

July - September 2013 Results
Production and Shipments of Manipulators and Robots by Application Areas
[JARA Member Companies]

Number of units, (): million yen

Production	July - September 2012		July - September 2013		Change from 2012	
		25,719 (108,844)		27,161 (105,576)		+5.6% (-3.0%)

Shipments	July - September 2012			July - September 2013			Change from 2012			July - September 2012 (percentage distribution)			July - September 2013 (percentage distribution)			
	Application area	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total	Domestic shipments	Exports	Total
Plastic moulding		578	1,288	1,866	543	1,135	1,678	-6.1%	-11.9%	-10.1%	7.8%	6.9%	7.2%	7.8%	5.5%	6.1%
Arc welding		1,021	3,921	4,942	914	4,117	5,031	-10.5%	+5.0%	+1.8%	13.7%	21.1%	19.0%	13.1%	20.1%	18.3%
Spot welding		918	2,672	3,590	591	3,094	3,685	-35.6%	+15.8%	+2.6%	12.3%	14.4%	13.8%	8.5%	15.1%	13.4%
Laser welding		16	3	19	11	11	11									
Others		1	1	1	4	2	6									
Welding	Units	1,956	6,596	8,552	1,520	7,213	8,733	-22.3%	+9.4%	+2.1%	26.3%	35.5%	32.9%	21.9%	35.2%	31.8%
	(million yen)	(8,185)	(16,451)	(24,636)	(6,644)	(17,781)	(24,425)	(-18.8%)	(+8.1%)	(-0.9%)	(23.5%)	(22.1%)	(22.5%)	(22.1%)	(23.3%)	(23.0%)
Painting		144	302	446	108	229	337	-25.0%	-24.2%	-24.4%	1.9%	1.6%	1.7%	1.6%	1.1%	1.2%
Loading/unloading		299	577	876	315	1,172	1,487									
Mechanical cutting		2	1	3												
Grinding/deburring		26	52	78	20	12	32									
Others		12	1	13	16	1	17									
Machining	Units	339	631	970	351	1,185	1,536	+3.5%	+87.8%	+58.4%	4.6%	3.4%	3.7%	5.0%	5.8%	5.6%
	(million yen)	(1,675)	(1,782)	(3,457)	(823)	(1,957)	(2,781)	(-50.8%)	(+9.8%)	(-19.6%)	(4.8%)	(2.4%)	(3.2%)	(2.7%)	(2.6%)	(2.6%)
Surface Mount Technology		318	1,891	2,209	248	1,941	2,189	-22.0%	+2.6%	-0.9%	4.3%	10.2%	8.5%	3.6%	9.5%	8.0%
General Assembly		1,232	2,931	4,163	1,264	2,048	3,312	+2.6%	-30.1%	-20.4%	16.5%	15.8%	16.0%	18.2%	10.0%	12.1%
Other Assembly		375	141	516	537	159	696	+43.2%	+12.8%	+34.9%	5.0%	0.8%	2.0%	7.7%	0.8%	2.5%
Bonding		308		308	515		515									
Soldering		1		1	1		1									
Sealing/glueing		57	59	116	16	82	98									
Screwing		1		1	1		1									
Others		8	82	90	4	77	81									
Assembly	Units	1,607	3,072	4,679	1,801	2,207	4,008	+12.1%	-28.2%	-14.3%	21.6%	16.5%	18.0%	25.9%	10.8%	14.6%
	(million yen)	(8,131)	(34,141)	(42,272)	(6,715)	(32,693)	(39,408)	(-17.4%)	(-4.2%)	(-6.8%)	(23.4%)	(45.8%)	(38.7%)	(22.3%)	(42.8%)	(37.0%)
Palletizing/depalletizing		210	514	724	231	485	716	+10.0%	-5.6%	-1.1%	2.8%	2.8%	2.8%	3.3%	2.4%	2.6%
Material handling		1,342	3,158	4,500	1,015	4,157	5,172	-24.4%	+31.6%	+14.9%	18.0%	17.0%	17.3%	14.6%	20.3%	18.9%
FPD		52	179	231	93	201	294	+78.8%	+12.3%	+27.3%	0.7%	1.0%	0.9%	1.3%	1.0%	1.1%
Semiconductor		521	622	1,143	608	907	1,515	+16.7%	+45.8%	+32.5%	7.0%	3.4%	4.4%	8.7%	4.4%	5.5%
Others																
Cleanroom	Units	573	801	1,374	701	1,108	1,809	+22.3%	+38.3%	+31.7%	7.7%	4.3%	5.3%	10.1%	5.4%	6.6%
	(million yen)	(4,557)	(4,989)	(9,546)	(4,571)	(6,659)	(11,230)	(+0.3%)	(+33.5%)	(+17.6%)	(13.1%)	(6.7%)	(8.7%)	(15.2%)	(8.7%)	(10.6%)
Other applications		383	309	692	435	808	1,243	+13.6%	+161.5%	+79.6%	5.1%	1.7%	2.7%	6.3%	3.9%	4.5%
Total	Units	7,450	18,562	26,012	6,953	20,468	27,421	-6.7%	+10.3%	+5.4%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
	(million yen)	(34,795)	(74,471)	(109,266)	(30,057)	(76,365)	(106,422)	(-13.6%)	(+2.5%)	(-2.6%)	(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 2013 Results
Shipments of Manipulators and Robots by Industrial Branches
[JARA Member Companies]

