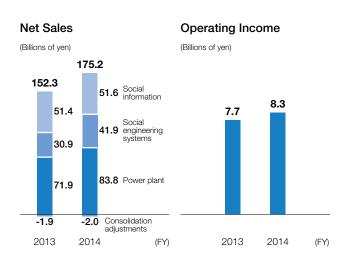
# Review of Operations - Fiscal 2014 Performance

In fiscal 2014, the year ended March 31, 2015, the operating environment for Fuji Electric saw a modest recovery trend in the domestic economy. While there was a fallback from the demand rush that preceded the April 2014 consumption tax hike, this was offset by positive factors including the recovery of corporate performance. Overseas, activity was weak in certain markets, but the overall trend was gradual improvement supported by the recovery of the U.S. and other major developed nations.

Net sales rose ¥50.8 billion year on year to ¥810.7 billion, following increased demand and beneficial foreign exchange translations. Operating income improved ¥6.2 billion year on year to ¥39.3 billion. This reflected higher net sales and the effect of structural improvements, such as cost reductions.

### **Power and Social Infrastructure**



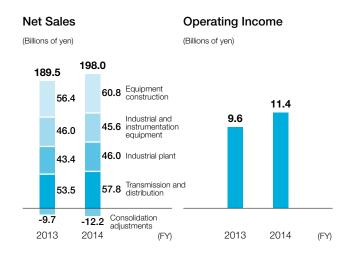
In the power plant business, sales were up year on year due to a rise in orders for solar power generation systems, which offset the decline in large-scale orders for hydropower generation facilities.

In the social engineering systems business, sales were up due to higher sales centered on power systems and other items in the power grid field as well as smart meters.

In the social information business, sales increased as a result of the rise in activities targeting small- to medium-scale orders.

Overall, the segment saw improved operating income due to higher net sales.

## **Industrial Infrastructure**



In the transmission and distribution business, sales were up year on year, reflecting a rise in large-scale orders in Japan.

In the industrial plant business, sales increased following strong domestic replacement demand.

In the industrial and instrumentation equipment business, sales were relatively unchanged year on year.

In the equipment construction business, sales increased due to a rise in orders for air-conditioning facility construction and an increase in solar power generation system construction projects.

The segment's overall operating income improved year on year due to higher net sales and the benefits of cost reduction efforts.

#### **Net Sales Operating Income**

| (Billions of yen)                  | Fiscal 2013 | Fiscal 2014 | Increase / Decrease | Fiscal 2013 | Fiscal 2014 | Increase / Decrease |
|------------------------------------|-------------|-------------|---------------------|-------------|-------------|---------------------|
| Power and Social<br>Infrastructure | 152.3       | 175.2       | 22.9                | 7.7         | 8.3         | 0.6                 |
| Industrial Infrastructure          | 189.5       | 198.0       | 8.5                 | 9.6         | 11.4        | 1.8                 |
| Power Electronics                  | 174.7       | 184.1       | 9.4                 | 5.3         | 6.8         | 1.5                 |
| Electronic Devices                 | 123.0       | 137.2       | 14.1                | 6.5         | 8.1         | 1.6                 |
| Food and Beverage<br>Distribution  | 120.1       | 119.1       | -0.9                | 8.0         | 8.5         | 0.5                 |
| Others                             | 60.0        | 61.2        | 1.2                 | 1.9         | 1.9         | -0.0                |
| Elimination and Corporate          | -59.8       | -64.2       | -4.4                | -5.9        | -5.7        | 0.2                 |
| Total                              | 759.9       | 810.7       | 50.8                | 33.1        | 39.3        | 6.2                 |

#### Main Initiatives

### **Increase Sales of Solar Power Generation Systems**

Sales of solar power generation systems increased dramatically year on year, partly reflecting the comprehensive delivery of Fuji Electric's largest solar power project, Kisozaki reclaimed land mega-solar (49 MW) under an engineering, procurement, and construction (EPC) contract.

### Grow Orders for Thermal and **Geothermal Power Generation Facilities**

Amid growing investment in electric power in Japan ahead of the liberalization of electricity markets, Fuji Electric increased orders for thermal power generation facilities, including receiving an order for a large-scale gas turbine combined cycle power generation facility for Kobe Steel, Ltd.

We also captured orders for geothermal power generation facilities, mainly for overseas projects to countries such as Iceland.

### **Commence Mass Production** of Smart Meters

In response to growing demand for replacing to smart meters, subsidiary GE Fuji Meter Co., Ltd. installed mass production equipment at its Azumino Factory, and started supplying smart meters to power companies in Japan.



Kisozaki reclaimed land mega-solar



Steam turbines



Mass production facilities for smart meters

### Reinforcing Sales Activities for **Data Center Facilities**

The shift to cloud-based computing is driving energy saving and replacement demand for data centers. We have reinforced our activities to obtain orders, leveraging our strengths as an one-stop solutions provider for all required functions, including substation equipment, air conditioning, uninterruptible power systems, and monitoring systems.



