

July - September 2022 Results
Production and Shipments of Manipulators and Robots by Applications
[JARA Member Companies]

Number of units, () : million yen

	July - September 2021	July - September 2022	Change from 2021
Orders	64,496 (213,311)	68,315 (236,052)	5.9% (10.7%)
Production	56,579 (204,326)	63,682 (223,070)	12.6% (9.2%)

Shipments Applications	July - September 2021			July - September 2022			Change from 2021			July - September 2021 (percentage distribution)			July - September 2022 (percentage distribution)		
	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total
Plastic moulding	704	826	1,530	719	819	1,538	2.1%	-0.8%	0.5%	6.6%	1.8%	2.7%	6.4%	1.5%	2.4%
Arc welding	1,043	5,836	6,879	1,257	4,534	5,791	20.5%	-22.3%	-15.8%	9.7%	12.8%	12.2%	11.2%	8.6%	9.0%
Spot welding	827	3,946	4,773	582	4,707	5,289	-29.6%	19.3%	10.8%	7.7%	8.7%	8.5%	5.2%	8.9%	8.3%
Laser welding	2	197	199		213	213	-100.0%	8.1%	7.0%	0.0%	0.4%	0.4%	0.0%	0.4%	0.3%
Others	16	23	39	26	6	32	62.5%	-73.9%	-17.9%	0.1%	0.1%	0.1%	0.2%	0.0%	0.0%
Welding Units	1,888	10,002	11,890	1,865	9,460	11,325	-1.2%	-5.4%	-4.8%	17.6%	21.9%	21.1%	16.6%	17.9%	17.7%
(million yen)	(9,047)	(20,366)	(29,412)	(7,896)	(22,517)	(30,414)	(-12.7%)	(10.6%)	(3.4%)	(19.3%)	(13.2%)	(14.6%)	(16.4%)	(12.7%)	(13.5%)
Painting	143	599	742	163	504	667	14.0%	-15.9%	-10.1%	1.3%	1.3%	1.3%	1.5%	1.0%	1.0%
Loading/unloading	580	1,109	1,689	638	2,562	3,200	10.0%	131.0%	89.5%	5.4%	2.4%	3.0%	5.7%	4.8%	5.0%
Mechanical cutting	3		3	9		9	200.0%		200.0%	0.0%		0.0%	0.1%		0.0%
Grinding/deburring	29	173	202	37	103	140	27.6%	-40.5%	-30.7%	0.3%	0.4%	0.4%	0.3%	0.2%	0.2%
Others	6	11	17	6	21	27		90.9%	58.8%	0.1%	0.0%	0.0%	0.1%	0.0%	0.0%
Machining Units	618	1,293	1,911	690	2,686	3,376	11.7%	107.7%	76.7%	5.8%	2.8%	3.4%	6.2%	5.1%	5.3%
(million yen)	(1,809)	(2,135)	(3,944)	(2,110)	(4,693)	(6,803)	(16.7%)	(119.8%)	(72.5%)	(3.9%)	(1.4%)	(2.0%)	(4.4%)	(2.6%)	(3.0%)
Surface Mount Technology	293	4,465	4,758	317	3,992	4,309	8.2%	-10.6%	-9.4%	2.7%	9.8%	8.4%	2.8%	7.6%	6.7%
General Assembly	1,817	7,230	9,047	1,815	5,753	7,568	-0.1%	-20.4%	-16.3%	17.0%	15.9%	16.1%	16.2%	10.9%	11.8%
Other Assembly	153	89	242	207	376	583	35.3%	322.5%	140.9%	1.4%	0.2%	0.4%	1.8%	0.7%	0.9%
Bonding				2	1	3							0.0%	0.0%	0.0%
Soldering	2	1	3	2		2		-100.0%	-33.3%	0.0%	0.0%	0.0%	0.0%		0.0%
Sealing/glueing	32	82	114	62	70	132	93.8%	-14.6%	15.8%	0.3%	0.2%	0.2%	0.6%	0.1%	0.2%
Screwing				26		26							0.2%		0.0%
Others	119	6	125	115	305	420	-3.4%	4983.3%	236.0%	1.1%	0.0%	0.2%	1.0%	0.6%	0.7%
Assembly Units	1,970	7,319	9,289	2,022	6,129	8,151	2.6%	-16.3%	-12.3%	18.4%	16.0%	16.5%	18.0%	11.6%	12.7%
(million yen)	(5,654)	(7,623)	(13,277)	(5,992)	(7,317)	(13,308)	(6.0%)	(-4.0%)	(0.2%)	(12.1%)	(4.9%)	(6.6%)	(12.4%)	(4.1%)	(5.9%)
Palletizing/depalletizing	398	1,160	1,558	342	815	1,157	-14.1%	-29.7%	-25.7%	3.7%	2.5%	2.8%	3.1%	1.5%	1.8%
Material handling	1,992	13,161	15,153	1,826	18,930	20,756	-8.3%	43.8%	37.0%	18.6%	28.9%	26.9%	16.3%	35.8%	32.4%
FPD	45	64	109	21	86	107	-53.3%	34.4%	-1.8%	0.4%	0.1%	0.2%	0.2%	0.2%	0.2%
Semiconductor	1,941	3,381	5,322	2,457	4,212	6,669	26.6%	24.6%	25.3%	18.1%	7.4%	9.4%	21.9%	8.0%	10.4%
Others		129	129		154	154		19.4%	19.4%		0.3%	0.2%		0.3%	0.2%
Cleanroom Units	1,986	3,574	5,560	2,478	4,452	6,930	24.8%	24.6%	24.6%	18.5%	7.8%	9.9%	22.1%	8.4%	10.8%
(million yen)	(6,464)	(7,982)	(14,446)	(8,178)	(12,219)	(20,397)	(26.5%)	(53.1%)	(41.2%)	(13.8%)	(5.2%)	(7.2%)	(17.0%)	(6.9%)	(9.0%)
Other applications	519	776	1,295	635	1,653	2,288	22.4%	113.0%	76.7%	4.8%	1.7%	2.3%	5.7%	3.1%	3.6%
Unspecified	202	2,435	2,637	154	3,433	3,587	-23.8%	41.0%	36.0%	1.9%	5.3%	4.7%	1.4%	6.5%	5.6%
Total Units	10,713	45,610	56,323	11,211	52,873	64,084	4.6%	15.9%	13.8%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
(million yen)	(46,876)	(154,583)	(201,459)	(48,146)	(177,874)	(226,021)	(2.7%)	(15.1%)	(12.2%)	(100.0%)	(100.0%)	(100.0%)	(100.0%)	(100.0%)	(100.0%)

