

Automotive Systems Business Strategy

Hitachi IR Day 2013

June 13, 2013

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Chairman & CEO

Hitachi Automotive Systems, Ltd.

Automotive Systems Business Strategy

Contents

- 1. Business Overview**
2. Market Trends
3. Growth Strategy
4. Business Targets

Harness advanced technologies in the environment, safety and information fields to create new value for people, automobiles and society, and a richer society

Become the most globally trusted corporate group

Environment

Eco-friendly energy control with high efficiency

Information

Information and telecommunication solutions for improving the riding experience inside automobiles and convenience

Safety

Optimal safe driving control in terms of driving, steering and braking

1-2. Business Structure

Drive control systems



Car information systems



Other

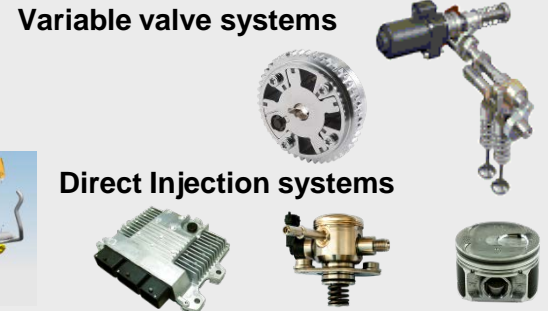


Powertrain & electronic control systems

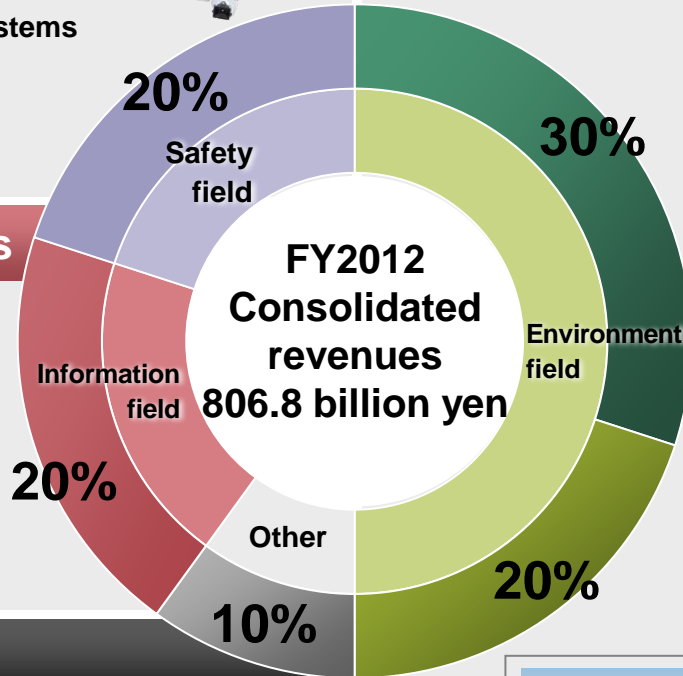
Hybrid systems



Engine management systems



Engine components systems



1-3. Hitachi's Management Structure

Hitachi Ltd., President

Infrastructure Systems Group

Information & Telecommunication
Systems Group

Power Systems Group

Construction Machinery Group

High Function Materials &
Components Group

Automotive Systems Group

Established as
an independent group
from the Infrastructure
Systems Group
on April 1, 2013

Grow the automotive components business as a core business
by operating the business and marketing management decisions
closer to the market as a market-responsive organization

Automotive Systems Business Strategy

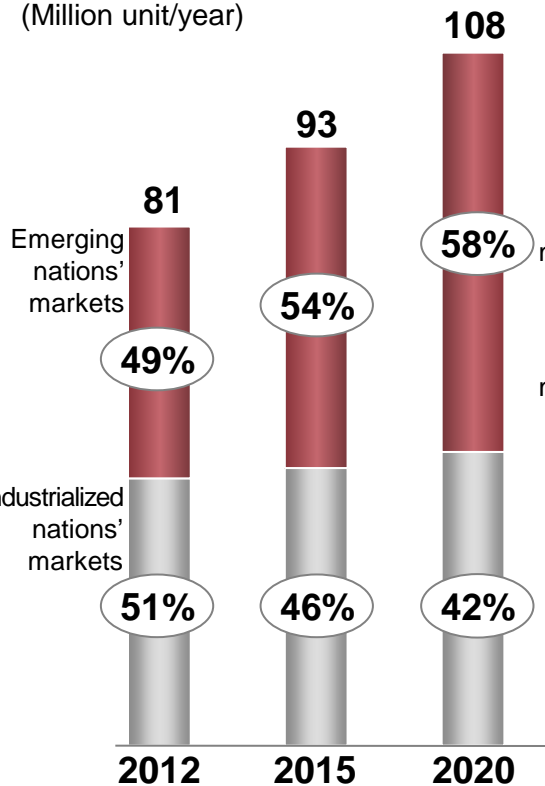
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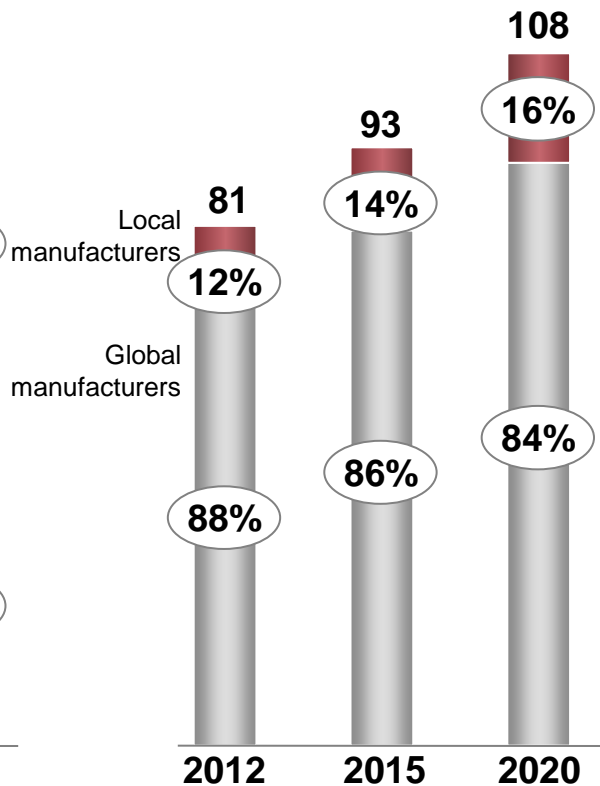
2-1. Global Auto Production Trends

