YASKAWA

FY2018 Financial Results (Ended February 28, 2019)

FY2019 Full-year Financial Forecasts (Ending February 29, 2020)

Notes:

- The Company changed its accounting period in fiscal 2017 from March 20 to the last day of February.
 - The results of fiscal 2017 are shown as <reference>. The <reference> figures are based on an assumption that the accounting period remained unchanged. (from March 21, 2017 to March 20, 2018)
 - Due to the difference in the periods of fiscal 2018 and fiscal 2017, the year-on-year changes of the fiscal year results in this material are shown as <reference>.
- The information within this document is made as of the date of writing. Any forward-looking statements are made according to the assumptions of management and are subject to change as a result of risks and uncertainties. YASKAWA Electric Corporation undertakes no obligation to update or revise these forward-looking statements, whether as a result of new information, future events, or otherwise.
- Figures in this document are rounded off, and may differ from those in other documents such as financial results.

YASKAWA ELECTRIC CORPORATION (TSE6506)

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Business Overview

Motion Control

(Core products)

- AC servo motors and controllers
- Linear servo motors
- AC drives





Robotics

(Core products)

- Industrial robots
- Arc and spot welding robots, painting robots
- FPD glass sheet transfer robots, handling robots
- Semiconductor wafer transfer robots
- Biomedical robots
- Collaborative robots



System Engineering

[Core products]

- Electrical systems for steel plants
- Flectrical instrumentation systems for water supply plants and sewage treatment facilities
- Large-scale wind power generator and converter
- PV inverters





Electrical instrumentation systems for water and sewerage

Other

[Core products]

EV drive system

PV inverter XGI1000

Logistics

1. FY2018 Financial Results (Ending February 28, 2019)

FY2018 Financial Results (Highlights)

 Although sales were solid, profit declined due to the effect from U.S.-China trade friction

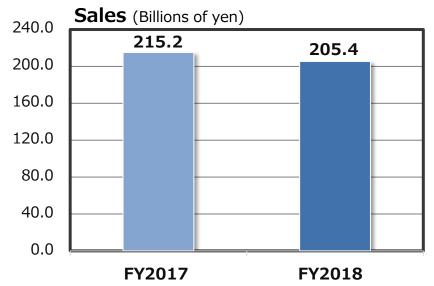
	FY2018	FY2017	Changes (Reference)	
	Results	Results (Reference)	Amounts	%
Net sales	¥ 474.6bn.	¥ 464.5bn.	+¥ 10.1bn.	+2.2%
Operating income	¥ 49.8bn.	¥ 57.1bn.	-¥ 7.4bn.	-12.9%
Ordinary income	¥ 50.8bn.	¥ 58.3bn.	-¥ 7.5bn.	-12.8%
Profit attributable to owners of parent	¥ 41.2bn.	¥ 41.7bn.	-¥ 0.6bn.	-1.4%

FY2018 Financial Results by Business Segment

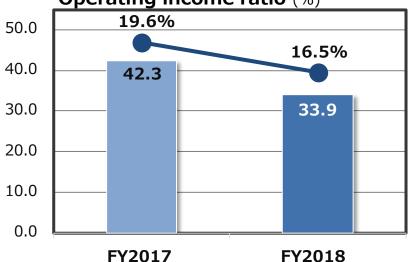
- While Motion Control was stagnant, Robotics sales increased
- System Engineering turned profitable with the effect of restructuring

	FY2	018	FY2017		Changes (Reference)	
(Billions of yen)	Results	Income ratio	Results (Reference)	Income ratio	Amounts	%
Net sales	474.6		464.5		+10.1	+2.2%
Motion Control	205.4		215.2		-9.8	-4.6%
Robotics	178.0		166.8		+11.2	+6.7%
System Engineering	59.5		61.3		-1.8	-3.0%
Other	31.8		21.1		+10.6	+50.2%
Operating income	49.8	10.5%	57.1	12.3%	-7.4	-12.9%
Motion Control	33.9	16.5%	42.3	19.6%	-8.4	-19.8%
Robotics	17.3	9.7%	18.5	11.1%	-1.2	-6.3%
System Engineering	0.1	0.1%	-2.1	-3.4%	+2.2	-
Other	0.4	1.4%	-0.2	-0.7%	+0.6	-
Elimination or Corporate	-2.0	-	-1.4	-	-0.6	-
Ordinary income	50.8	10.7%	58.3	12.6%	-7.5	-12.8%
Profit attributable to owners of parent	41.2	8.7%	41.7	9.0%	-0.6	-1.4%

Business Segment Overview: Motion Control



Operating income (Billions of yen)
Operating income ratio (%)



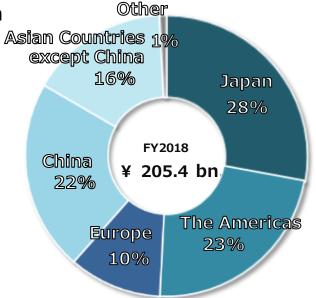
(Sales)

- AC servo & controller business stagnated due to rapid decline in the smartphone- and semiconductor-related capital expenditure demand, as well as the decline in the investments in the Chinese manufacturing sector overall, which was affected by the U.S.-China trade friction.
- Drives business was steady due to oil&gas-related demand in the U.S.

