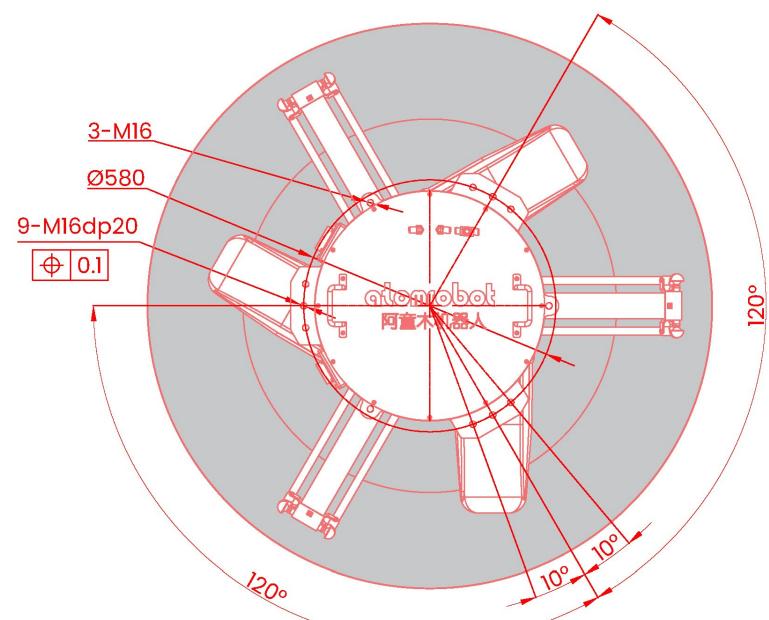
**Instruction:**

The bottom gray part is the workplace of bottom surface 's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the bottom.

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-1400-P3



**高精度  
高稳定性  
大空间  
经济实用**

**High speed  
High stability  
Large space  
Economic & Practi-**

型号 Type		D3PZ-1400-P3
轴数 Axes		3+1
最大负载 Payload		3kg
机器人本体 Manipulator	重量 Weight	96.5kg
	工作空间直径 Diameter	1400mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
允许负载最大旋转惯量 Allowable maximum moment of inertia		$80 \times 10^{-4} \text{kg} \cdot \text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	28°
	下摆 Down	73°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	10KVA	
额定功率 Rated Power	6.1kw	
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	

- ◆ 标准循环时间小于0.4s,满足追求最高速度和最经济需求

The standard cycle time is less than 0.4s, meeting your pursuit for the maximum speed and economic.

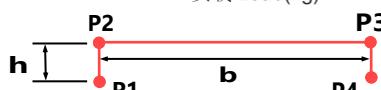
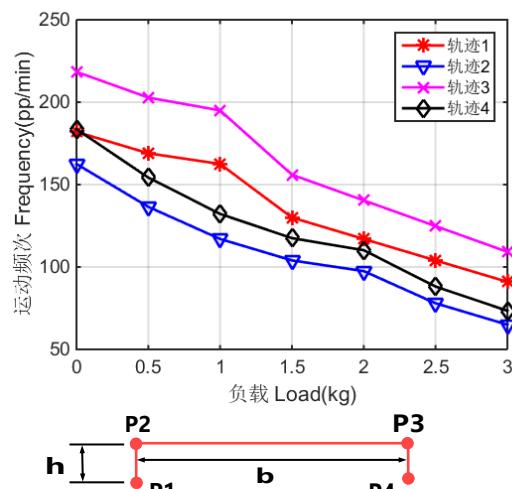
- ◆ 特殊旋转轴铰链设计, 轻松应对高强度高频次重复运动需求

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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The robot is ideal for high-speed production in food and medicine industry. Widely used in assembly, handling and pick-and-place of small materials.

