

JR2000N Series

Desktop Robot



Enhanced lineup with an operation range between 200mm×200mm and 510mm×510mm.

JANOME

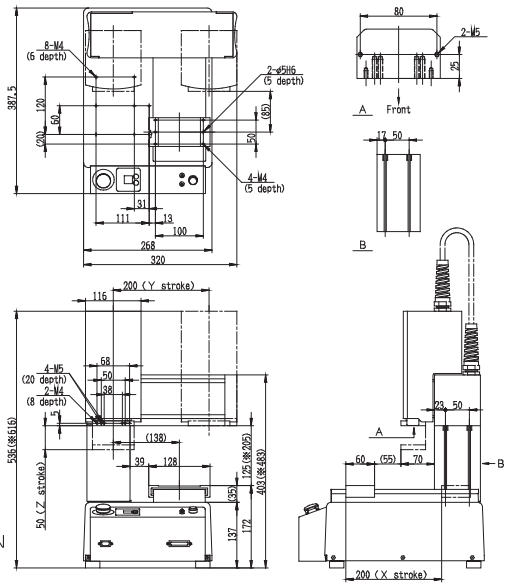
JR2200N mini Series



Low-cost cell production

External Dimensions for the JR2203N

※The standard open height for the JR2204N is 205 mm.



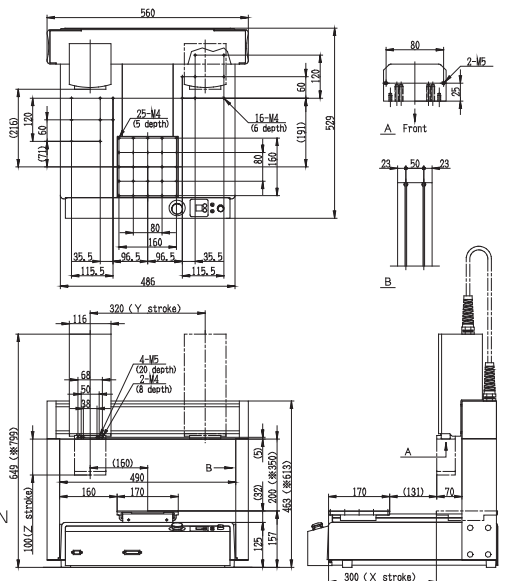
JR2300N Series



With an operation range of 300×320mm, 2 screw feeders can now be installed.

External Dimensions for the JR2303N

※The standard open height for the JR2304N (4 axes application) is 350 mm.



JR2400N Series / JR2500N Series*

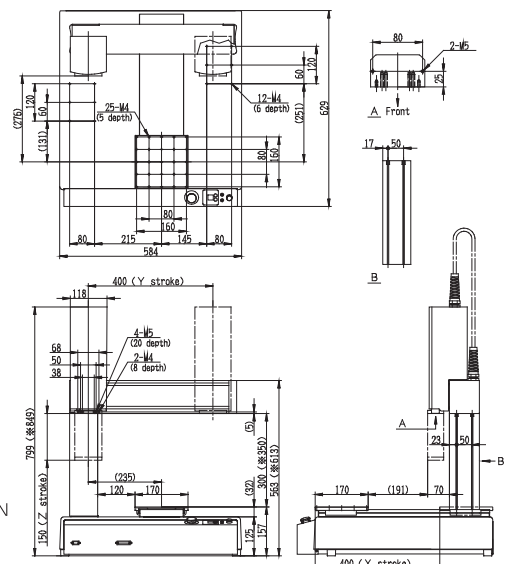
The wide operation range 400×400 mm allows large workpieces to be easily moved.



This photograph is of the JR2400N series.

External Dimensions for the JR2403N

★Please contact us for the external dimensions of the JR2500N.
 ※The standard open height for the JR2404N (4 axes application) is 350 mm.