By region

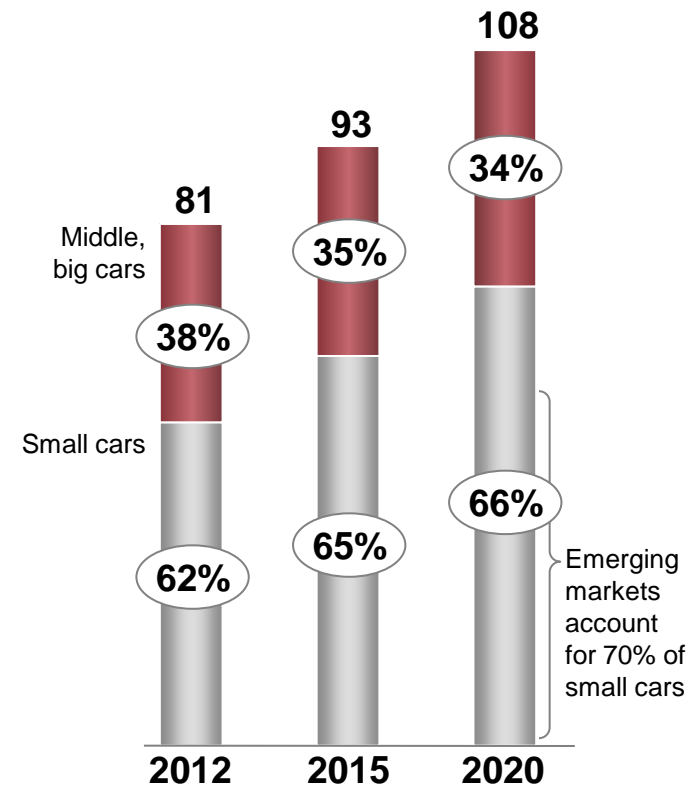
(Million unit/year)



By auto-manufacturers



By vehicle segments

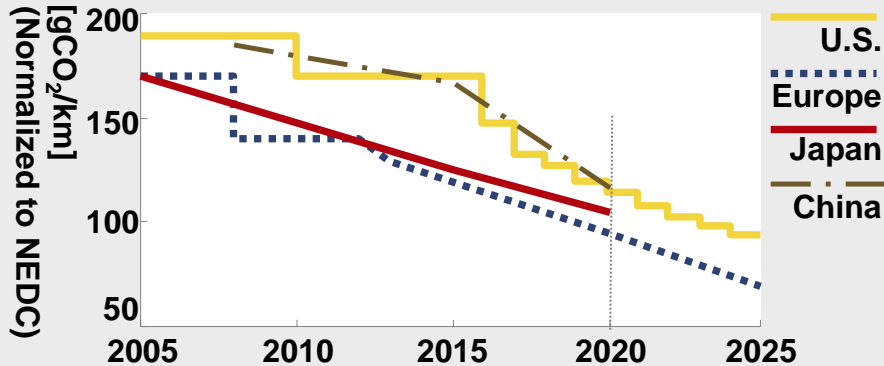


Source: Data compiled in-house from data provided by IHS Automotive

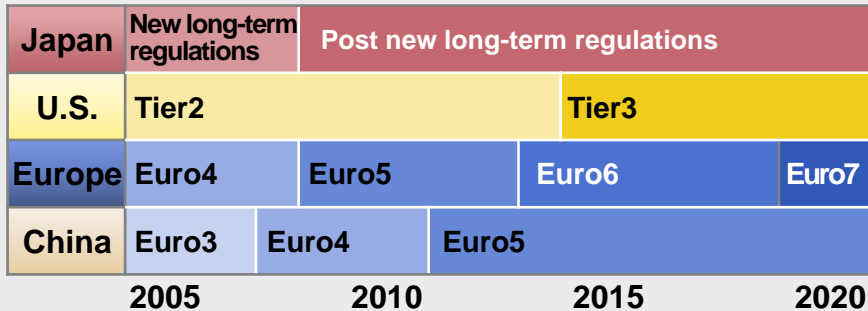
- Global carmakers will capture a large share as emerging nations' markets expand
- Small car production in particular will expand in emerging markets

Environmental regulations

CO₂ regulations



Stringent emission regulations (Nitrogen Oxide, Particulate Matter, etc)



Environmental regulations are slowly being applied in emerging nations as well as industrialized countries

Safety evaluation

region	Evaluate institution	2012	2013	2014	2015	2016	2017 → 2020
U.S.	NCAP /IIHS*	Collision warning / Lane departure warning		Collision avoidance / Mitigate damage			
		Excessive speed warning		Lane departure warning Low-medium-high speed collision avoidance Mitigate damage			
Europe	Euro-NCAP	Collision avoidance pedestrians		Collision avoidance / Mitigate damage			
Japan	JNCAP	Lane departure warning		Collision avoidance pedestrians			
		Night time pedestrians collision avoidance		Collision avoidance / Mitigate damage			

*NCAP: European New Car Assessment Programme

IIHS: Insurance Institute for Highway Safety

Light Gray : Car safety evaluation Dark Blue : Safety evaluation for pedestrians

Requirement of safety evaluation more on pedestrian protection than cars collision avoidance

Increased focus on mobility technology for creating a sustainable society

Environment

- Enhancing state-of-the-art electronic control and electric drive technologies
 - Creation of more efficient internal combustion engines
 - Improvement of power-saving technologies for P-HEVs and EVs

Safety

- Advance from collision safety to preventive safety
- Create automobiles that don't collide using outside recognition sensors and chassis electronic control technologies

Information

- Link automobiles and society with IT
- Use information technology as a bridge between automobiles and the outside to improve comfort and convenience as well as add value to automobiles