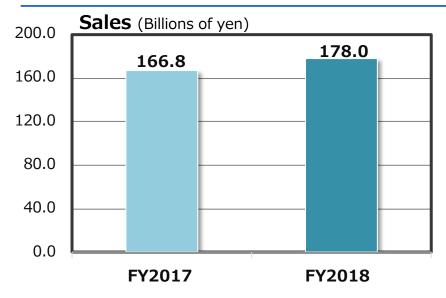
[Operating income]

Declined because of the significant slowdown in AC servo business in China

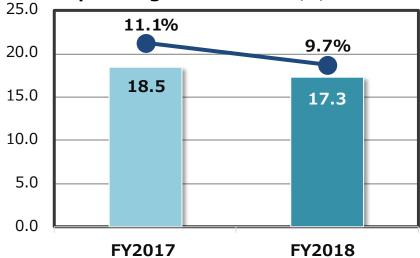




Business Segment Overview: Robotics



Operating income (Billions of yen)
Operating income ratio (%)



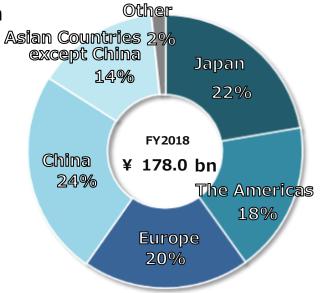
[Sales]

- Automobile-related sales remained high level globally, especially in Europe.
- As for general industries, the smartphone-related demand, which was strong in the previous fiscal year, decelerated.

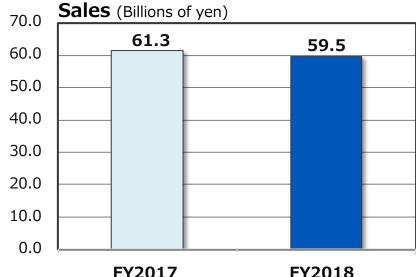
[Operating income]

 Stagnated due to drop in the operation ratio caused by the abrupt slowdown in demand from general industries in China

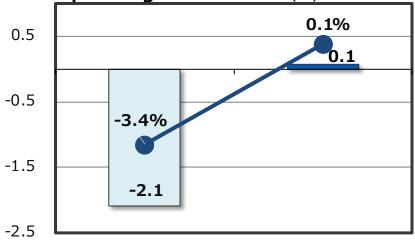
Sales breakdown by region



Business Segment Overview: System Engineering



Operating income/loss (Billions of yen)
Operating income ratio (%)



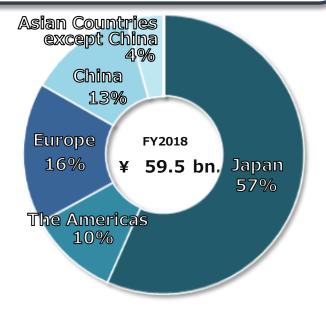
[Sales]

- Steel plant and social system businesses were solid by capturing the need for facility renovation.
- As for the clean power business, large-scale wind turbine business in Europe grew while the PV inverter sales stagnated.

[Operating income]

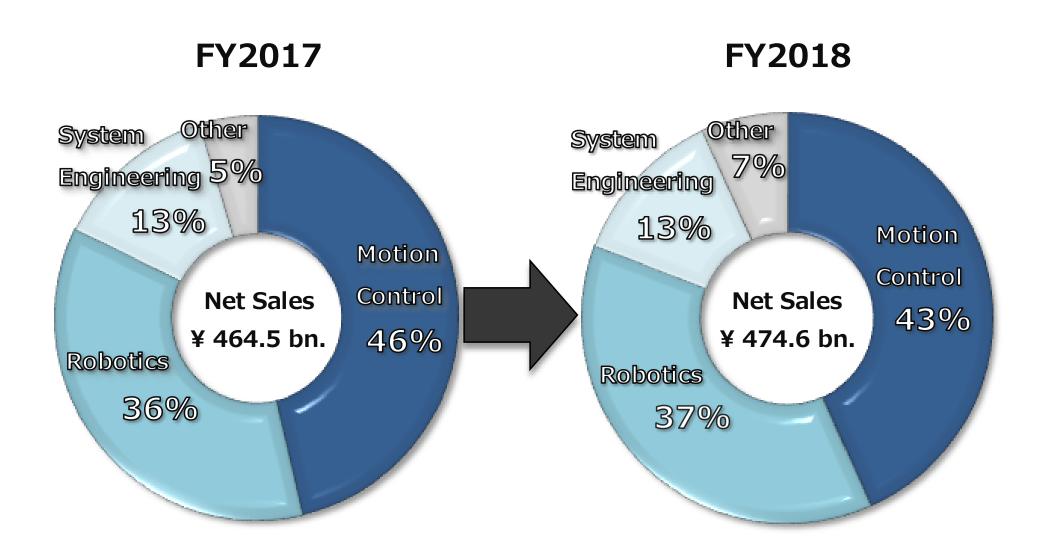
 Turned into the black due to sales growth of steel plant and social system businesses and cost reduction through restructuring of clean power business