Data centers

### **Reinforcing Substation Equipment Development and Production Systems**

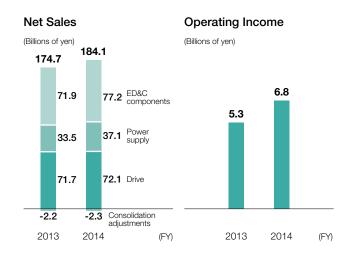
We strengthened a high-power testing facility at our Chiba Factory to develop new high-voltage gas-insulated switchgear. We invested in facilities for manufacturing gas-insulated switchgear at Fuji Electric Manufacturing (Thailand) Co., Ltd. and started production.

We also expanded the product lineup at Fuji Tusco Co., Ltd., extended the sales and services network, and strengthened the substation equipment business.



High-power testing facility (Chiba Factory)

### **Power Electronics**

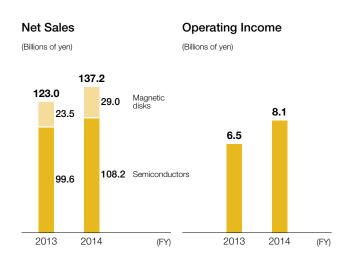


In the drive business, sales and operating results improved year on year following a rise in demand for mainstay inverters and servos.

In the power supply business, sales and operating results were up year on year as a result of increased overseas demand for power supply equipment coupled with robust demand for power conditioning sub-systems for mega solar power generation facilities in Japan.

In the ED&C components business, sales and operating results improved year on year due to strong demand for machine tools and solar power generation-related equipment.

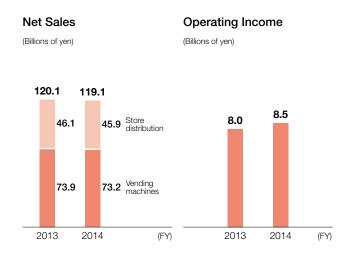
### **Electronic Devices**



In the semiconductors business, sales were up year on year due to strong demand for inverters, servos, and other industrial machinery in the industrial business and recovered demand for products for telecommunications equipment in the power supply application business. These factors outweighed a decrease in demand in the automotive electronics business following the consumption tax hike in Japan. Operating results improved due to higher sales and the benefits of cost reduction efforts.

In the magnetic disks business, sales increased, but operating results were unchanged year on year due to the negative impacts of changes in prices and the ratios of sales for specific models.

# **Food and Beverage Distribution**



In the vending machines business, sales decreased year on year as sales increases in China and other overseas markets were impacted by detracting factors in the domestic market, namely unseasonable weather, the decrease in vending machine demand following the consumption tax hike, and the fact that a surge in demand for convenience store coffee machines has now run its course.

In the store distribution business, sales were down year on year as customer demand for automatic change dispensers declined, counteracting the benefits of higher sales of freezing and refrigerating facilities for convenience stores, refrigeration facilities for the distribution sector, and equipment and systems for plant factories.

Despite the decrease in net sales, the segment's overall operating income improved year on year due to the benefits of cost reduction efforts.

#### Main Initiatives

### Launch of Power Electronic Systems Utilizing **SiC Power Semiconductors**

We concentrated on development of products utilizing our next-generation SiC power semiconductors. We launched a large-capacity FRENIC-VG (stack type) inverter and a largecapacity power conditioning sub-systems for mega solar facilities utilizing SiC power semiconductors.

\*Please refer to page 20 "Research and Development"



Large-capacity FRENIC-VG (stack type) inverter



Large-capacity power conditioning sub-systems for mega solar facilities

### Accelerating Development and Launch of **New Products**

We are strengthening the development and launch of new products to meet global demand.

In Japan, we developed a premium efficiency motor that meets the top-runner regulations set out in the Act on the Rational Use of Energy. Overseas, we developed the FRENIC-Ace inverter, which offers higher performance in a compact form while contributing to facility power savings, for customers in Asia, China, Europe, and the U.S.



Low-voltage three-phase premium efficiency motor



FRENIC-Ace inverter

### Full-Scale Launch of an 8-Inch Line at the Yamanashi Factory

Demand is increasing for industrial IGBT modules, which are used in industrial machinery such as inverters and NC machine tools, as well as in applications in the renewable energy field such as solar and wind power generation. To meet this demand, we have started full-scale operation of the 8-inch line at our Yamanashi Factory, a front-end process production site for the modules.



8-inch line front-end process

### Construction of a Development Center at the **Matsumoto Factory**

We have our new development center at the Matsumoto Factory, our global mother factory for power semiconductors.

In the new facility, we will promote development of highvalue-added products such as next-generation power semiconductors, including SiC devices, high-functionality IGBTs, and automotive-related products as well as innovative production technology.



Development center

### **Expanding Vending Machine Demand in** China and Asia

In China, the introduction and deployment of vending machines by beverage manufacturers is accelerating, driving expansion in demand. To meet this demand, we launched Twistar, a vending machine for China and Asia capable of handling a wide range of product lineups from beverages to food and merchandise.

Please refer to page 21 "Research and Development"



Twistar, a vending machine for China and Asia

#### Investment in a Plant Factory

In April 2014, Fuji Electric invested in the large-scale strawberry cultivation facility operator Tomatoh Farm Co., Ltd. Using composite climate control systems driven by our sensor and control technologies, Tomatoh Farm achieves consistent quality all year round, as well as improved crop yields. By amassing expertise in plant factories, we will work to expand businesses that contribute to food safety and security.

Please refer to page 27-28 "Special Features 2"