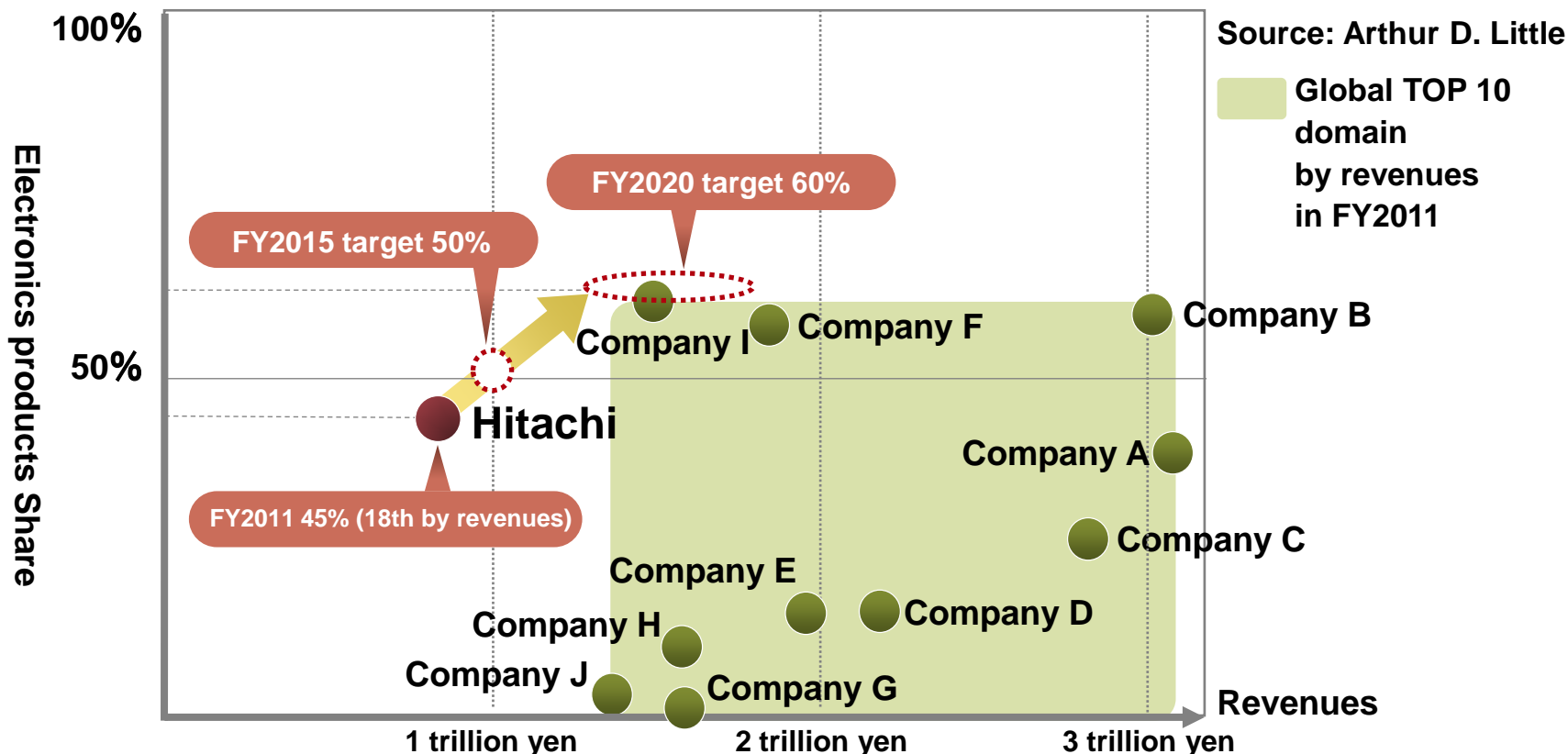
Leverage
next-generation
mobility technology
to make automobiles smarter
and realize automated driving

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Electronics products* share of TOP 10 global parts suppliers by revenue in FY2011



Enhance growth potential by increasing electronics products* share to world-leading level

*Electronics products: Electronic control and electric drive products such as electronic control units, hybrid systems, etc.

Global-winning global growth strategy

Customer strategy

Expand sales to global automakers

Strengthen proposals matched to customers' strategies

Regional strategy

Produce locally for local consumption in regions around the world

Focus on emerging nations

Product strategy

Build next-generation environment, safety systems

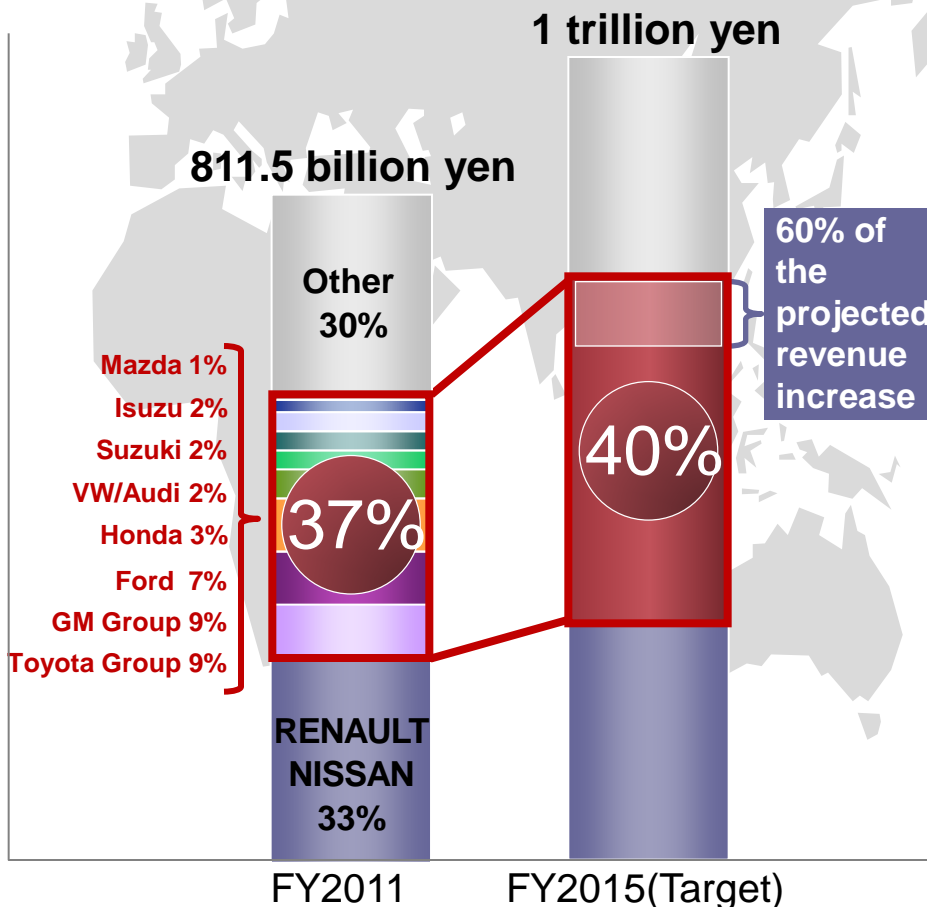
- **Increasing electronics products share**
- **Standardize globally**
- **Enhance core products**

Strengthen the global management foundation with an eye on 2020

Execute cost structure reform and cash flow management to make business operations stronger

Expand sales to global automakers

Customer composition and Targets



Strengthen proposal capabilities

Use GAM/GAT to strengthen global response

Bolster customer strategy-matching proposals by strengthening integrated contact points for customers expanding their businesses globally