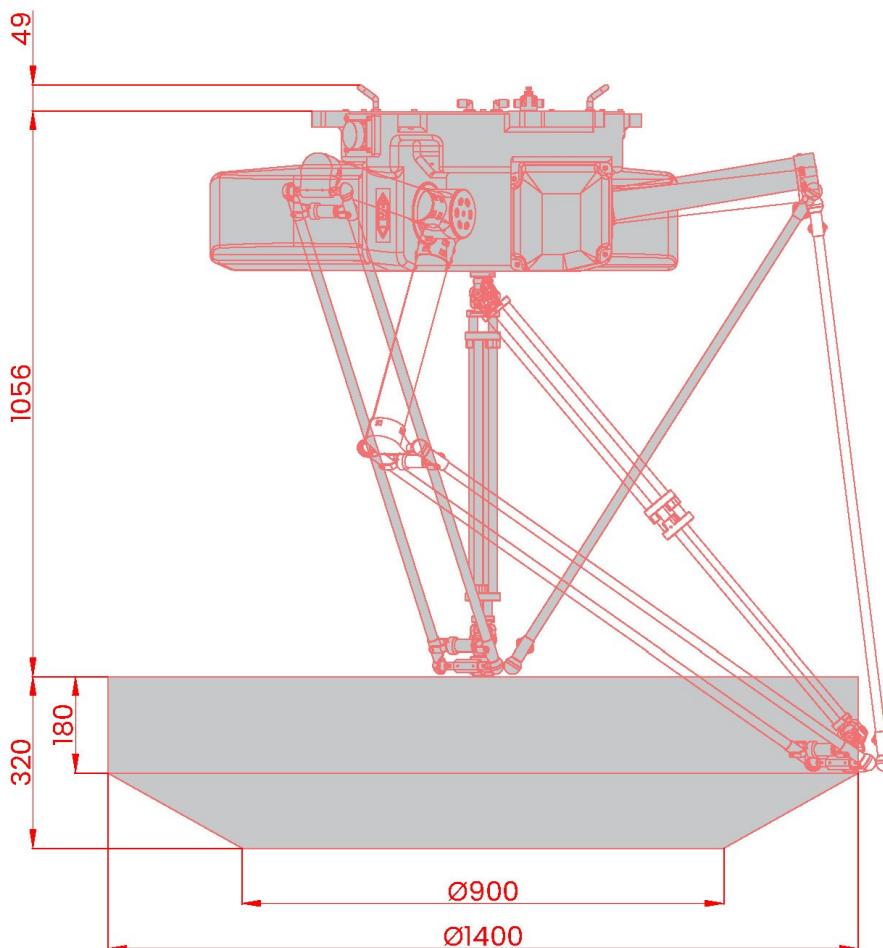
● **负载-频次 Load-Frequency**



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, 但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。

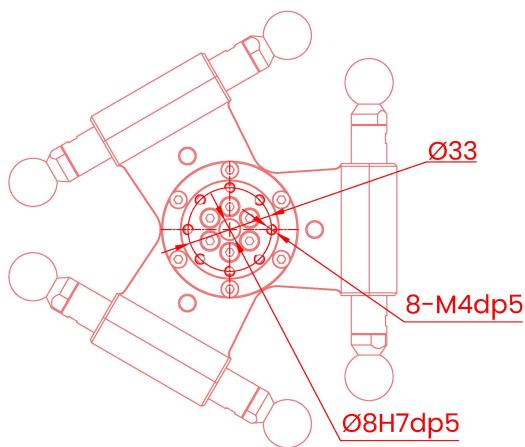
外形尺寸及运动范围  
Outline dimensions and Working range (mm)



