

# Medium-term Business Plan

(announced in February 2025)



## Message from the CEO

Rigaku Holdings Corporation listed on the Tokyo Stock Exchange Prime Market on October 25, 2024. For over 70 years since its founding, the Company continued to develop X-ray analytical instruments and deliver them to the global market under its corporate mission: "To contribute to the enhancement of humanity through scientific and technological development." We view our listing on the stock exchange as an opportunity to reaffirm our commitment to soar even higher and reach new heights.

We are now publicly disclosing this "Medium-term Business Plan" to clearly outline Rigaku's new growth trajectory. Initially formulated in September 2023, this plan has served as the foundation to the story that we have been sharing with investors along our journey to an IPO. This is, however, our first time publicly disclosing the entire plan in a comprehensive form.

Alongside some additional updates to the original plan, we have summarized our path to growth and Rigaku's vision for the coming years until 2027. We would be grateful if you take this opportunity to have a look and take in our growth plan.

The pace of scientific and technological advancement is accelerating, with numerous innovations driving transformative changes worldwide. As a specialist in advanced X-ray technology, Rigaku strives to support these innovations around the world through both research and development (lab) and production (fab). Guided by our "Rigaku Vision," which clearly defines our missions to accomplish, the responsibilities to fulfill and the value we must deliver to each of our stakeholders - customers, people, society, and shareholders -, we will work hard to achieve the goals set forth in this Medium-term Business Plan.

"To improve our world by powering new perspectives." Rigaku will strive to grow globally as a one-of-a-kind, uniquely innovative company.



February 2025

Rigaku Holdings Corporation

Jun Kawakami  
President and CEO

# Rigaku Holdings Corporation Medium-term Business Plan (announced in February 2025)\*1

## Rigaku and the Company's Business Overview

FY2024		
Revenue	Adj. EBITDA*2	Adj. EBITDA Margin*3
JPY 90.6 bln	JPY 23.4 bln	25.9%
Revenue CAGR*4	Overseas Revenue Ratio*5	# of Customers
21%	73%	10,000+

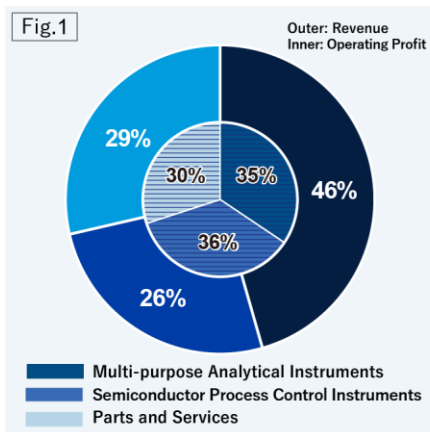
Rigaku Holdings Corporation ("Rigaku"), a manufacturer specializing in scientific instruments, engages in the development, manufacturing, and sale of analytical and metrology instruments, with a particular focus on X-ray technology, such as X-ray diffraction, X-ray fluorescence, and X-ray imaging, as well as providing related services. The Company has expanded its business not only in Japan but also in over 90 countries around the globe through more than 70 years of history since its founding in 1951.

Rigaku's business portfolio comprises three key product categories (Fig.1 and Fig.2):

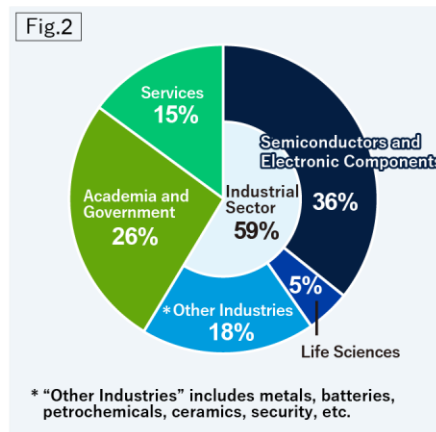
- 1) **"Multi-purpose Analytical Instruments"** is the Company's historic business domain, which caters to the diverse research and development needs of academia and government, such as universities and research institutes, as well as various end-markets in the industrial sector, by providing X-ray analytical solutions;
- 2) **"Semiconductor Process Control Instruments"** serves various quality test processes in semiconductor production; and
- 3) **"Parts and Services"** consists of the sale of core component parts, after-sales services, and analytical instruments that utilize non-X-ray technology, such as thermal analysis and Raman spectroscopy, to the customers.

Rigaku has achieved high growth in recent years by successfully expanding these businesses on a global scale to exceed 70% in its overseas revenue ratio (Fig.3).

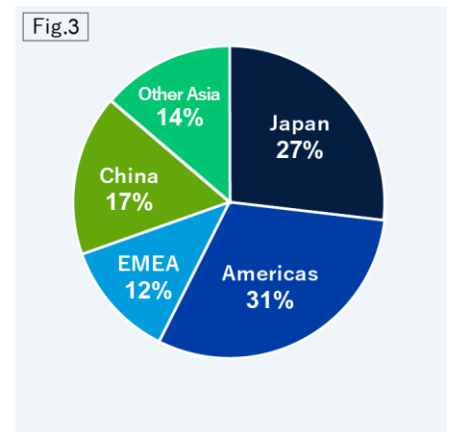
**Proportion of Revenue and Operating Profit by Product Category (FY2024)**



**Revenue Distribution by End Market (FY2024)**



**Revenue Distribution by Region (FY2024)**



\*1 This "Medium-term Business Plan" was established in September 2023 and partially revised in February 2024, and is now being disclosed with updated growth forecasts of market demand, among other aspects. The outline of the plan was publicly announced in our "Medium- to Long-Term Management Strategy and Business Goals" dated September 20, 2024.

\*2 Adj. EBITDA = Income Before Income Taxes + Depreciation and Amortization + Impairment Losses – Interest and Dividend Income + Interest Expenses + One Time Costs (IFRS Implementation Cost, Consulting Fee, Exemption Application-related Cost in China, IPO-related Cost, etc.)

\*3 Adj. EBITDA Margin = Adj. EBITDA / Revenue

\*4 3.75-year CAGR from the fiscal year ending March 31, 2021 (on a J-GAAP basis for Rigaku Corporation) to the fiscal year ending December 31, 2024 (on an IFRS basis for Rigaku Holdings Corporation).

\*5 Calculated based on revenue from customers and distributors outside Japan.

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# 1. Operating Environment

Rigaku engages in the development, manufacturing, and sale of analytical and metrology instruments, with a particular focus on X-ray technology, as well as providing related services. The Company's products that utilize X-ray technology include:

- 1) X-ray diffractometers (XRD) that analyze the composition and crystal structure of materials;
- 2) X-ray fluorescence spectrometers that are used for a qualitative and quantitative analysis of constituent elements of materials; and
- 3) X-ray imaging instruments (X-ray CT) that create an image of the internal structure of industrial materials and products in a non-destructive manner.

Analytical and metrology instruments that utilize X-ray technology serve a broad spectrum of academic and industrial fields, and their market is continually expanding due to an increasing demand for X-ray analytical solutions, as scientific technology develops (Fig.4 and Fig.5). Their applications include research and development of diverse materials, quality control in production processes, process control in semiconductor manufacturing, and the research and development of medical products that advance life sciences.