Sales breakdown by region



FY2017

FY2018



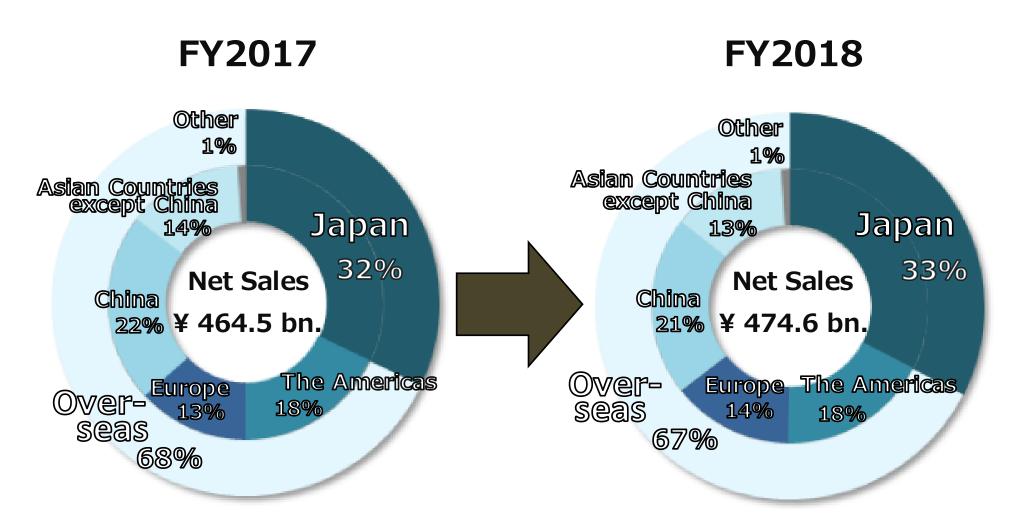
Sales Breakdown by Destination (1)

• Sales expanded in all regions except China

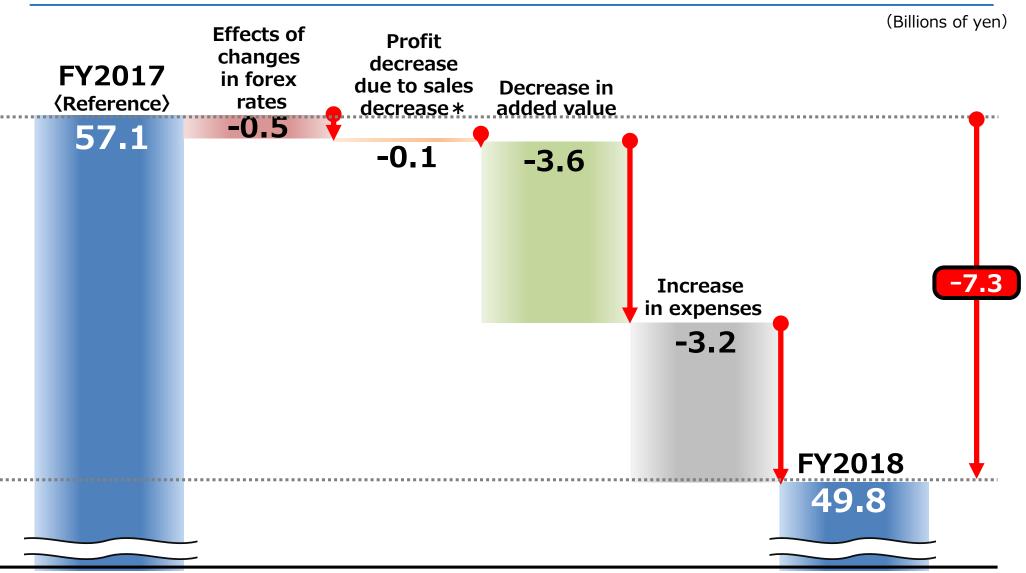
		FY2017	Changes (Reference)		
(Billions of yen)	FY2018	(Reference)	Amounts	%	
Net sales	474.6	464.5	+10.1	+2.2%	
Japan	154.5	148.8	+5.7	+3.8%	
Overseas	320.1	315.7	+4.4	+1.4%	
The Americas	84.9	83.8	+1.1	+1.3%	
Europe	66.6	60.9	+5.7	+9.3%	
China	100.2	103.5	-3.3	-3.2%	
Asian Countries except China	64.1	63.5	+0.6	+1.0%	
Other	4.3	4.0	+0.3	+8.5%	

Note: Other includes Australia and South Africa, etc.

Sales Breakdown by Destination (2)



Breakdown of Changes in Operating Income (FY2017 → FY2018)