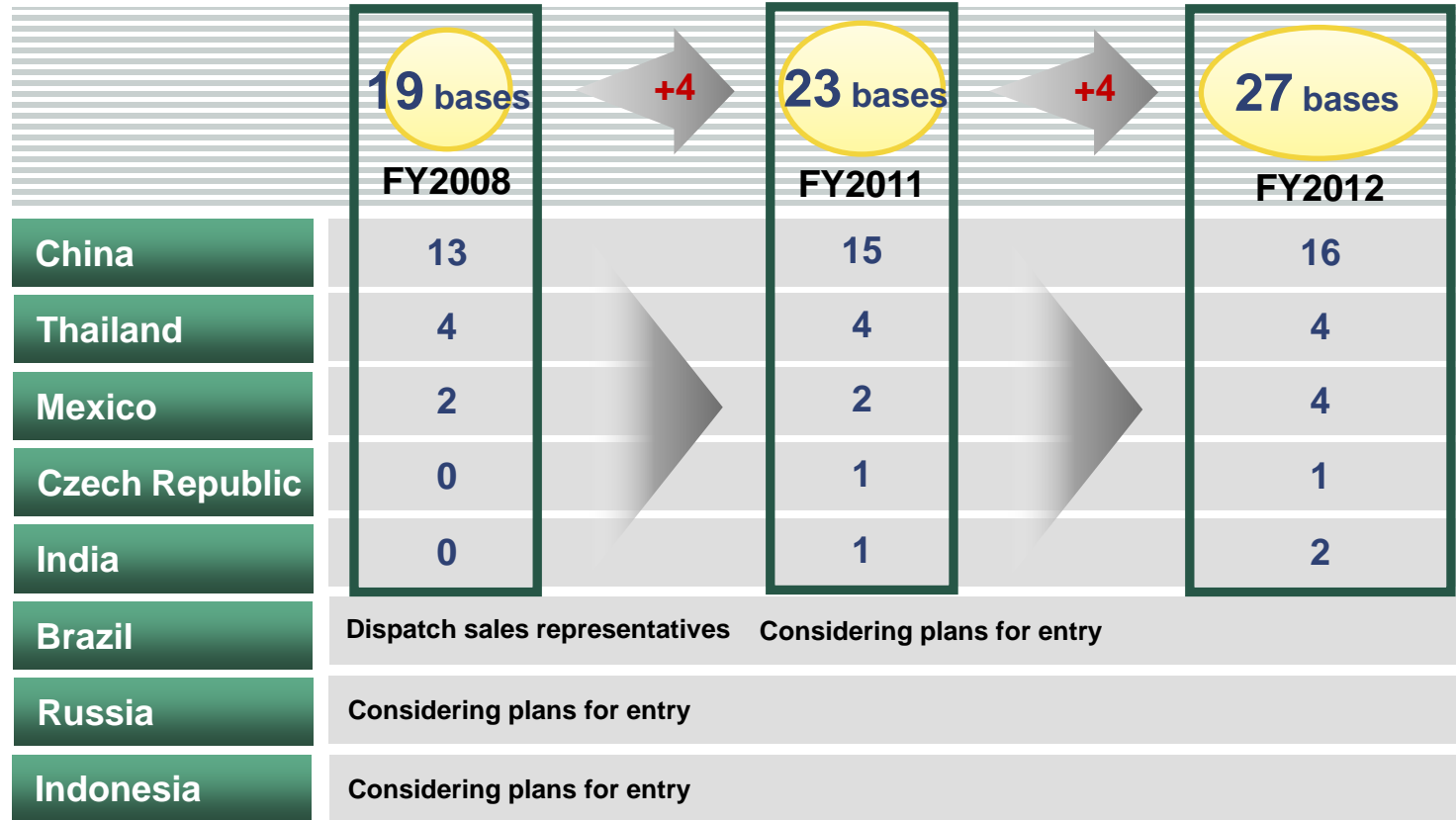
Improve global design and development capabilities

Make speedy product and system proposals to cater to the various needs of customers developing business globally

- Increase overseas development personnel by 2.4 times (FY 2015)
- Expand application of simulation/analysis technologies shared across the Hitachi Group

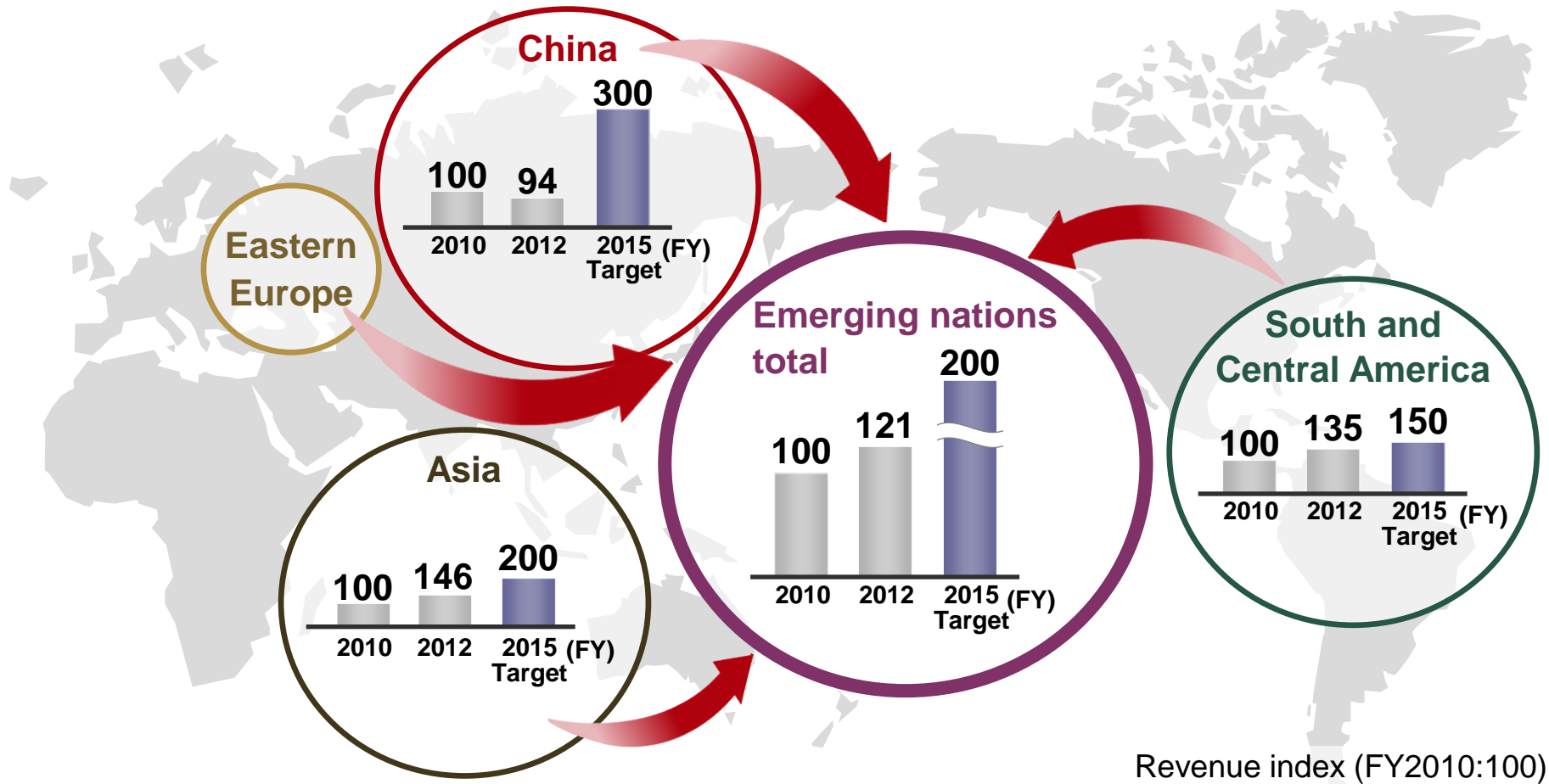
GAM : Global Account Manager
GAT : Global Account Team