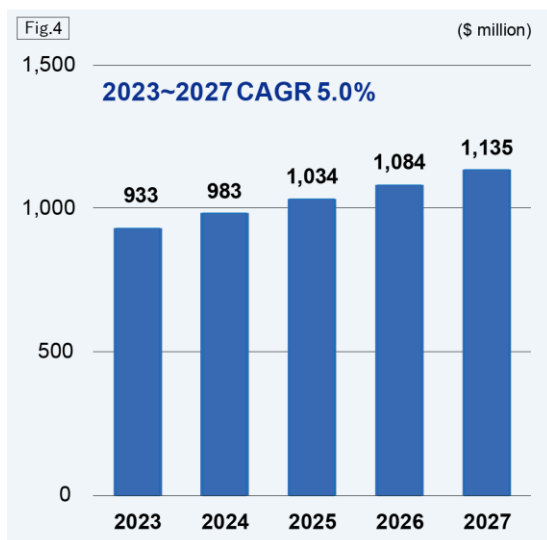
Furthermore, today's society seeks not only a convenient and prosperous life but also prioritizes good health and environmental stewardship, driving **technological innovation** in broad fields to respond to new and emerging needs. As the changing market demands drive technological innovation, Rigaku discovers exciting opportunities to grow and expand by developing innovative applications of X-ray technology.

## Fields with high demand for leading-edge technological innovation

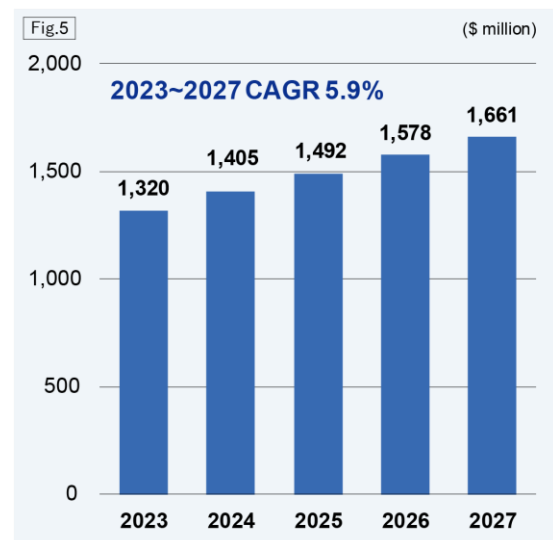
- Increasing miniaturization and multi-layering as well as high integration and three-dimensional packaging in semiconductors
- Changes in materials used for electronic components
- Advances in power electronics and energy storage technologies in tandem with the rising adoption of electric vehicles (EVs)
- Increasing sophistication of technologies for antibody-drug discovery
- Development of new materials to reduce CO<sup>2</sup> emissions, etc.

## Demand Growth Forecast

① X-ray Diffractometers (XRD)\*1



② X-ray Fluorescence Spectrometers (XRF)\*1



\*1 Strategic Directions International, Inc. "SDi Global Assessment Report 2024"

## 2. Basic Management Policy

### (1) Rigaku Aims to Be a “One-of-a-Kind Global Technology Company”

Guided by its “Mission, Vision, and Values<sup>\*1</sup>,” Rigaku delivers leading-edge analytical solutions focused on X-ray technology to customers and communities, thereby supporting technological innovation across a wide spectrum of fields. The Company strives **“to improve our world by powering new perspectives”** and thereby achieve its corporate mission, which is “to contribute to the enhancement of humanity through scientific and technological development.”

Rigaku, in accordance with this basic management policy, aims to contribute to a sustainable society, while achieving the Company’s sustainable growth and enhancing its corporate value over the medium- to long-term. The Company actively leverages its strengths in technological, human, and customer assets to fulfill these objectives.

As Rigaku contributes to society, we leverage the diversity of our worldwide locations into the combined strength of “Global One Rigaku<sup>\*2</sup>.” By maximizing this advantage, Rigaku has developed a unique growth model founded on its outstanding technology, aspiring to be a “one-of-a-kind global technology company.”

#### ▶ A One-of-a-Kind Global Technology Company

<b>One-of-a-Kind</b>	▶ We actively intensify our search for one-of-a-kind X-ray technologies, while expanding their applications. Rigaku establishes its reputation in the market as the world’s undisputed leader in X-ray technology.
<b>Global</b>	▶ Rigaku further accelerates its growth in overseas markets by reinforcing its business infrastructure in each region. By leveraging the diversity of its worldwide locations, the Company solidifies the combined strength of “Global One Rigaku <sup>*2</sup> ” and deploys it to maximum effect.
<b>Technology</b>	▶ Rigaku pursues a “lab to fab” strategy. By collaborating with universities, research institutes, and R&D centers in the industrial sector (“labs”), Rigaku develops the novel analytical technologies and methods society needs. Then, by implementing and scaling them as standard technologies for industrial production processes (“fabs”), Rigaku focuses on expanding the market for X-ray technology.

### (2) Basic Policy on Business Portfolio Strategy

As a manufacturer specializing in scientific instruments<sup>\*3</sup>, Rigaku has three key product categories in its portfolio: “Multi-purpose Analytical Instruments;” “Semiconductor Process Control Instruments;” and “Parts and Services.” The Company’s management resources are intensively allocated to these businesses.

Following this basic policy on business portfolio strategy, Rigaku continuously refines its selection and focus. To further enhance our solution capability utilizing X-ray technology, we forge partnerships with external parties, pursue M&A investments, and expand operations into fields of other analytical technologies that supplement X-ray technology. The Company approaches these opportunities in a selective, targeted manner.

\*1 Please visit “<https://rigaku-holdings.com/english/group/>” for details on the “Mission, Vision, and Values.”

\*2 Rigaku fosters a corporate spirit that encourages colleagues with diverse talents worldwide to embrace the value of overall optimization as a global company. By utilizing these talented individuals into “One Team,” Rigaku aims to deploy their combined capabilities to maximum effect.

\*3 Rigaku has only one business segment for the disclosure: the manufacturing and sale of scientific instruments.

## 3. The Strengths of Rigaku

### (1) Advanced, Differentiated X-ray Core Technologies

At Rigaku, we prioritize investment in research and development of the **core technologies** critical for the performance of X-ray analytical and metrology instruments (Fig.6). These include X-ray generators, optical elements, X-ray detectors, and analytical software. We package these core technologies as component parts and manufacture them ourselves, which enables us to achieve high product performance and short development cycles as well as the benefit from mass production.





Rigaku's R&D resources are peerless. The group employs **around 300 X-ray engineers**, including those with doctoral degrees, who contribute advanced, specialized expertise into our R&D processes. We also built close working partnerships with leading research institutes worldwide. The strength in X-ray core technology derived from such robust R&D capability, provides technological edge of Rigaku's products, which integrate core component parts and distinctly differentiate Rigaku from competitors.

Rigaku installs these core component parts in its own products and sells them to other manufacturers with technological needs, who value Rigaku's sophisticated X-ray core technologies. For example, Rigaku's leading-edge, multi-layer optics serve as essential component parts for semiconductor production equipment manufacturers, particularly in the EUV mask inspection equipment used in semiconductor production.