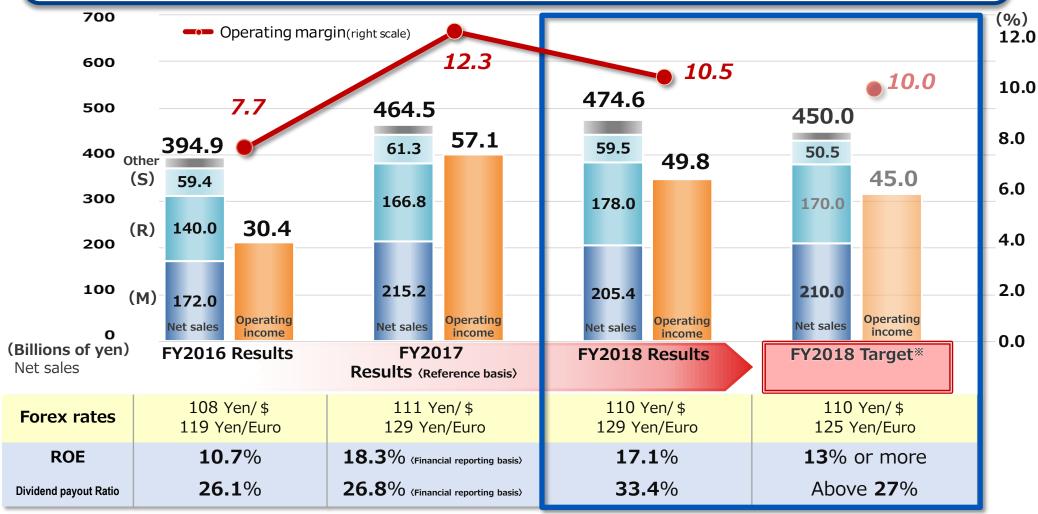


^{*}The effect of sales of newly consolidated subsidiaries is excluded.

2. Results of the Mid-Term Business Plan "Dash 25" (FY2016 - FY2018)

Achievements and Challenges of "Dash 25" (FY2016 - FY2018) (1)

Achieved corporate targets for sales, operating income and financial figures



Note1: FY2015 sales by business segment reflect the change in the division of business segments.

Note2: (M) = Motion Control (R) = Robotics (S) = System Engineering

*Figures announced in April 2016

Achievements and Challenges of "Dash 25" (FY2016 – FY2018) (2)

	Achievements	Challenges
Policy 1 Maximize results of the previous plan Realize100	Development & launch of new products • Enhanced line-up of AC servo and robot, as well as the switchover ratio Enhancement of production and sales capabilities • Expanded local production in China and Europe • Enhanced sales capability through business reforms and improved management efficiency	 Development & launch of new products Expansion of line-up of new AC drive products Enhancement of production and sales capabilities Building an agile production system to cope with fluctuations in demand Establishing competitive advantage in the automation field
Policy 2 Build foundation for realizing Vision 2025	Realization of Yaskawa Industrie 4.0 Started application of "i³-Mechatronics" concept Launched Yaskawa Solution Factory Formed sales organization to enable provision of integrated solutions Established AI³, a subsidiary for the development of AI solutions Launched software tool "YASKAWA Cockpit" Expansion of core business areas Established joint ventures with partners such as Everwin and Midea Automation of food production Established a subsidiary and launched automated vegetable plant business	Realization of "i3-Mechatronics" concept · Creation of business based on "i³-Mechatronics" Expansion of core business areas · Expansion of robotics business in China and Asia Automation of food production · Demonstration of automation of production processes and expansion of solutions
Policy 3 Grow clean power into core business	 Clean Power business Expanded sales and achieved profitability of largescale wind turbine business Launched new product of PV inverter Reformed global business structure EV business Started commercial production at joint venture with Chery 	Clean Power business • Establishment of stable earnings structure for PV inverter business

3. FY2019 Financial Forecasts (Ending February 29, 2020)

FY2019 Financial Forecasts (Highlight)

• Decline in sales and profits forecasted, based on the orders of 2H/FY2018

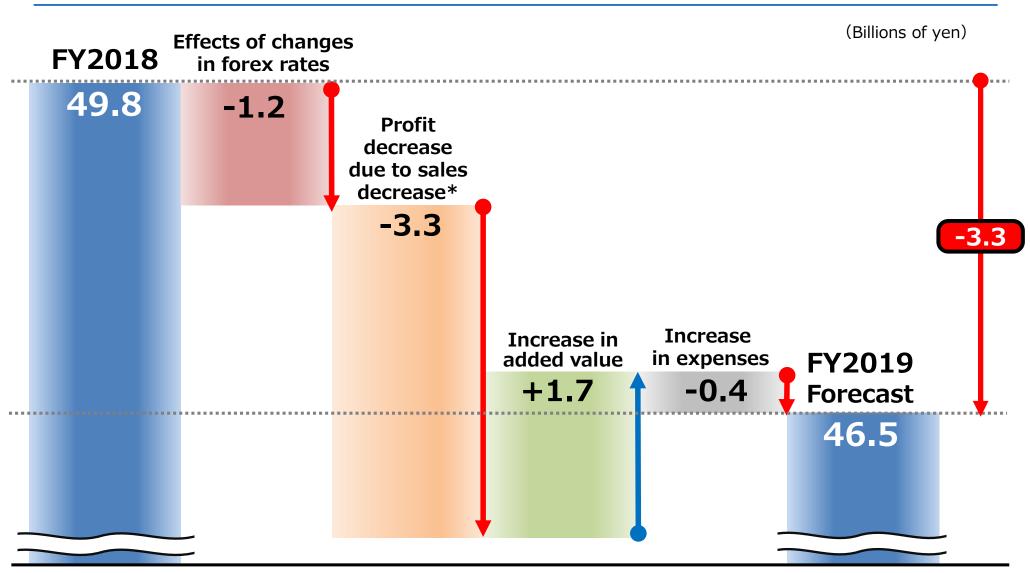
	FY2019	FY2018	Changes	
	Forecasts	Results	Amounts	%
Net sales	¥ 465.0bn.	¥ 474.6bn.	-¥ 9.6bn.	-2.0%
Operating income	¥ 46.5bn.	¥ 49.8bn.	-¥ 3.3bn.	-6.6%
Ordinary income	¥ 48.0bn.	¥ 50.8bn.	-¥ 2.8bn.	-5.6%
Profit attributable to owners of parent	¥ 35.0bn.	¥ 41.2bn.	-¥ 6.2bn.	-15.0%