Note)

Data includes dedicated type (Surface Mount Technology / Bonding).

Data is collected in unit of 10,000 yen. However, the results are shown in unit of million yen by rounding the figures of 100,000 yen.

July - September 2022 Results
Shipments of Manipulators and Robots by Industries
[JARA Member Companies]

Number of units, () : million yen

Industries	2021 Jul. - Sep.	2022 Jul. - Sep.	Change from 2021	Percentage distribution	
				2021	2022
Metal products	603	641	6.3%	5.6%	5.7%
Construction and mining machinery	39	45	15.4%	0.4%	0.4%
Metalworking machinery	171	233	36.3%	1.6%	2.1%
Other machinery and equipment	718	1,011	40.8%	6.7%	9.0%
Machinery and equipment Units	928	1,289	38.9%	8.7%	11.5%
(million yen)	(3,771)	(5,118)	(35.7%)	(8.0%)	(10.6%)
Electronic computers	48	4	-91.7%	0.4%	0.0%
Consumer electrical machinery	218	286	31.2%	2.0%	2.6%
Industrial electrical machinery	292	391	33.9%	2.7%	3.5%
Communication equipment	373	394	5.6%	3.5%	3.5%
Video and audio equipment	10	14	40.0%	0.1%	0.1%
Electronic components/devices/circuits	1,649	1,905	15.5%	15.4%	17.0%
Other electrical machinery	651	693	6.5%	6.1%	6.2%
Electrical machinery Units	3,241	3,687	13.8%	30.3%	32.9%
(million yen)	(14,371)	(16,433)	(14.3%)	(30.7%)	(34.1%)
Precision instruments	56	80	42.9%	0.5%	0.7%
Motor vehicles	1,057	1,192	12.8%	9.9%	10.6%
Auto parts	2,418	2,167	-10.4%	22.6%	19.3%
Motor vehicles and auto parts Units	3,475	3,359	-3.3%	32.4%	30.0%
(million yen)	(15,034)	(14,032)	(-6.7%)	(32.1%)	(29.1%)
Other transport equipment	119	84	-29.4%	1.1%	0.7%
Food products, beverages, and tobacco products	186	215	15.6%	1.7%	1.9%
Chemical products	112	110	-1.8%	1.0%	1.0%
Plastic products	283	238	-15.9%	2.6%	2.1%
Other industries	795	707	-11.1%	7.4%	6.3%
Non-manufacturing industry	155	84	-45.8%	1.4%	0.7%
Unspecified	760	717	-5.7%	7.1%	6.4%
Total domestic shipments Units	10,713	11,211	4.6%	100.0%	100.0%
(million yen)	(46,876)	(48,146)	(2.7%)	19.0%	17.5%
				(100.0%)	(100.0%)
				(23.3%)	(21.3%)
Export Units	45,610	52,873	15.9%	81.0%	82.5%
(million yen)	(154,583)	(177,874)	(15.1%)	(76.7%)	(78.7%)
Grand total Units	56,323	64,084	13.8%	100.0%	100.0%
(million yen)	(201,459)	(226,021)	(12.2%)	(100.0%)	(100.0%)

Note)

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