Number of units, (): million yen

Industrial branches	2012 Jul-Sep	2013 Jul-Sep	Change from 2012	Percentage distribution	
				2012	2013
Metal products	321	306	-4.7%	4.3%	4.4%
┆Construction Machinery	34	20	-41.2%	0.5%	0.3%
┆Metalworking machinery	124	151	+21.8%	1.7%	2.2%
┆Other machinery and equipment	109	110	+0.9%	1.5%	1.6%
Machinery and equipment	267	281	+5.2%	3.6%	4.0%
Units					
(million yen)	(1,091)	(860)	(-21.1%)	(3.1%)	(2.9%)
┆Computers	32	8	-75.0%	0.4%	0.1%
┆Consumer electrical machinery	97	95	-2.1%	1.3%	1.4%
┆Industrial electrical machinery	140	156	+11.4%	1.9%	2.2%
┆Info-communications equipment	216	159	-26.4%	2.9%	2.3%
┆VTR	0	0		0.0%	0.0%
┆Electronic components/devices	877	1,295	+47.7%	11.8%	18.6%
┆Other electrical machinery	743	646	-13.1%	10.0%	9.3%
Electrical machinery	2,105	2,359	+12.1%	28.3%	33.9%
Units					
(million yen)	(11,723)	(10,747)	(-8.3%)	(33.7%)	(35.8%)
Precision and optical instruments	294	153	-48.0%	3.9%	2.2%
┆Motor vehicles	1,144	598	-47.7%	15.4%	8.6%
┆Auto parts	1,658	1,480	-10.7%	22.3%	21.3%
Motor vehicles and auto parts	2,802	2,078	-25.8%	37.6%	29.9%
Units					
(million yen)	(13,049)	(8,579)	(-34.3%)	(37.5%)	(28.5%)
Food products, beverages, and tobacco products	141	184	+30.5%	1.9%	2.6%
Plastic products	590	562	-4.7%	7.9%	8.1%
Chemical products	41	82	+100.0%	0.6%	1.2%
Non-manufacturing	50	78	+56.0%	0.7%	1.1%
Other industries	839	870	+3.7%	11.3%	12.5%
Total domestic shipments	7,450	6,953	-6.7%	100.0%	100.0%
Units					
(million yen)	(34,795)	(30,057)	(-13.6%)	28.6%	25.4%
(million yen)	(100.0%)	(100.0%)		(31.8%)	(28.2%)
Export	18,562	20,468	+10.3%	71.4%	74.6%
Units					
(million yen)	(74,471)	(76,365)	(+2.5%)	(68.2%)	(71.8%)
Grand total	26,012	27,421	+5.4%	100.0%	100.0%
Units					
(million yen)	(109,266)	(106,422)	(-2.6%)	(100.0%)	(100.0%)

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

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