To accelerate the growth of Rigaku's operations, in addition to its strength in X-ray core technology, the Company will pursue acquisition of new capabilities, such as **automation, robotics, artificial intelligence (AI), and machine learning**, through partnerships with external parties.

To further reinforce the technological edge and market competitiveness of Rigaku's products, the Company continues heavily investing in research and development of X-ray core technologies that are a source of Rigaku's strengths, mobilizing the internal technology development capabilities of "Global One Rigaku" and maximizing them, while also fostering cooperation with external research institutes.

Fig.6 Rigaku's X-ray Core Technologies

<p><b>X-ray Generators:</b> Our rotating anode technology delivers the world's highest X-ray brightness for laboratory and fabrication use.</p>	
<p><b>Optical Elements:</b> Our leading-edge, multi-layer optics control X-ray / EUV beam lines with high flux, high precision and high reflectance.</p>	
<p><b>X-ray Detectors:</b> Our multi-dimensional detector with high energy resolution capability enables reduced background noise and captures X-ray signals with high sensitivity and high resolution.</p>	
<p><b>Analytical Software:</b> Rigaku leverages single crystal X-ray diffraction analysis with its industry standard analytical software.</p>	

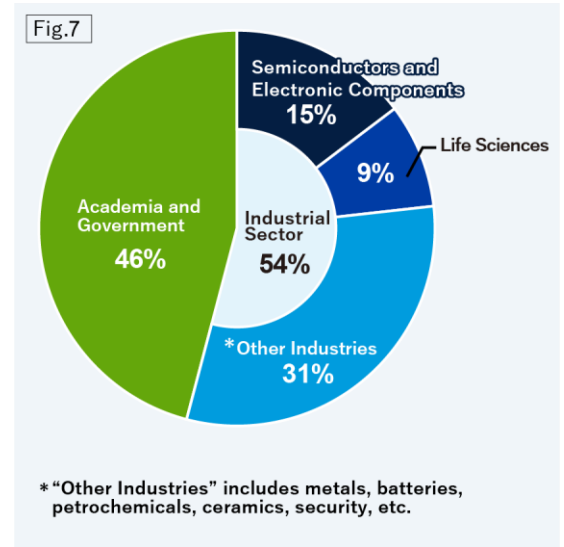
## (2) Solid Customer Base and High Customer Loyalty

X-rays have much shorter wavelengths (and much higher energy) than visible light, which allows them to pass through objects. When substances are irradiated with X-rays, they interact with the X-rays, generating secondary X-ray radiation, such as scattered X-rays and fluorescent X-rays. By measuring and analyzing the information obtained from these physical effects of X-rays, we can analyze the nanoscale structure of materials in a non-destructive manner, thereby identifying and evaluating properties, such as composition, crystal structure, and constituent elements of materials.

Rigaku utilizes these physical properties of X-rays to develop a lineup of multi-purpose analytical instruments, including X-ray diffractometers (XRD), X-ray fluorescence spectrometers (XRF) and X-ray imaging instruments (X-ray CT). In this traditional domain of Rigaku's operations, the Company addresses the R&D needs of academic and government customers, such as universities and research institutes, as well as a variety of end markets in the industrial sector. By catering to this broad range of needs, Rigaku has established a solid customer base with over 10,000 product users both in Japan and overseas (Fig.7), achieving the overwhelming No.1 market share in Japan (Fig.8) and a high market share approaching No.1 globally (Fig.9), particularly for X-ray diffractometers that are Rigaku's mainstream products.

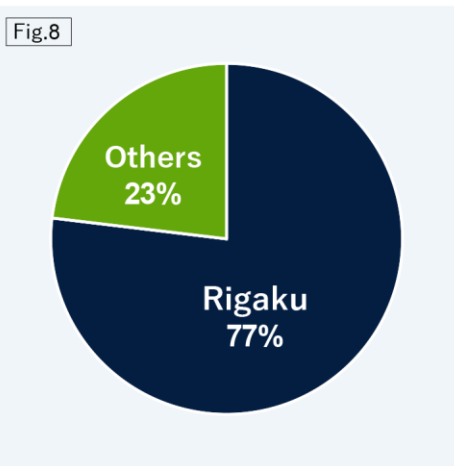
Furthermore, the high customer loyalty for our multi-purpose analytical instruments, evidenced by **a repeated demand acquisition rate of over 95%\*1** (Fig.10), serves as an intangible asset of Rigaku that underpins the stability of the Company's financial performance.

### Revenue Distribution of Multi-purpose Analytical Instruments by End Market (FY2024)

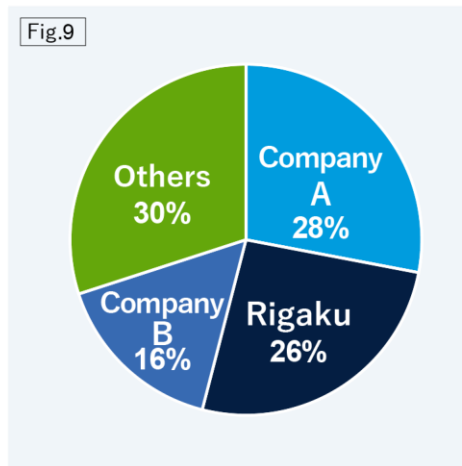


### Market Share for X-ray Diffractometers (XRD) (2023)

Japan\*2

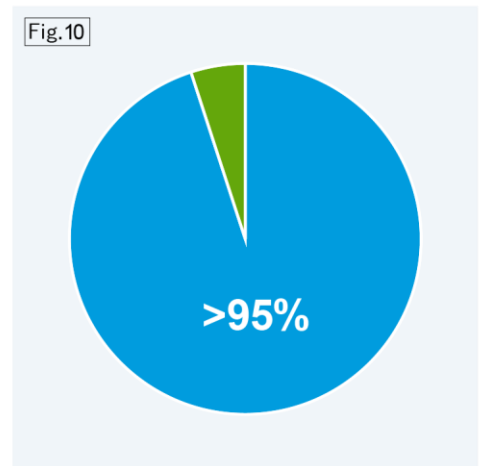


Global\*3



### Repeated Demand Acquisition Rate (2015-2024)

(2015-2024)



\*1 Percentage of replacement demands for X-ray diffractometers (XRD), single crystal X-ray diffractometers (XRD) and X-ray fluorescence spectrometers (XRF) that resulted in successful order acceptance in the 10-year period from January 2015 to December 2024.