Increase production bases in emerging nations



Advance into emerging nations to accelerate local production for local consumption

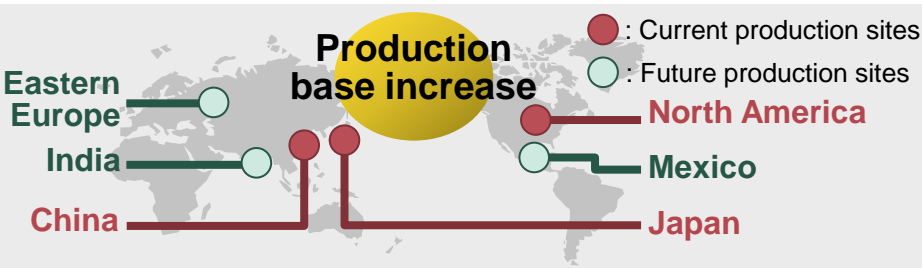
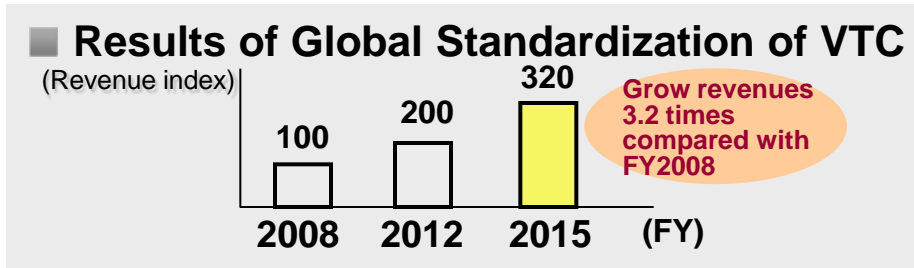
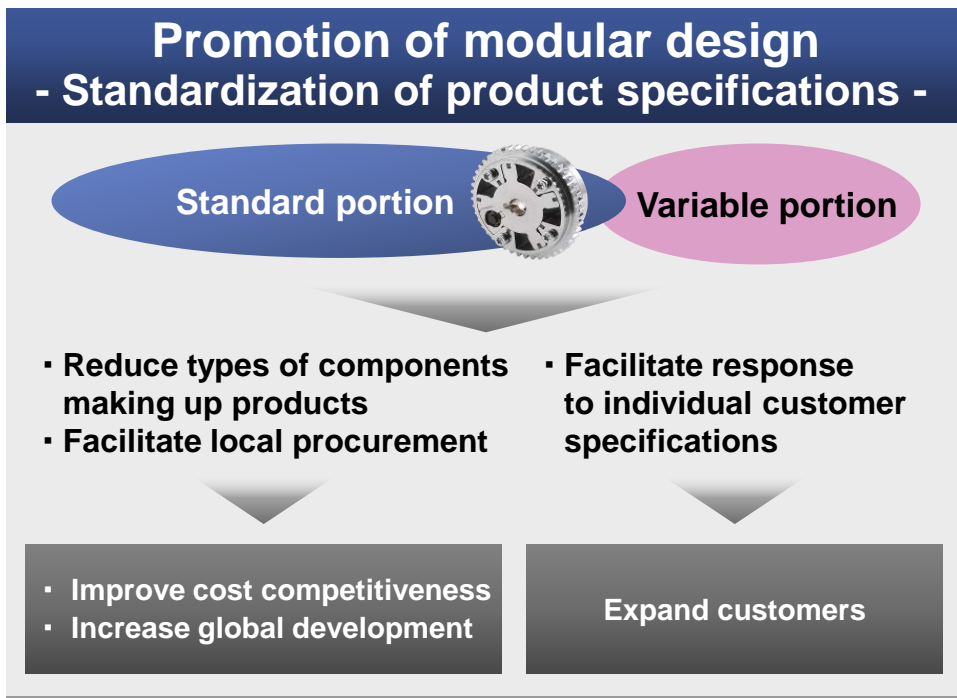
Emerging nation revenue target indices



Revenue index (FY2010:100)

Double revenues in emerging nations by FY 2015 (Vs. FY2010)

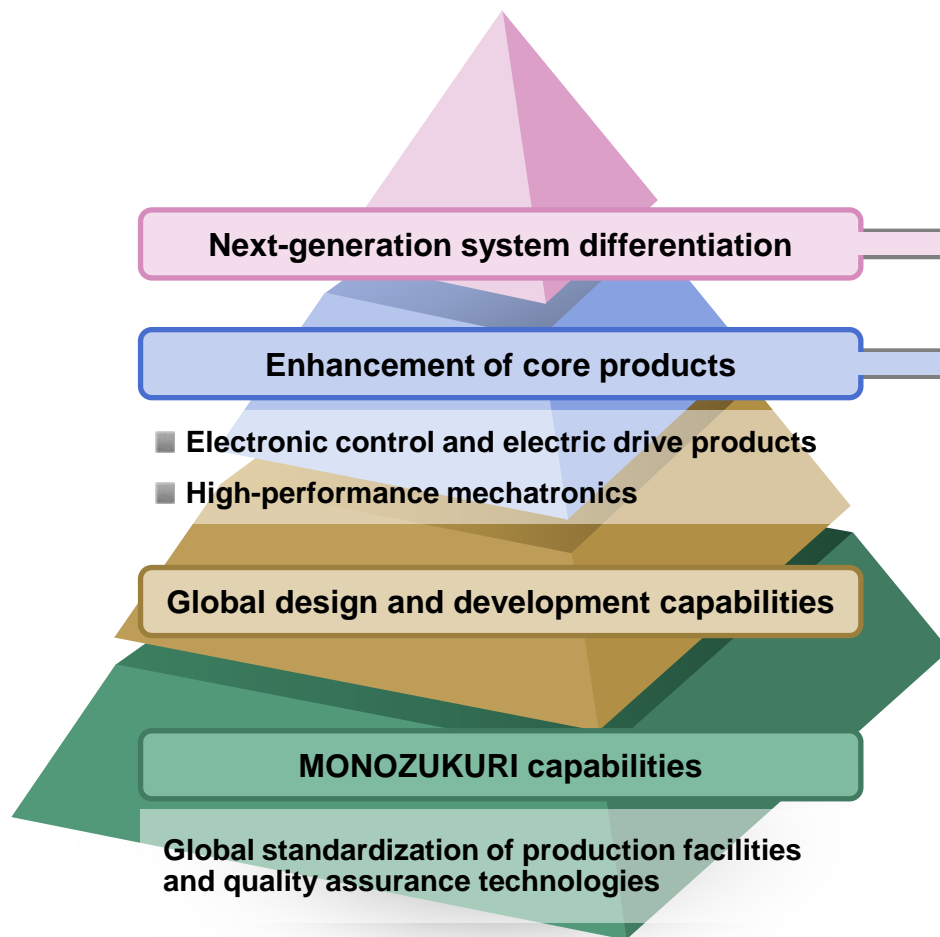
3-6. Global Product Standardization
















Quickly provide products matched to customer needs in terms of price and quality competitiveness