FY2019 Financial Forecasts by Business Segment

	FY2	FY2019)18	Changes	
(Billions of yen)	Forecasts	Income ratio	Results <after business="" reclassification="">*</after>	Income ratio	Amounts	%
Net sales	465.0		474.6		-9.6	-2.0%
Motion Control	207.0		213.3		-6.2	-2.9%
Robotics	175.7		178.0		-2.2	-1.3%
System Engineering	54.6		51.6		+3.0	+5.8%
Other	27.6		31.8		-4.1	-13.0%
Operating income	46.5	10.0%	49.8	10.5%	-3.3	-6.6%
Motion Control	30.6	14.8%	34.2	16.1%	-3.6	-10.5%
Robotics	17.5	10.0%	17.3	9.7%	+0.2	+1.4%
System Engineering	0.7	1.2%	-0.3	-0.5%	+0.9	-
Other	-0.4	-1.3%	0.4	1.4%	-0.8	-
Elimination or Corporate	-2.0	-	-2.0	-	-0.0	-
Ordinary income	48.0	10.3%	50.8	10.7%	-2.8	-5.6%
Profit attributable to owners of parent	35.0	7.5%	41.2	8.7%	-6.2	-15.0%

^{*} The figures for FY2018 reflect the business reclassification carried out in FY2019. Please see page 24 for details.

Breakdown of Changes in Operating Income (FY2018 → FY2019 Forecast)



^{*}The effect of sales of newly consolidated subsidiaries is excluded.

Measures for FY2019 (1)

Enhance sales capabilities

- **→**Establish the business model to realize the "i³-Mechatronics" concept
 - Maximize customers' value by providing integrated solutions (products+digital data management) that solve their business challenges

> Enhance development capabilities

→ Prepare for the establishment of YASKAWA Technology Center*

 Speed up development by establishing R&D system that covers processes from basic research to test production and quality management

*A tentative name Planned to open in FY2020

- Increase utilization of open innovation, including joint research among government, industry and academia
- **→** Develop new flagship products
 - Develop new AC servo drive series
 - Develop integrated controller

> Enhance production capabilities

- **→**Expand local production
 - · Establish a stable production system at robot factory in Slovenia
- **→**Expand application of i³-Mechatronics
 - Further evolve YASKAWA Solution Factory and apply the concept globally



Robot factory in Slovenia

Measures for FY2019 (2)

> Expand new businesses

→ Strengthen alliance in the field of food production and agriculture

- Provide automated system for the production of home-meal replacements to the major convenience store chains in Japan
- Expand sales of automated vegetable plant system that realizes stable supply of agricultural products

> Improve profitability of System Engineering segment

→Improve profitability of Clean Power business

- Expand orders for electric components for offshore wind turbines in Europe
- Expand sales of new PV inverter in the U.S.

→Improve efficiency of existing businesses through reorganization

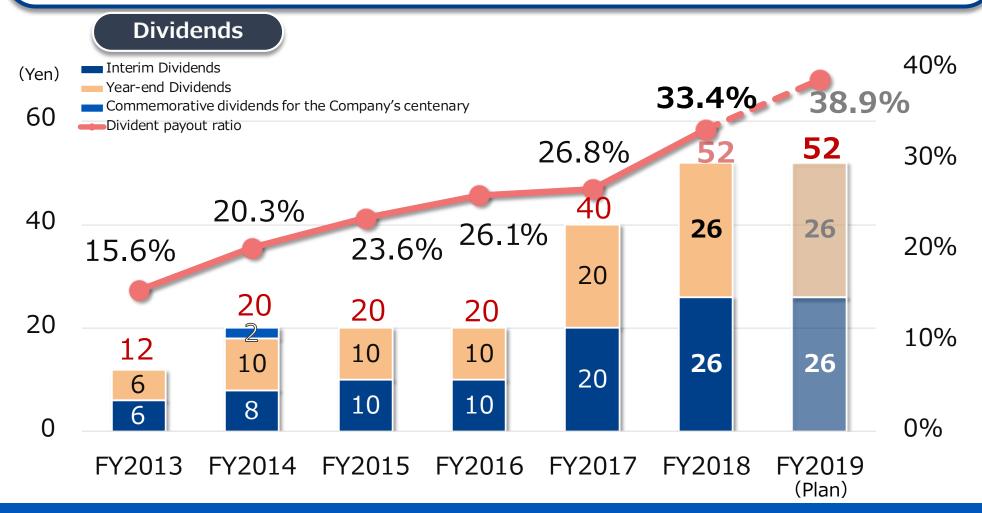
 Promote efficiency of automation drive business through Yaskawa Automation & Drives Corp.