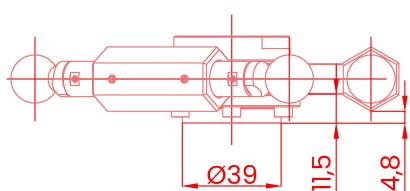
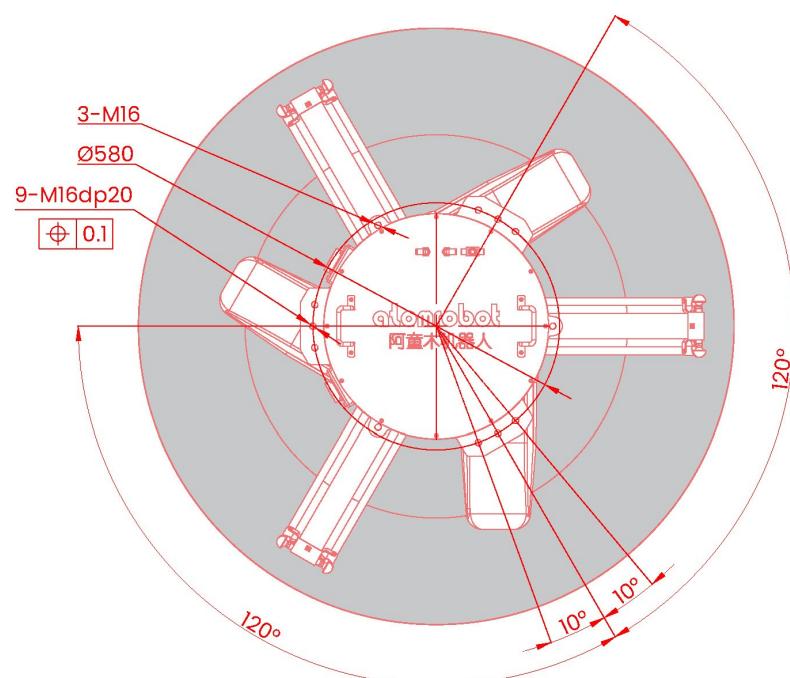
**说明:**  
图示下部加深部分为机器人末端下表面几何中心的运动范围，上部为圆柱空间，并在下部向内收敛。

**Instruction:**  
The bottom gray part is the workplace of bottom surface 's center point of the end, which is composed of a cylinder at the top and a circular truncated cone at the

法兰 Flange (mm)



基座安装 Base installation (mm)