VTC: Valve Timing Control system

Differentiate next-generation systems by enhancing core products



Contribution to creation of automobiles attractive to customers

Next-generation powertrain control		Next-generation chassis control	
Ultra fuel-efficient system	Electric drive subsystem	Safety support systems	Drive stabilization systems
 Engine control unit	 Motors	 Stereo camera	 Semi-active Suspension systems
 Electric valve timing control	 Inverters	 Outside recognition sensors	 ESC
 ISS Starter	 Lithium-ion batteries	 ADAS	 Electrically-driven intelligent brake
			 Electrically-driven PKB

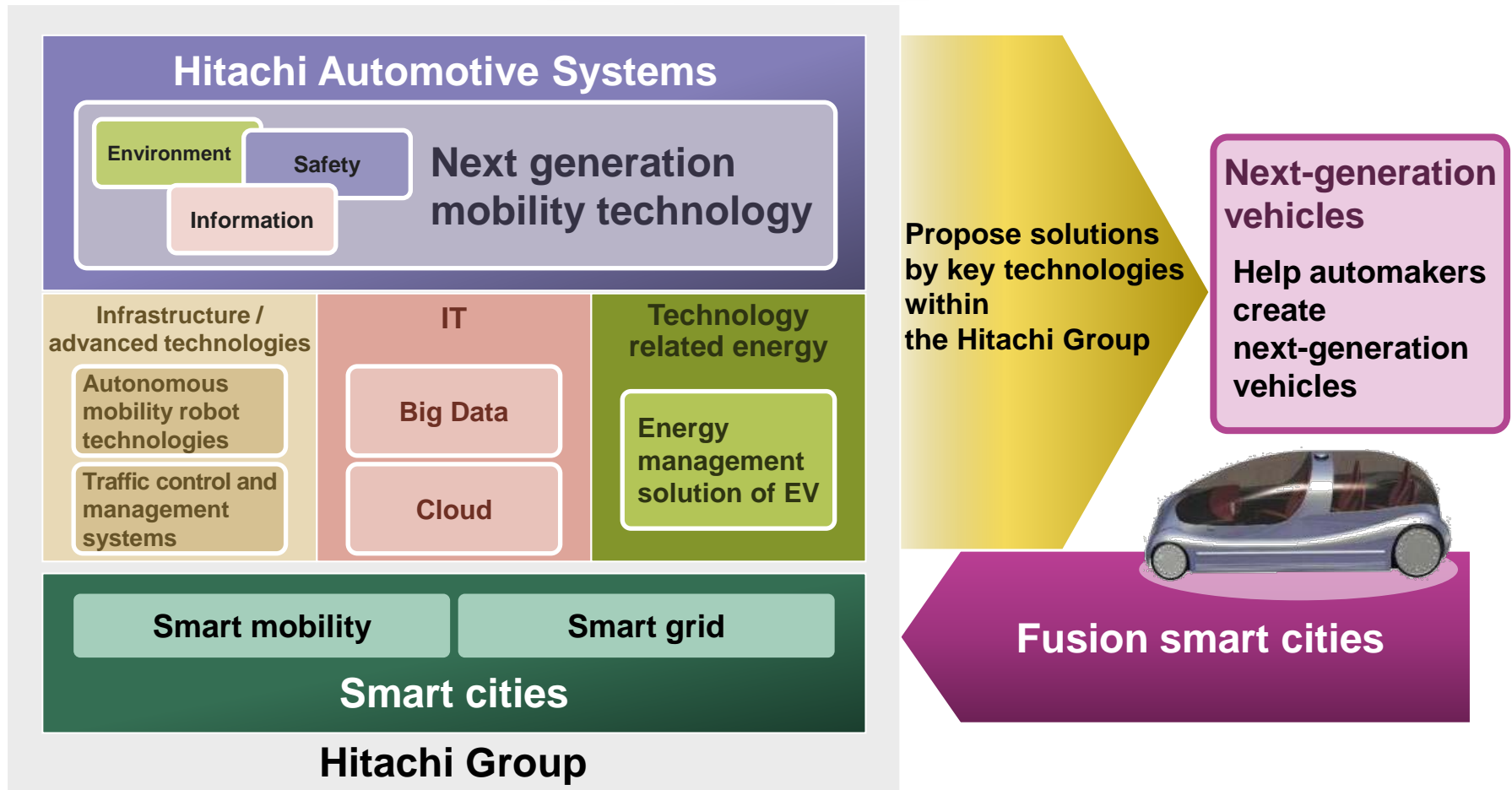
ISS : Idling Stop System
ESC : Electronic Stability Control

ADAS : Advanced Driver Assistance Systems
PKB : Parking Break

3-8. Helping Create Next-generation Vehicles

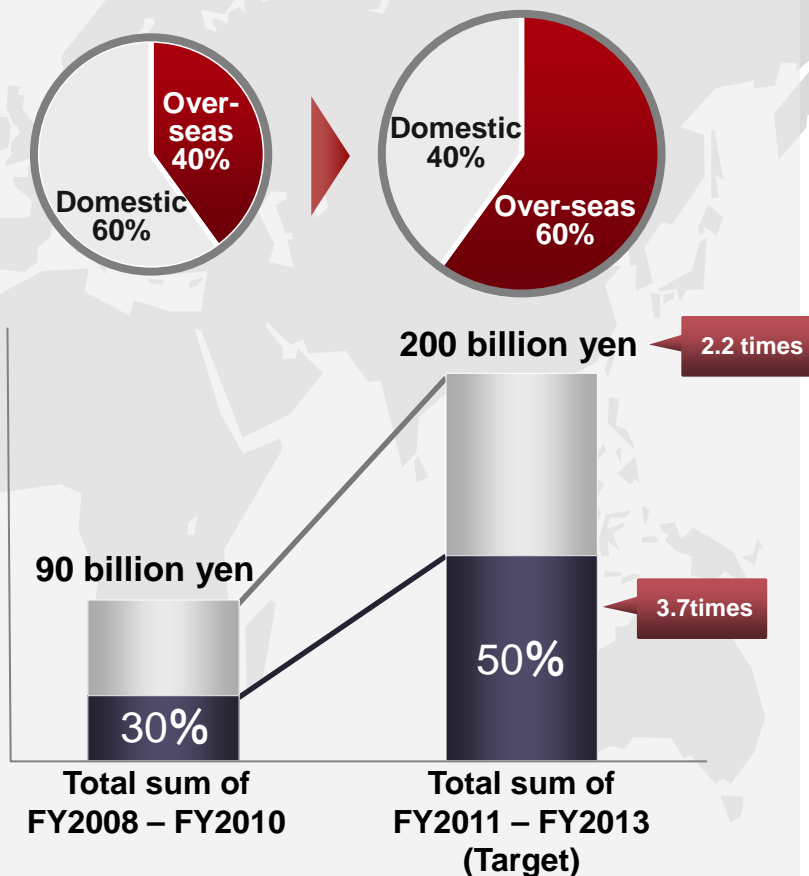
Contribute by synergy to the creation of next-generation vehicles fit for a sustainable society