\*2 R&D Co., Ltd. "Scientific Instrument Yearbook 2024"

\*3 Strategic Directions International, Inc. "SDi Global Assessment Report 2024"

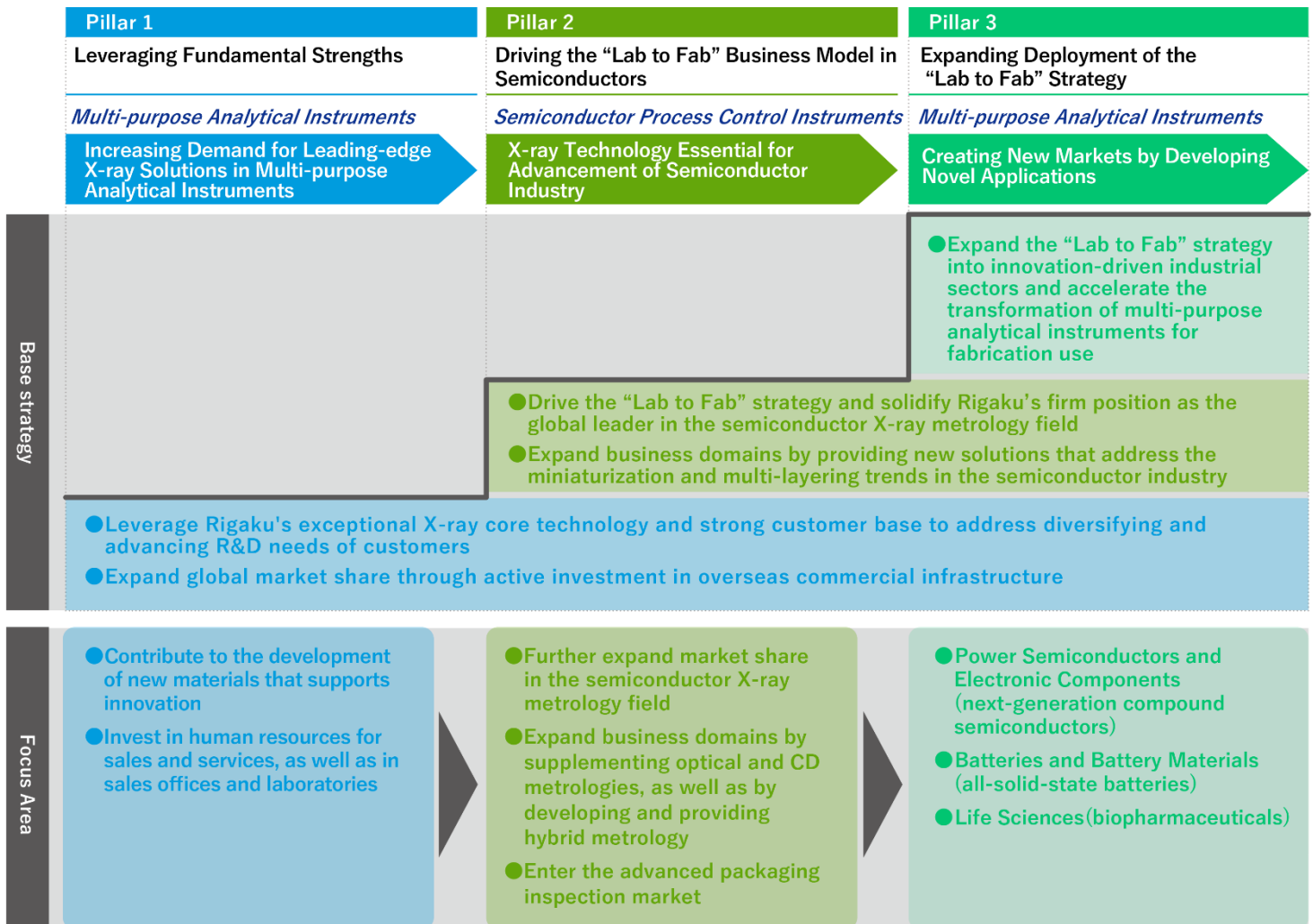
## 4. Growth Strategy

### (1) Pursuing the “Lab to Fab” Strategy

Rigaku possesses many strengths, including the capabilities for in-house development and production of industry-leading X-ray core technologies, a solid customer base, and a deep understanding of technological trends in each industry. Additionally, Rigaku excels in proposing solutions for customers’ current and potential needs through joint development partnerships with customers. By leveraging these advantages, Rigaku collaborates with universities, research institutes, and R&D centers in the industrial sector (“labs”) to develop the novel analytical technologies and methods society needs, and implements and expands them as standard technologies for industrial production processes (“fabs”). This “**Lab to Fab**” strategy serves as Rigaku’s blueprint for expanding its operational domains.

This “Lab to Fab” strategy constitutes a core part of Rigaku's Medium-term Business Plan that contributes to the Company's growth, leveraging its unique strengths and implementing the three-pillar strategy on a global scale.

#### ► Rigaku’s Growth Strategy Concept (3 Pillars of Growth)

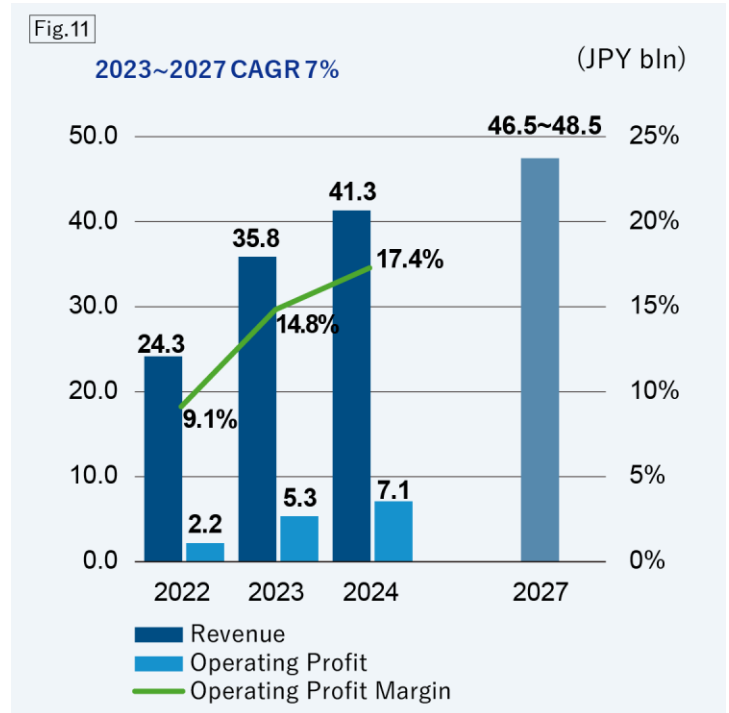


## ① Pillar 1 Multi-purpose Analytical Instruments Providing Leading-edge X-ray Analytical Solutions and Accelerating Growth in Overseas Markets

Multi-purpose analytical instruments, a historic business domain for Rigaku, capitalize on its solid customer base built in academia and government, such as universities and research institutes, as well as a wide range of industrial end markets, and their high customer loyalty. By leveraging its industry-leading X-ray core technologies, the Company delivers leading-edge X-ray analytical solutions that facilitate the discovery and development of new materials, an area of Rigaku's expertise. By addressing the increasingly sophisticated research and development needs of customers, Rigaku continues to expand its revenue and profit margin in multi-purpose analytical instruments,

To accelerate growth in overseas markets, where higher market demand growth is expected and the Company has ample opportunity to enhance its presence and increase market share, Rigaku reinforces investments in sales and service personnel, application scientists, laboratories, and more. Through proactive investments in overseas commercial infrastructure and by leveraging the team strength of "Global One Rigaku," Rigaku seeks to further expand its sales share in the global market. The Company targets a revenue CAGR of 7% from 2023 to 2027 in multi-purpose analytical instruments (Fig.11), exceeding the market demand growth forecast of 5.5%\*1 for X-ray diffractometers (XRD) and X-ray fluorescence spectrometers (XRF).