PV inverter XGI1000 65kW

Shareholder Return (Acquisition of treasury shares and dividends)

- Acquisition of two million treasury shares (max. nine billion yen in value terms)
- Plan for annual dividend per share remain at ¥52 (payout ratio: 38.9%)



4. Reference

Retroactive application of business reclassification to the FY2018 results

Reclassified the production function for servo motor and EV motor as well as the PM motor business of Yaskawa Motor Co. Ltd., which used to be included in System Engineering, as Motion Control starting FY2019

	FY2018 (After segment revision)						Changes		
	(Unit: Billions of yen)	1Q	2Q	1H	3Q	4Q	2H	Full-Year	Full-Year
Net	sales	128.2	120.0	248.2	113.1	113.3	226.4	474.6	-
	Motion Control	61.8	56.0	117.8	50.3	45.2	95.5	213.3	7.8
	Robotics	43.9	44.3	88.2	43.6	46.2	89.8	178.0	_
	System Engineering	11.9	11.5	23.5	12.4	15.8	28.2	51.6	-7.8
	Other	10.6	8.2	18.8	6.8	6.2	13.0	31.8	-
Ope	rating income	17.2	13.3	30.5	11.1	8.1	19.3	49.8	-
	Motion Control	12.4	9.9	22.4	7.3	4.6	11.9	34.2	+0.3
	Robotics	5.0	4.2	9.2	4.4	3.7	8.1	17.3	-
	System Engineering	-0.4	-0.3	-0.7	0.1	0.3	0.4	-0.3	-0.3
	Other	0.6	-0.0	0.6	-0.1	0.0	-0.1	0.4	-
	Elimination or Corporate	-0.5	-0.5	-1.0	-0.4	-0.5	-0.9	-2.0	-

Capital Expenditure, R&D Investment, Forex Rates

Capital expenditure, R&D investment

(Unit: Billions of Yen)

	F Y 2 0 1 7	F Y 2 0 1 8	F Y 2 0 1 9 (Plan)
Capital expenditure	19.69	35.65	30.00
Depreciation and Amortization	12.69	14.31	15.00
R&D investment	19.07	20.79	21.00

Forex rates

Note: Average rate during the period

(Unit: Yen)

	F	FY2017			Y 2 0 1	8	FY2019 (Forecasts)
	1 H	2 H	Full-Year	1 H	2 H	Full-Year	Full-Year
U.S. doller	111.5	111.5	111.5	109.3	111.7	110.5	110.0
Euro	124.4	133.3	128.8	129.9	127.8	128.9	125.0
Yuan	16.35	17.08	16.71	16.81	16.28	16.56	16.50
Won	0.099	0.101	0.099	0.100	0.099	0.100	0.100

Forex sensitivity

(Unit: Billions of Yen)

	Impact of 1% fluctuation (full-year,forecasts)					
	Net sales Operatiing income					
U.S. doller	approx. 0.93	approx. 0.23				
Euro	approx. 0.74	approx. 0.21				
Yuan	approx. 0.98	approx. 0.25				
Won	approx. 0.30	approx. 0.19				

Financial Indices

As of February 28, 2018 ➤ Shareholders' equity ratio 53.5% ➤ Shareholders' equity 235.9 billion yen ➤ Interest-bearing debt 32.2 billion yen ➤D/E ratio 0.14 (Net D/E ratio) -0.04**▶**Inventory 100.1 billion yen Turnover 2.7 months **≻**ROE 18.3%



As of February 28, 2019 Shareholders' equity ratio Shareholders' equity Interest-bearing debt D/E ratio (Net D/E ratio) 54.1% 246.7 billion yen 48.7 billion yen 0.20 0.04

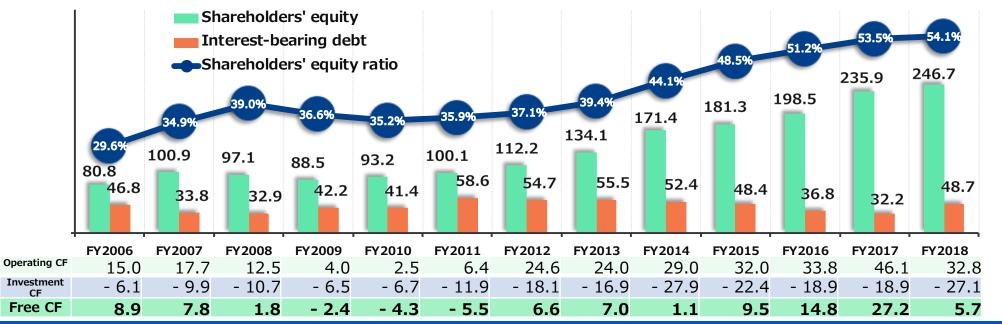
(Net D/E ratio)
➤Inventory
Turnover
➤ROE

111.5 billion yen 2.8 months 17.1%

*Interest-bearing debt includes lease obligations.

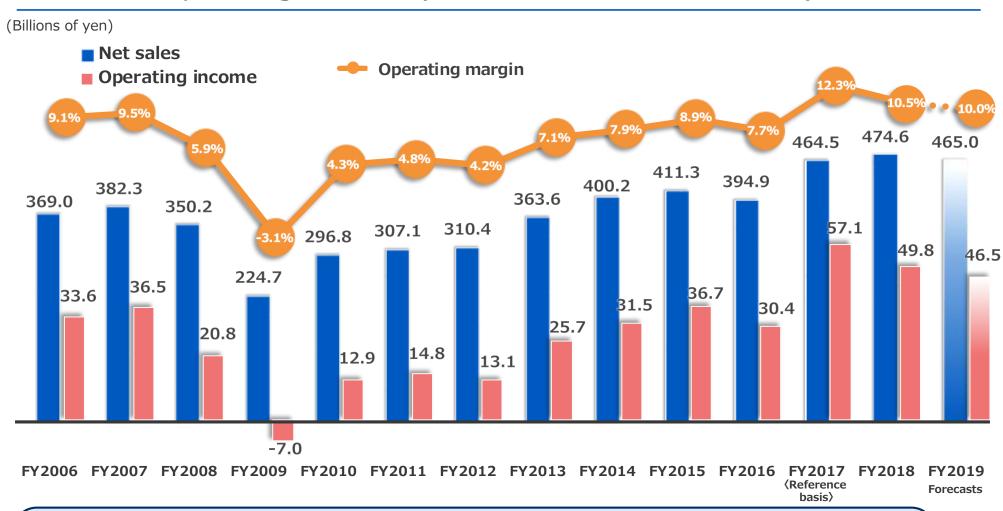
*Inventory at the end of the period is used for calculating turnover months.