## D3PZ-1600-P3



**高精度  
高稳定性  
大空间  
经济实用**

**High speed  
High stability  
Large space  
Economic & Practi-**

型号 Type		D3PZ-1600-P3
轴数 Axes		3+1
最大负载 Payload		3kg
机器人本体 Manipulator	重量 Weight	99.8kg
	工作空间直径 Diameter	1600mm
重复定位精度 repeatability	位置 Position	0.05mm
	旋转 Rotation	0.1°
旋转范围 Rotation range		±360°
允许负载最大旋转惯量 Allowable maximum moment of inertia		$80 \times 10^{-4} \text{kg} \cdot \text{m}^2$
主动臂角度范围 Angle range of actuated arm	上摆 Up	28°
	下摆 Down	73°
输入电源 Power supply	三相 Three-phase 380VAC -10%~+10%, 49~61HZ	
电源容量 Power capacity	10KVA	
额定功率 Rated Power	6.1kw	
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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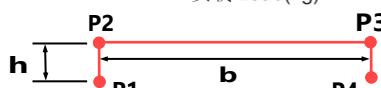
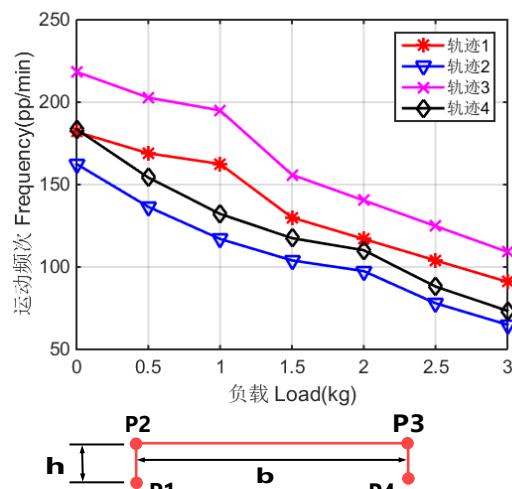
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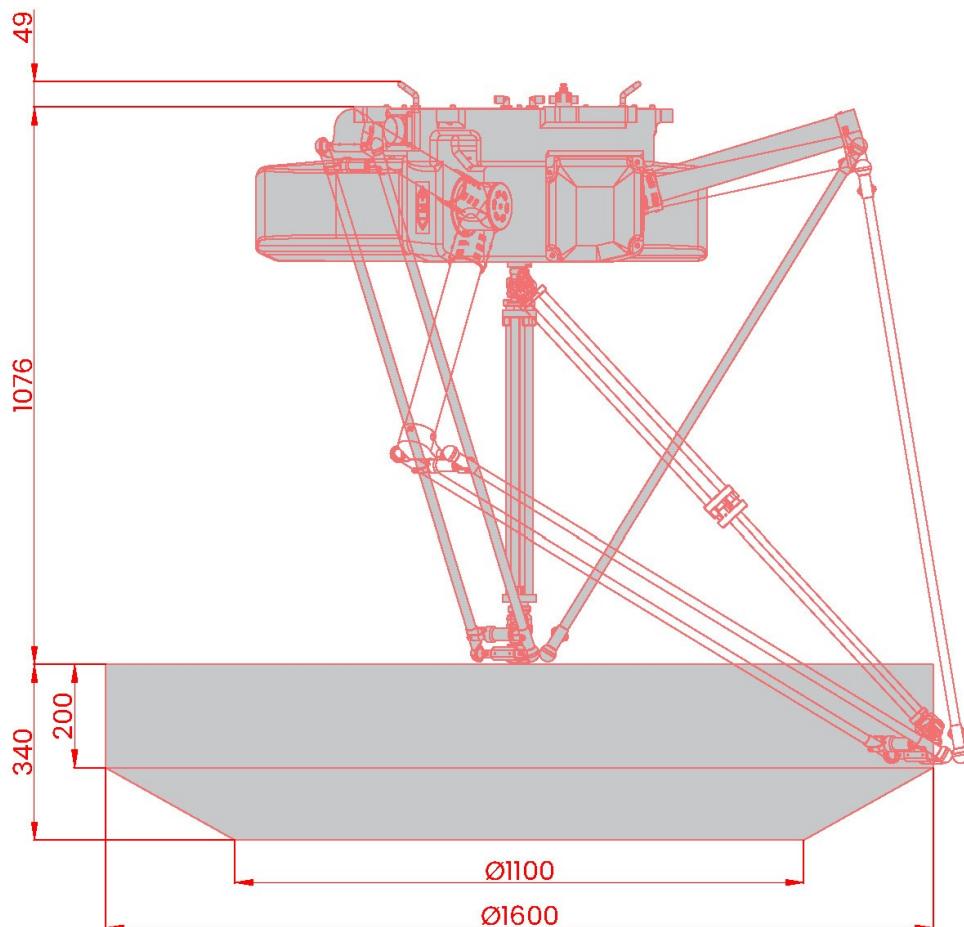
● **负载-频次 Load-Frequency**



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轨迹4 Trajectory4	P1→P2→P3→P2→P1	$h=25, b=500$

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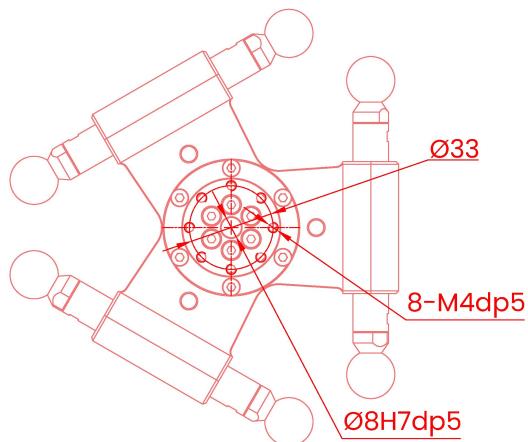
外形尺寸及运动范围  
Outline dimensions and Working range (mm)



**说明:**  
图示下部加深部分为机器人末端下表面几何中心的运动范围，上部为圆柱空间，并在下部向内收敛。

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法兰 Flange (mm)



基座安装 Base installation (mm)