### Business Performance Trends and Revenue Growth Plan for Multi-purpose Analytical Instruments



\*1 Strategic Directions International, Inc. "SDi Global Assessment Report 2024"

## ② Pillar 2 Semiconductor Process Control Instruments

### Expanding Rigaku’s Business Domains Through Applications of X-ray Technology Contributing to Advances in Semiconductors

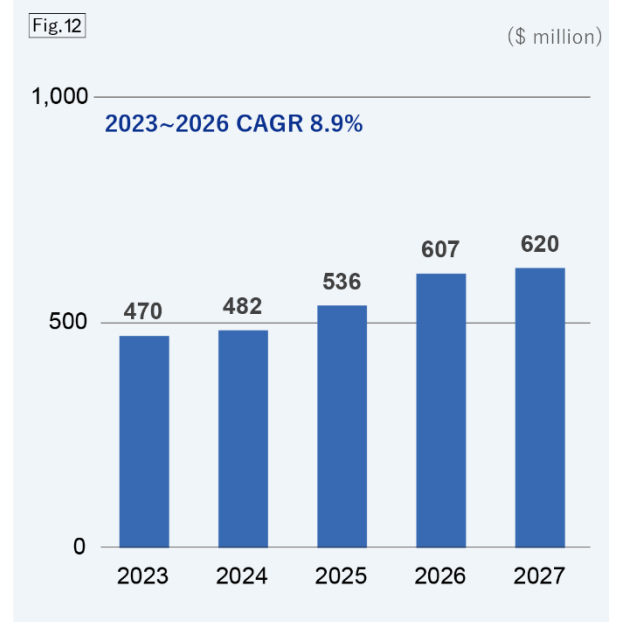
#### A. Achieving High Growth in the Semiconductor X-ray Metrology Market and Building a Diversified Portfolio

Semiconductor process control instruments serve a wide array of processes measuring parameters and thereby controlling processes for semiconductor production. These include contaminant inspection, thin-film evaluation, measurement of film thickness and density, evaluation of composition and crystallinity, and measurement of three-dimensional shape for semiconductor wafers. Unlike semiconductor inspection instruments, which detect defects in individual devices, Rigaku’s products measure the quality of device production processes and contribute to process improvement, enhancing device production yield and providing high added value. As a result, high demand growth is forecast for these semiconductor metrology instruments (Fig.12). Rigaku’s semiconductor X-ray metrology instruments play vital roles in in-line quality control by major semiconductor manufacturers, along with R&D and quality control by semiconductor production equipment manufacturers.

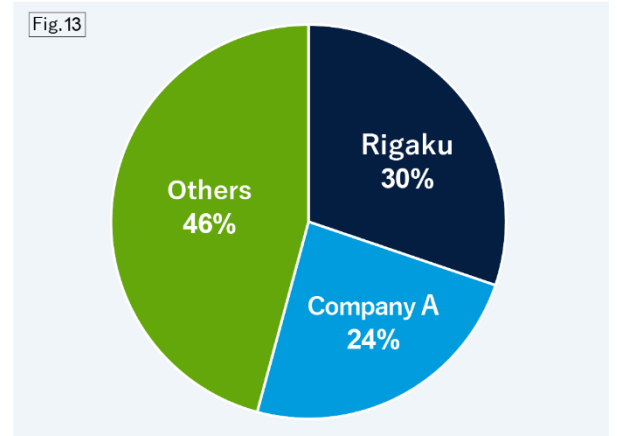
Thanks to the advancement of the “Lab to Fab” strategy, adoption of Rigaku’s products is growing in process control for semiconductor production, with this growth accelerating in recent years. Today, Rigaku stands as the **global leader** in the semiconductor X-ray metrology market (Fig.13).

Rigaku’s business foundation remains exceptionally stable. We conduct business with all 10 of the world’s top 10 firms\*<sup>1</sup> in semiconductor capital expenditure (capex). Additionally, **our revenue mix maintains well-balanced distribution across applications, including memory, logic, power devices, and others** (Fig.14), offering a diversified portfolio that is well positioned to withstand volatility in the semiconductor industry’s silicon cycle.

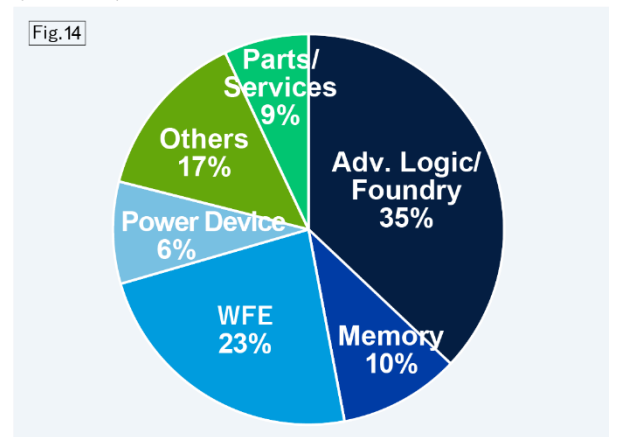
**Demand Growth Forecast for Semiconductor X-ray Metrology\*<sup>2</sup>**



**Global Market Share for Semiconductor X-ray Metrology (2023)\*<sup>2</sup>**



**Revenue Distribution by Application for Semiconductor Process Control Instruments (FY2024)**



\*<sup>1</sup> TechInsights, Inc. “Capital Expenditure Forecast June 2024”

\*<sup>2</sup> Yole Intelligence “Wafer Fab Equipment Market Monitor – Q4 2024”

## ② Pillar 2 Semiconductor Process Control Instruments

### Expanding Rigaku's Business Domains Through Applications of X-ray Technology Contributing to Advances in Semiconductors

#### B. Expansion into the Optical and CD Metrology Markets to Capture Technological Advances in the Semiconductor Industry

Rapid technological innovation in the semiconductor industry has driven the **miniaturization and multi-layering** of semiconductors, significantly increasing the **complexity** of their internal structures. This technological advancement creates exciting opportunities to expand the applications for X-ray technology, which offers the advantage of analyzing the nanoscale structure in a non-destructive manner.