Hitachi's key technologies support sustainable society

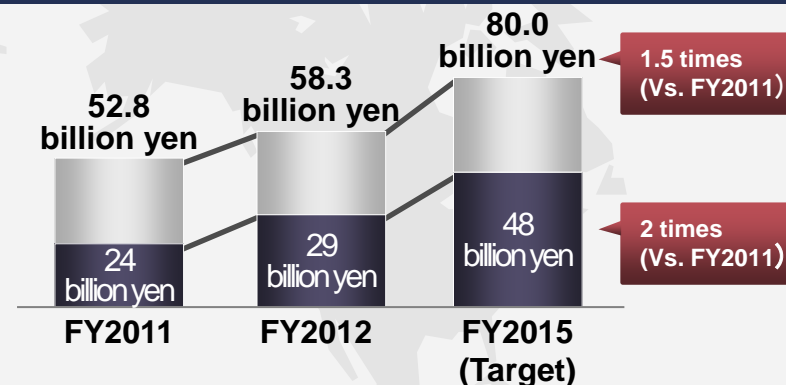


Investment in electronic control and electric drive globally

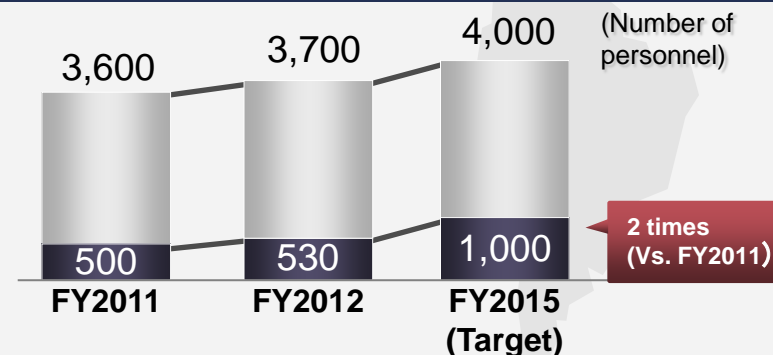
Investment composition



R&D expenditure



Global engineering personnel



■ Related electronic control and electric drive products

Main past initiatives

Production costs	<ul style="list-style-type: none"> ■ Promotion of modular design - Standardization of product specifications and MONOZUKURI - ■ Strengthening of high-efficiency production and quality at optimal production locations
Direct material costs	<ul style="list-style-type: none"> ■ Lower costs through global procurement system and centralized purchasing ■ Reduction of overall costs through VEC activities
Indirect costs	<ul style="list-style-type: none"> ■ Globally unify core IT systems ■ Centralize and standardize administrative operations

VEC: Value Engineering for Customers

Main future initiatives (Continue and strengthen above initiatives)

Production costs	<ul style="list-style-type: none"> ■ Globally develop low-cost, standard production lines ■ Cost reduction due to defective work through Zero Defects activities
Direct material costs	<ul style="list-style-type: none"> ■ Costs reduction by VEC activities and rigorously adopting overseas materials ■ Maintain procurement networks compatible with global TSCM
Indirect costs	<ul style="list-style-type: none"> ■ Optimize Global logistics Optimize logistics route, integration and re-use of logistics packing materials

TSCM: Total Supply Chain Management

Initiatives for improving free cash flows

Issues and areas to strengthen

Improve operating cash flows

Raise inventory turnover ratio

Shorten develop and prototype timeframes

Improve investment efficiency

Improve capital expenditure efficiency

Increase internal production of production facilities

Develop standard automated production lines globally

Create low-cost production lines for handling small production lots for emerging nations

Earnings improvement initiatives

Bolster global production management to optimize global inventories

Strengthen simulation technologies

Internal production rate 20%⇒60% (FY2012 ⇒ FY2015)