*ROE= Net income / Shareholders' equity (average of beginning and end of fiscal year)



(Billions of yen)

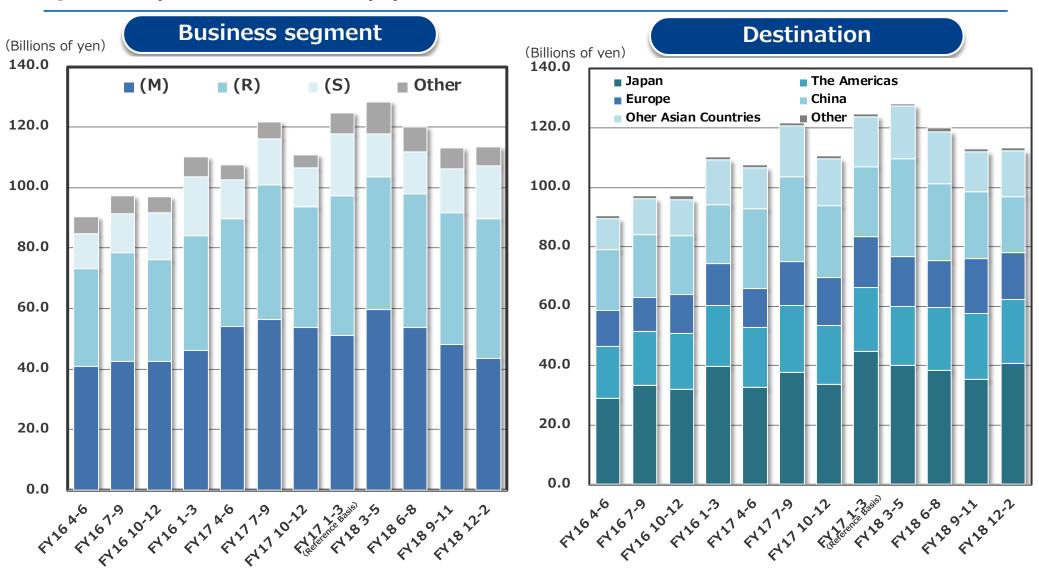
Net Sales/Operating Income (FY2006 - FY2019 Forecasts)



Dash 100 Challenge 100 Realize 100 Dash 25
Mid-term business plans

Note: The data for FY2017 are made on a reference basis. (March 21, 2017 - March 20, 2018)

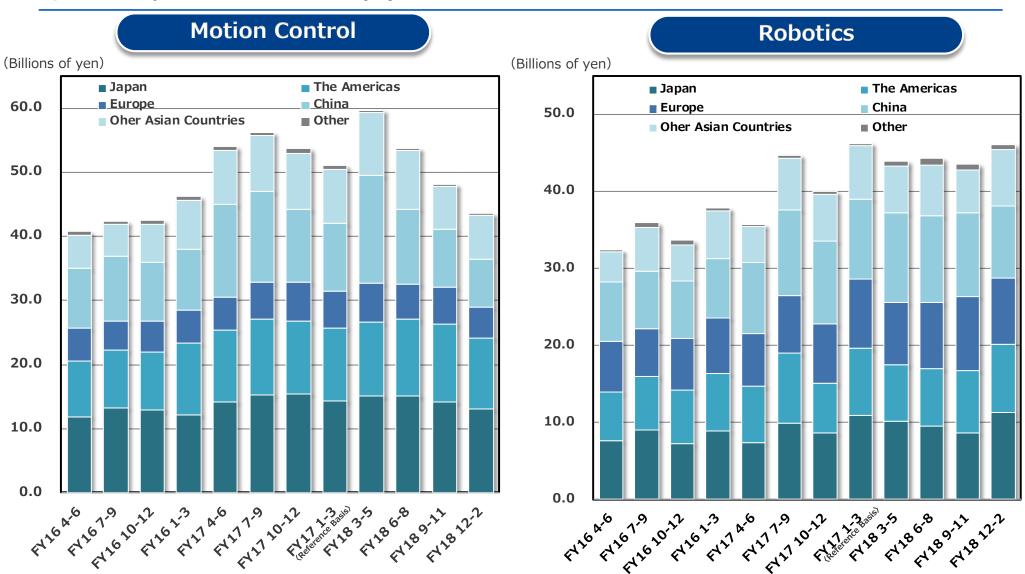
Quarterly Sales Trends (1)



Note1: The data for FY2017 4Q(1-3) are made on a reference basis. (December 21, 2017 – March 20, 2018)