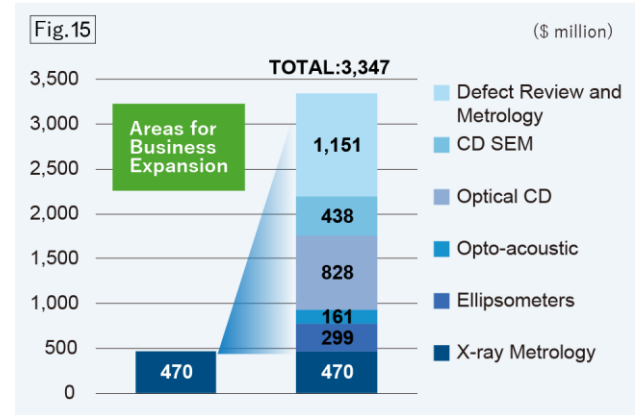
Rigaku leverages its strength in advanced X-ray core technology to develop and market new X-ray metrology instruments that support technological innovation in the semiconductor industry. Rigaku aims to expand from the X-ray metrology market into other areas, such as the optical and CD metrology markets (Fig.15). Additionally, the combining of optical and X-ray technologies, which supplement each other, is expected to provide excellent solutions (hybrid metrology) to the increasingly sophisticated and complex needs for semiconductor metrology. To develop these solutions, Rigaku actively seeks opportunities to build partnerships with external parties.

Rigaku's semiconductor process control instruments business expands its presence in the semiconductor X-ray metrology market in two ways. First, we increase our sales share in the market. Second, the Company broadens its business domains in the semiconductor process control field by expanding applications for X-ray technology. Through these efforts, Rigaku aims to achieve a revenue CAGR of 18% or higher from 2023 to 2027 in semiconductor process control instruments (Fig16), surpassing the market demand growth forecast of 8.9% (from 2023 to 2026)\*<sup>1</sup> for semiconductor X-ray metrology.

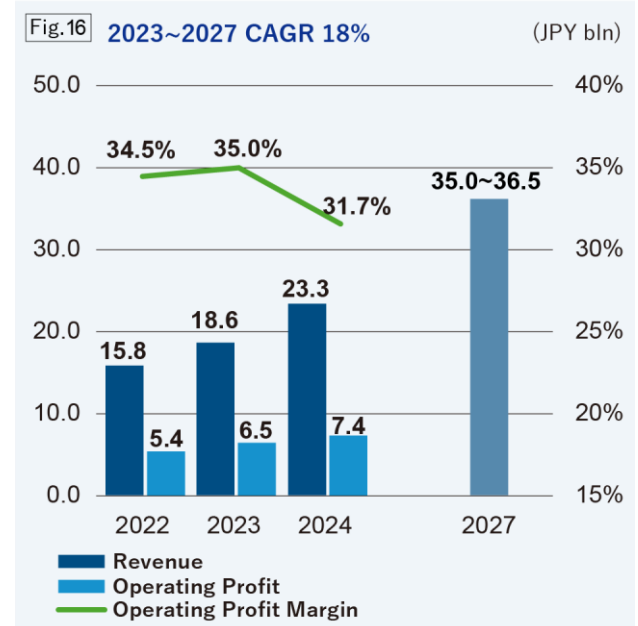
#### C. Entry into the Advanced Packaging Inspection Market

As **AI (artificial intelligence) gets adopted more, advanced packaging** is expected to become increasingly essential for developing next-generation AI chips, which are forecast to undergo significant innovation. Rigaku prepares to enter this high-demand growth field by developing and supplying novel quality inspection products for the advanced packaging market. The evolution of AI chips requires innovative solutions for defect inspection of complex structures, such as micro bumps and TSVs, as the next-generation packages become larger and more three-dimensional. Rigaku works to develop advanced measurement technology and AI-applied inspection algorithms to address this challenge and commercialize the technology for practical use in the near future.

#### Areas for Business Expansion from the X-ray Metrology Market into the Optical and CD Metrology Markets (2023)\*<sup>1</sup>



#### Business Performance Trends and Revenue Growth Plan for Semiconductor Process Control Instruments



\*<sup>1</sup> Yole Intelligence "Wafer Fab Equipment Market Monitor – Q4 2024"

### ③ Pillar 3 Multi-purpose Analytical Instruments Creating New Markets by Developing Novel Applications for X-ray Technology

Rigaku is endowed with a robust customer base spanning a wide range of end markets. This solid foundation enables the Company to **develop new applications for X-ray technology** in the fields experiencing rapid technological innovation, such as **semiconductors and electronic components, batteries and battery materials, and life sciences**. Rigaku actively markets in these fields, focusing on high-demand markets where the development of new X-ray technology applications is expected to grow (Fig.17).

Leveraging its deep understanding of technological trends in each industry and ability to propose solutions for customers' needs, Rigaku diligently develops the analytical technologies and applications that support technological innovation in leading edge fields. Through these efforts, Rigaku creates new markets for multi-purpose analytical instruments.

Building on success in semiconductor process control instruments, Rigaku is expanding its "Lab to Fab" strategy into industries with dynamic technological innovation, actively promoting the adoption of multi-purpose analytical instruments in fabs. We anticipate these efforts to create new growth opportunities and accelerate revenue growth in this business (Fig.18).

Fig.17

#### Rigaku's Leading-edge Solution Products Creating New Markets

##### Semiconductors and Electronic Components

###### -XRTmicron-

This non-destructive inspection instrument that utilizes X-ray topography technology responds to defect inspection needs for next-generation compound semiconductors (e.g. SiC).



##### Batteries and Battery Materials

###### -CT Lab HV-

This X-ray computerized tomography (CT) instrument for industrial use enables non-destructive defect inspection, in three dimensions and at high speed, supporting in-line quality control for production of automotive batteries.



##### Life Sciences

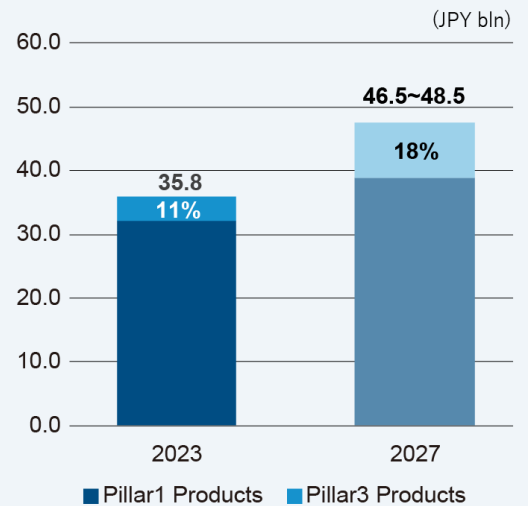
###### -MoleQlyze-

This dedicated instrument for protein structure analysis renders protein molecules visible in solution and is expected to be used in biopharmaceutical R&D.



#### Contribution of Pillar 3 Products' Sales Expansion to Revenue Growth in Multi-purpose Analytical Instruments

Fig.18



## (2) Service Strategies Tailored to Customer Segments

Rigaku provides proficient after-sales services ranging from supply of consumables and replacement parts, software and hardware upgrades, thorough repair and inspection, to preventive maintenance contracts and support for equipment transport. Rigaku ensures continuous after-sales services throughout the product life cycle. This practice helps build long and trusted relationships with customers, with a high customer retention rate. It also establishes a stock-based business model backed by the steady increase in the installed base of the products sold (Fig.19).

Rigaku’s service operations bolster the Company’s growth strategy by effectively addressing the diverse needs of each customer segment, from academia, semiconductor, to other industries. Enhancing service operations builds a stable foundation of recurring earnings, contributing to Rigaku’s growth and development (Fig.20 and Fig.21). For example, for the semiconductor industry, we offer CCS\*<sup>1</sup>, which packages application support with 24/7 hardware support, parts supply, and warranties, which resolves the customer needs to prevent down time in manufacturing lines.