Standard automated production lines ⇒Develop 12 in FY2013

Lower costs by 30% to 70% with low-cost production lines

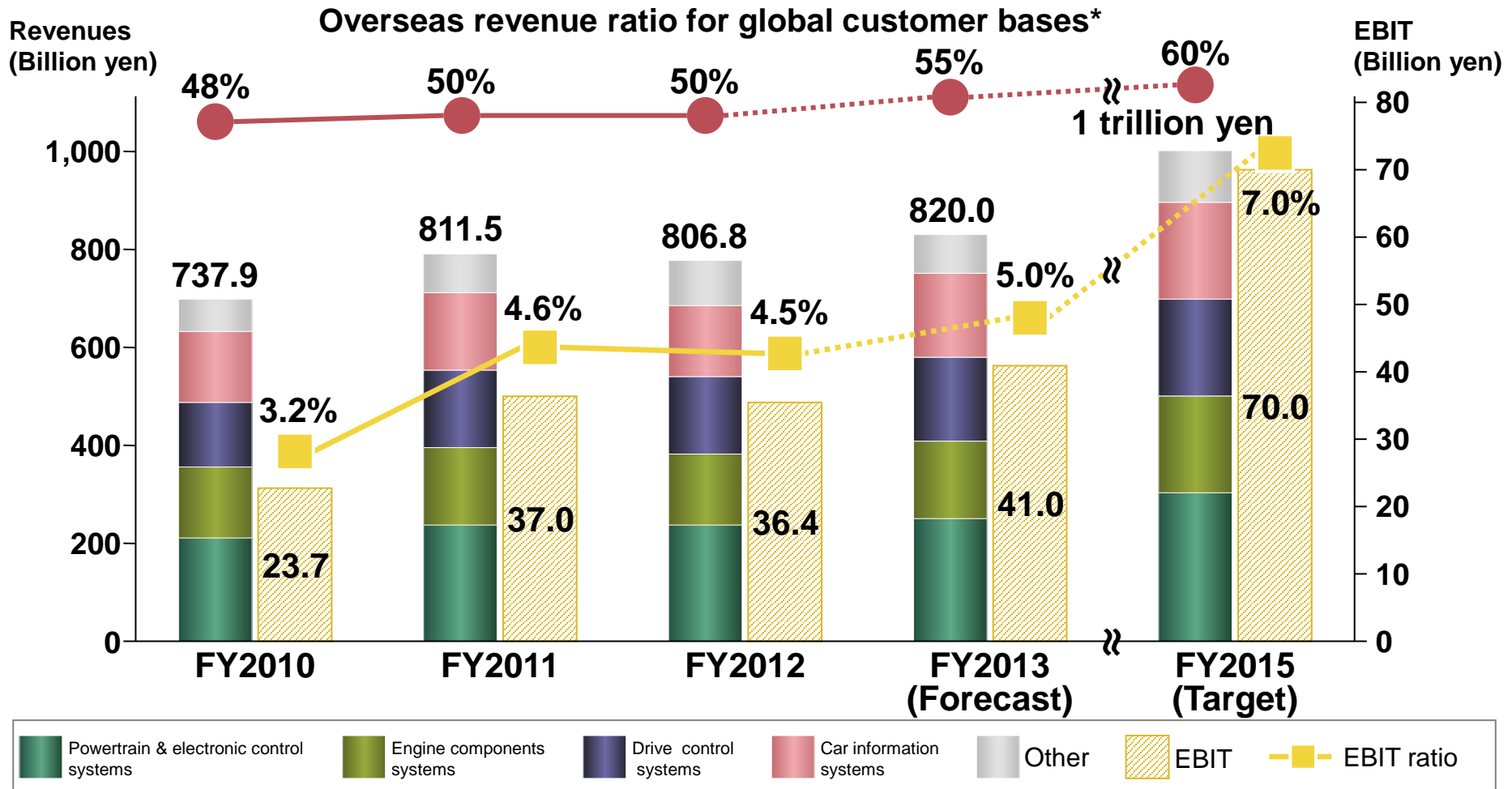
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4-1. Business Targets

FY2015 targets: revenues: 1 trillion yen, EBIT ratio : 7.0%



EBIT: Earnings before Interest and Taxes

* Customer bases that install automotive components in finished vehicles. This is different from overseas revenues in the consolidated accounts.

Excluding exchange rate differences

FY2015 targets

- **Revenues: 1 trillion yen**
(Overseas revenue ratio for global customer bases 60%)
- **EBIT (Operating income): 7.0%**
- **Gross margin: 1 point improvement (Vs. FY2012)**
- **SG&A expense ratio: 2 point improvement (Vs. FY2012)**

**Become the most globally trusted
corporate group**

Cautionary Statement

Certain statements found in this document may constitute “forward-looking statements” as defined in the U.S. Private Securities Litigation Reform Act of 1995. Such “forward-looking statements” reflect management’s current views with respect to certain future events and financial performance and include any statement that does not directly relate to any historical or current fact. Words such as “anticipate,” “believe,” “expect,” “estimate,” “forecast,” “intend,” “plan,” “project” and similar expressions which indicate future events and trends may identify “forward-looking statements.” Such statements are based on currently available information and are subject to various risks and uncertainties that could cause actual results to differ materially from those projected or implied in the “forward-looking statements” and from historical trends. Certain “forward-looking statements” are based upon current assumptions of future events which may not prove to be accurate. Undue reliance should not be placed on “forward-looking statements,” as such statements speak only as of the date of this document.

Factors that could cause actual results to differ materially from those projected or implied in any “forward-looking statement” and from historical trends include, but are not limited to:

- economic conditions, including consumer spending and plant and equipment investment in Hitachi’s major markets, particularly Japan, Asia, the United States and Europe, as well as levels of demand in the major industrial sectors Hitachi serves, including, without limitation, the information, electronics, automotive, construction and financial sectors;
- exchange rate fluctuations of the yen against other currencies in which Hitachi makes significant sales or in which Hitachi’s assets and liabilities are denominated, particularly against the U.S. dollar and the euro;
- uncertainty as to Hitachi’s ability to access, or access on favorable terms, liquidity or long-term financing;
- uncertainty as to general market price levels for equity securities, declines in which may require Hitachi to write down equity securities that it holds;
- the potential for significant losses on Hitachi’s investments in equity method affiliates;
- increased commoditization of information technology products and digital media-related products and intensifying price competition for such products, particularly in the Digital Media & Consumer Products segments;
- uncertainty as to Hitachi’s ability to continue to develop and market products that incorporate new technologies on a timely and cost-effective basis and to achieve market acceptance for such products;
- rapid technological innovation;
- the possibility of cost fluctuations during the lifetime of, or cancellation of, long-term contracts for which Hitachi uses the percentage-of-completion method to recognize revenue from sales;
- fluctuations in the price of raw materials including, without limitation, petroleum and other materials, such as copper, steel, aluminum, synthetic resins, rare metals and rare-earth minerals, or shortages of materials, parts and components;
- fluctuations in product demand and industry capacity;
- uncertainty as to Hitachi’s ability to implement measures to reduce the potential negative impact of fluctuations in product demand, exchange rates and/or price of raw materials or shortages of materials, parts and components;
- uncertainty as to Hitachi’s ability to achieve the anticipated benefits of its strategy to strengthen its Social Innovation Business;
- uncertainty as to the success of restructuring efforts to improve management efficiency by divesting or otherwise exiting underperforming businesses and to strengthen competitiveness;
- uncertainty as to the success of cost reduction measures;
- general socioeconomic and political conditions and the regulatory and trade environment of countries where Hitachi conducts business, particularly Japan, Asia, the United States and Europe, including, without limitation, direct or indirect restrictions by other nations on imports and differences in commercial and business customs including, without limitation, contract terms and conditions and labor relations;
- uncertainty as to the success of alliances upon which Hitachi depends, some of which Hitachi may not control, with other corporations in the design and development of certain key products;
- uncertainty as to Hitachi’s access to, or ability to protect, certain intellectual property rights, particularly those related to electronics and data processing technologies;
- uncertainty as to the outcome of litigation, regulatory investigations and other legal proceedings of which the Company, its subsidiaries or its equity method affiliates have become or may become parties;
- the possibility of incurring expenses resulting from any defects in products or services of Hitachi;
- the possibility of disruption of Hitachi’s operations by earthquakes, tsunamis or other natural disasters;
- uncertainty as to Hitachi’s ability to maintain the integrity of its information systems, as well as Hitachi’s ability to protect its confidential information or that of its customers;
- uncertainty as to the accuracy of key assumptions Hitachi uses to evaluate its significant employee benefit-related costs; and
- uncertainty as to Hitachi’s ability to attract and retain skilled personnel.

The factors listed above are not all-inclusive and are in addition to other factors contained in other materials published by Hitachi.

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