Note2: (M) = Motion Control (R) = Robotics (S) = System Engineering

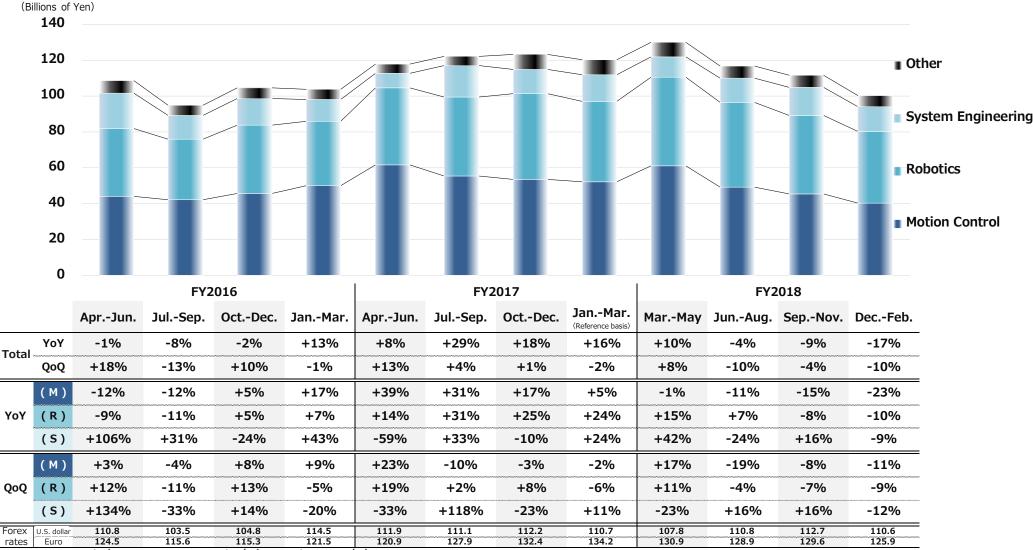
Quarterly Sales Trends (2)



Note: The data for FY2017 4Q(1-3) are made on a reference basis. (December 21, 2017 - March 20, 2018)



Quarterly Order Trends by Business Segment *Average forex rates during period used

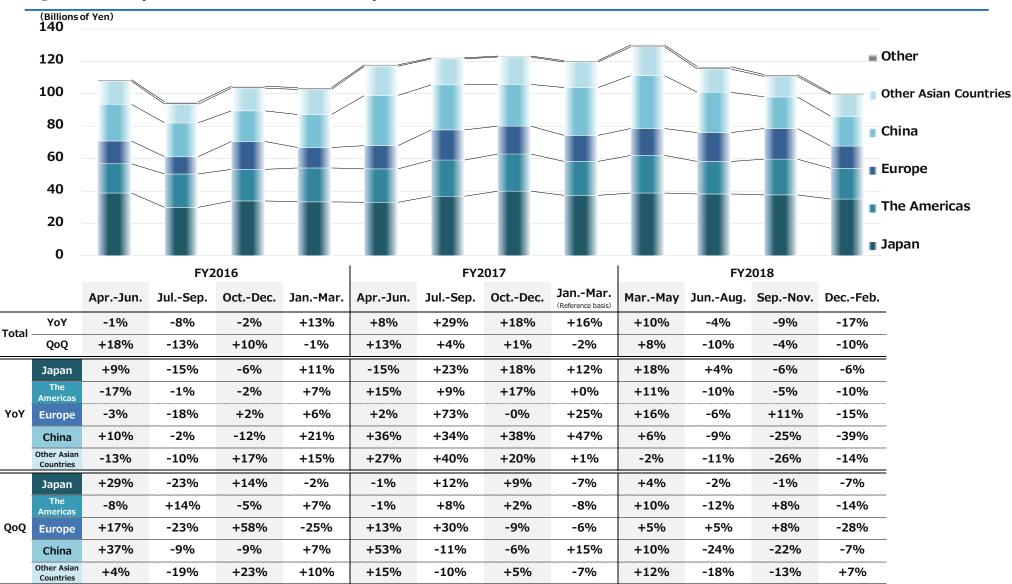


Note1: (M) = Motion Control (R) = Robotics (S) = System Engineering

Note2: The data for FY2017 4Q(Jan.-Mar.) are made on a reference basis. (December 21, 2017 - March 20, 2018)



Quarterly Order Trends by Destination *Average forex rates during period used



Note: The data for FY2017 4Q(Jan.-Mar.) are made on a reference basis. (December 21, 2017 - March 20, 2018)



Major Production Bases





YASKAWA Europe Robotics d.o.o Slovenia



YASKAWA (China) Robotics Co., Ltd China



YASKAWA Ellen (東南) 有限公司

YASKAWA Electric (Shenyang) Co., Ltd





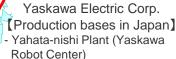
YASKAWA India Private Ltd.
Robotics Div. India





Shanghai Yaskawa Drive Co., Ltd.





- -Yahata-higashi Plant
- -Yukuhashi Plant (Drive Center) System Engineering Center)
- -Iruma Plant (Solution Center)
- -Nakama Plant



YASKAWA America, Inc. Drives&Motion Div.

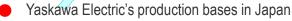


YASKAWA Canada, Inc.





YASKAWA Motoman Mexico, S.A. de C.V. Mexico



Major overseas production bases







YASKAWA