### Key Services Tailored for Each Customer Segment

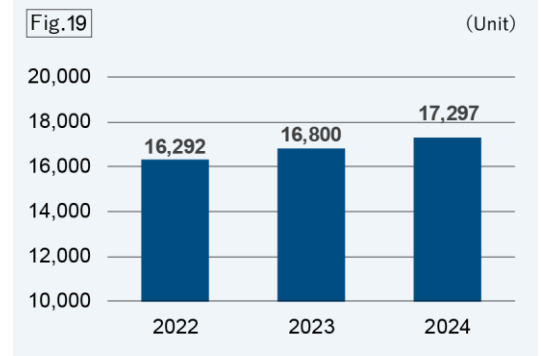
●Academia	Application support, sale of upgrades, etc.
●General Industry	Prompt repair for improving utilization rate, remote support, etc.
●Semiconductor Industry	Special programs, such as 24/7 response, packaged with product sales.

\*1 Comprehensive Customer Support

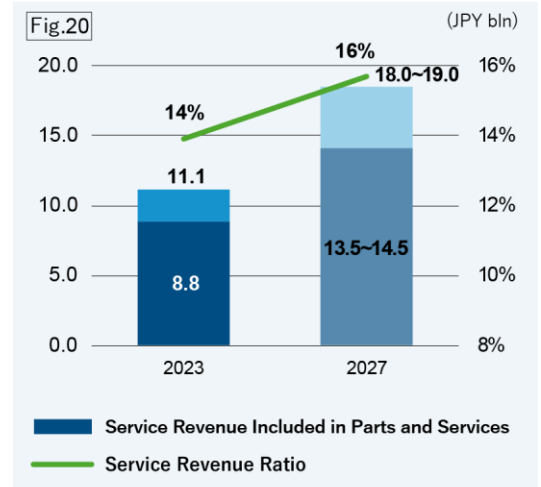
\*2 In the “Trends in Installed Base of Products Sold,” the cumulative number of units shipped over the 12 years leading up to the year under review is calculated as active for the groups of products that are subject to services making up the service revenue included in the parts and services.

\*3 In the “Revenue Growth Plan for Services,” service revenue includes, in addition to the service revenue included in the parts and services, other service revenue that is included in the multi-purpose analytical instruments and semiconductor process control instruments, which is difficult to separate and tabulate in management accounting.

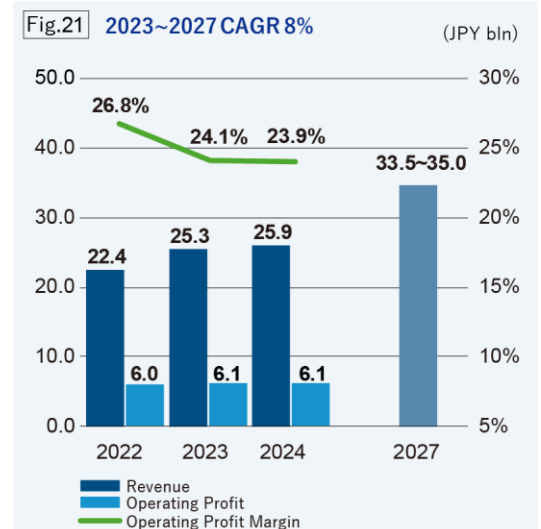
### Trends in Installed Base of Products Sold\*<sup>2</sup>



### Revenue Growth Plan for Services\*<sup>3</sup>



### Business Performance Trends and Revenue Growth Plan for Parts and Services



### (3) Investment in Reinforcement of Operating Platform, Including Commercial Infrastructure and Production Capacity

To accelerate growth in overseas markets, where higher market demand growth is expected and the Company has ample opportunity to enhance its presence and increase market share, Rigaku reinforces investments in sales and service personnel, and application scientists, while building product development platform that enables the Company to engage with customers in each region, and thereby understanding and responding to global market needs. Through these investments, Rigaku aims to enhance its product sales capabilities.

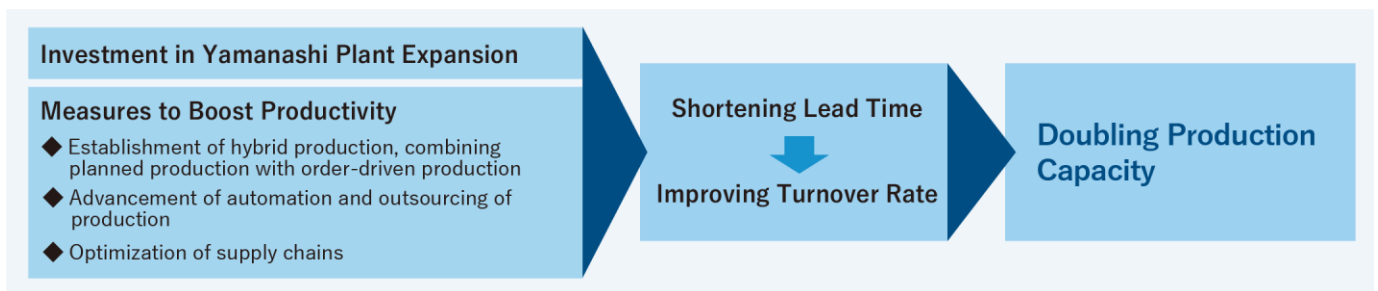
The Company is also investing in establishing new sales offices, laboratories, and technology centers in major markets. Effective deployment of this commercial infrastructure will support the acceleration of product sales.

#### Results and Plans for Commercial Infrastructure Investments

Results	April 2023	Rigaku Technology Center is established in the Silicon Valley region of California, USA.
	March 2024	Rigaku Corporation Taiwan Branch opens in Taiwan.
	April 2024	Rigaku's subsidiary in Shanghai, Rigaku Shanghai Corporation, opens. An application lab is established at Rigaku Shanghai to cover the Chinese market.
	November 2024	Rigaku BioScience Lab opens in Cambridge, Massachusetts, USA.
Plans	2025	Rigaku's subsidiary in India, Rigaku India Private Ltd., opens.
	~2026	A Support Center opens in Korea.
	~2026	A Technical Center opens in Taiwan.

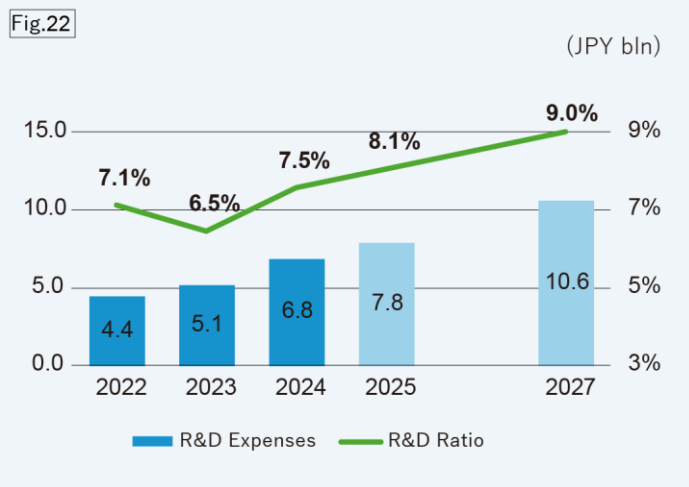
Rigaku operates four production facilities in Japan and eight in five other countries. We concentrate production of core component parts and specific product models in designated facilities to maximize production efficiency. With some production strategically outsourced to partner companies, Rigaku establishes a robust and balanced framework for reliable supply of high-quality products.