Specifications

Model *1		3-Axis Type (synchronous control)				4-Axis Type (synchronous control)			
		JR2203N	JR2303N	JR2403N	JR2503N	JR2204N	JR2304N	JR2404N	JR2504N
Operation Range	X- and Y- Axes	200×200mm	300×320mm	400×400mm	510×510mm	200×200mm	300×320mm	400×400mm	510×510mm
	Z-Axis	50mm	100mm	150mm	150mm	50mm	100mm	150mm	150mm
	R-Axis	-	-	-	-	±360°	±360°	±360°	±360°
Portable Weight	Workpiece	7kg	11kg	11kg	11kg	7kg	11kg	11kg	11kg
	Tool	3.5kg	6kg	6kg	6kg	3.5kg	6kg	6kg	6kg
Maximum Speed (PTP)*2 (: Y: setting range)	X- and Y- Axes	700mm/sec (7 - 700mm/sec)	800mm/sec (8 - 800mm/sec)	800mm/sec (8 - 800mm/sec)	800mm/sec (8 - 800mm/sec)	700mm/sec (7 - 700mm/sec)	800mm/sec (8 - 800mm/sec)	800mm/sec (8 - 800mm/sec)	800mm/sec (8 - 800mm/sec)
	Z-Axis	250mm/sec (2.5 - 250mm/sec)	320mm/sec (3.2 - 320mm/sec)	320mm/sec (3.2 - 320mm/sec)	320mm/sec (3.2 - 320mm/sec)	250mm/sec (2.5 - 250mm/sec)	320mm/sec (3.2 - 320mm/sec)	320mm/sec (3.2 - 320mm/sec)	320mm/sec (3.2 - 320mm/sec)
	R-Axis	-	-	-	-	600°/sec (6 - 600°/sec)	800°/sec (8 - 800°/sec)	800°/sec (8 - 800°/sec)	800°/sec (8 - 800°/sec)
Maximum Speed (CP)*2 (: Y: setting range)	XYZ combined speed	500mm/sec (0.1 - 500mm/sec)	800mm/sec (0.1 - 800mm/sec)	800mm/sec (0.1 - 800mm/sec)	800mm/sec (0.1 - 800mm/sec)	500mm/sec (0.1 - 500mm/sec)	800mm/sec (0.1 - 800mm/sec)	800mm/sec (0.1 - 800mm/sec)	800mm/sec (0.1 - 800mm/sec)
Acceptable Moment of Inertia		-	-	-	-	65kg·cm ²	90kg·cm ²	90kg·cm ²	90kg·cm ²
Resolution	X- and Y- Axes	0.005mm	0.005mm	0.005mm	0.005mm	0.005mm	0.005mm	0.005mm	0.005mm
	Z-Axis	0.0025mm	0.0025mm	0.0025mm	0.0025mm	0.0025mm	0.0025mm	0.0025mm	0.0025mm
	R-Axis	-	-	-	-	0.009°	0.009°	0.009°	0.009°
Repeatability*3	X- and Y- Axes	±0.006mm	±0.007mm	±0.007mm	±0.008mm	±0.01mm	±0.01mm	±0.01mm	±0.01mm
	Z-Axis	±0.006mm	±0.007mm	±0.007mm	±0.008mm	±0.01mm	±0.01mm	±0.01mm	±0.01mm
	R-Axis	-	-	-	-	±0.008°	±0.008°	±0.008°	±0.008°
Dimensions (W×D×H) (Not including protrusion parts)		320×387×540mm	560×528×650mm	584×628×800mm	676×731×800mm	320×387×655mm	560×528×840mm	584×628×890mm	676×731×890mm
Body Weight		18kg	35kg	42kg	46kg	18kg	35kg	42kg	46kg
Drive Method		5-phase stepping motor							
Control Method		PTP (Point to Point) control, CP (Continuous Path) control							
Interpolating Function		3-dimensional line and arc interpolation							
Teaching Method		Remote teaching (JOG) /Manual data input (MDI)							
Teaching System		JANOME original software JR C-Points: A simple and broad-use teaching system <ul style="list-style-type: none"> ● Simple: Easy teaching just by registering positions and parameters. Optional system programs are available for basic operations and various applications. ● Broad-use: User-oriented programming such as I/O control etc. by point job teaching. 							
Teaching Pattern		<ul style="list-style-type: none"> ● Direct teaching using a teaching pendant (optional) ● Off-line teaching using JR C-Points (PC software) via a PC (optional) 							
Screen Display	Unit of Measure	mm, inch							
	Display Language	Japanese, English, French, Spanish, Italian, German, Korean, Chinese (Simplified characters only)							
Program Capacity		255 programs							
Data Capacity*4		Maximum 30,000 points							
External Interface		RS422 1ch (for a teaching pendant) RS232C 1ch (for a PC: COM1) RS232C 2ch (for external devices: COM2, COM3) (optional)							
External Input/Output		I/O-SYS IN: 16/OUT: 16 I/O-1 IN: 8/OUT: 8 (4-relay contact) (optional)							
Simple PLC Function		100 programs (1,000 steps/1 program)							
Power Source		AC90 - 132V / AC180 - 250V (single-phase)							
Power Consumption		200W							
Working Ambient Temperature		0 - 40°C							
Relative Humidity		20 - 90% (Non condensing)							

<Note>

- *1 A 2-axis type is also available. (Please contact us for specifications.) (cf.) Maximum portable weight (tool/workpiece): JR2202N (6.5kg/7kg), JR2302N/JR2402N/JR2502N (10kg/11kg)
- *2 Maximum speed may vary depending on conditions. Maximum speed cannot be achieved under the maximum portable weight setting.
- *3 Repeatability was measured at a constant temperature, so absolute precision is not guaranteed.
- *4 The point data capacity will be reduced if the additional function data setting/point job data/sequencer data increases, due to the shared data storage area.

<Standard Accessories>

- Power cable
- Operation manual (CD-ROM)

<Optional devices>

- Teaching pendant
- Switch box (CE specifications only)
- I/O SYS cable and I/O-1 cable
- Special software (JR C-Points) complies with Windows® XP / Windows® 7.

- Models with CE specifications are also available.
- Specifications may be modified without prior notice to improve product quality.

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