Amid the Company's solid growth in revenue in recent years, Rigaku has taken concerted steps to meet the surging market demand with timely delivery. At Yamanashi Plant, Rigaku's main production facility, the Company is implementing an investment plan for a significant expansion of production capacity during the 2024–2025 plan period. This **investment plan for reinforcing production capacity at Yamanashi Plant**, alongside other several measures to boost productivity, will double Rigaku's production capacity, as compared with 2022, to respond to the strong market demand and will support Rigaku's growth strategy, serving as the Company's product supply foundation.



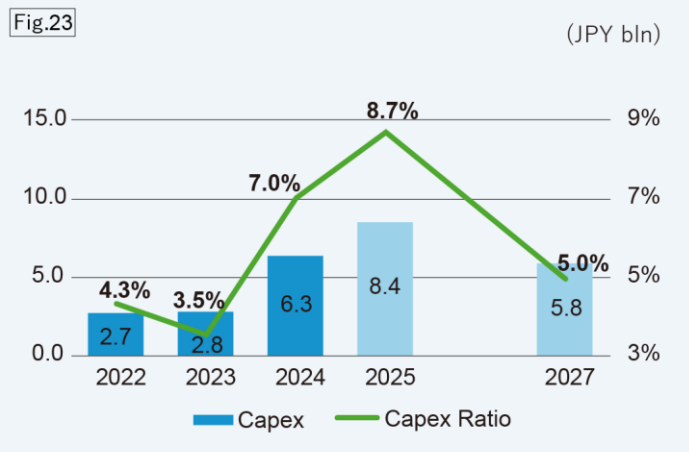
## 5. Allocation Plan of Management Resources

### (1) R&D Investment Plan



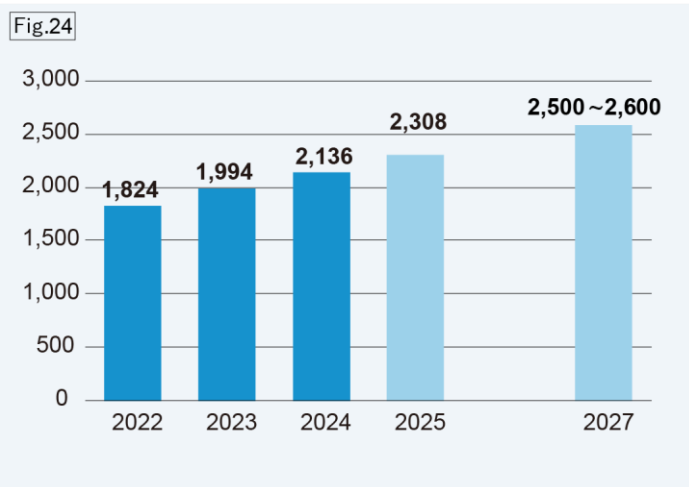
- ▶ The Company plans to incrementally raise R&D spending as a percentage of revenue to reach approximately 9% by 2027 (Fig.22).
- ▶ The Company plans to invest in research and development focusing on strengthening X-ray core technologies to further enhance high brightness, micro spot, and high throughput capabilities, as well as developing AI (artificial intelligence) and machine learning capabilities, and advanced analytical software. These technologies drive the creation of innovative products that meet leading-edge market needs.

### (2) Capex Plan



- ▶ Capex ratio will temporarily spike to nearly 9% of revenue in 2025 as a result of investments in the expansion of Yamanashi Plant and Osaka Plant. Over the medium- to long-term, capex ratio is expected to trend at around 5% of revenue<sup>\*1</sup> (Fig.23).
- ▶ The nature of Rigaku's business model does not require extensive capex on production equipment and machinery. Following the completion of the Yamanashi Plant and Osaka Plant expansion, investments in machinery and equipment, such as laboratory and JEP<sup>\*2</sup> equipment, are expected to constitute approximately 50% of the Company's capex.

### (3) Staffing Plan



- ▶ In 2024, Rigaku grew its revenue by 13.5% year-on-year and increased staffing by 7.1% to establish an operating framework appropriate to the Company's expanding operations (Fig.24).
- ▶ From 2025 onward, Rigaku expects to gain operating leverage from further expansion in revenue. The Company plans to control staffing growth at around 6.5% per year on average until 2027, bringing total staffing level to around 2,500 to 2,600 in 2027.

\*1 This capex plan does not include any investment in large-scale plant upgrading and expansion after Yamanashi Plant, which is not planned as of the date of this Medium-term Business Plan.

\*2 JEP equipment refers to instruments that are part of the Joint Evaluation Program (JEP) for possible sale. In this program, Rigaku lends the instrument to a customer, and they together evaluate its performance before the customer places an order for the instrument.

## 6. Medium-term Goals

	Plan Base Year (FY2023)	FY2024 (Actual)	Medium-term Goals (FY2027)
Revenue (YoY Growth Rate)	JPY 79.8 bln 27.4%	JPY 90.6 bln 13.5%	JPY 115.0~120.0 bln (CAGR Approx. 10%)
Adj. EBITDA* <sup>2</sup> (Adj. EBITDA Margin)	JPY 20.2 bln 25.3%	JPY 23.4 bln 25.9%	JPY 31.5~32.5 bln Approx. 27%
Adj. Operating Profit* <sup>3</sup> (Adj. Operating Profit Margin)	JPY 18.3 bln 22.9%	JPY 20.9 bln 23.1%	JPY 26.5~27.5 bln Approx. 23%
R&D Ratio* <sup>4</sup>	6.5%	7.5%	Approx. 9%
Capex Ratio* <sup>5</sup>	3.5%	7.0%	Approx. 5%* <sup>6</sup>
Headcount* <sup>7</sup>	1,994	2,136	2,500~2,600

\*1 The Revenue range for the Medium-term Goal in FY2027 is set within 5% of the amount of Revenue goal in FY2027 (the Adj. EBITDA, Adj. Operating Profit and Headcount ranges for the Medium-term Goals in FY2027 are also set in a similar manner). The YoY Growth Rate of Revenue for the Medium-term Goal in FY2027 means CAGR of Revenue in the four-year period through FY2027 in comparison to FY2023, with the revenue forecast for each fiscal year from FY2025 to FY2027 calculated, applying the assumed exchange rates of 145 yen per dollar and 156 yen per euro.

\*2 Adj. EBITDA = Income Before Income Taxes + Depreciation and Amortization + Impairment Losses – Interest and Dividend Income + Interest Expenses + One Time Costs (IFRS Implementation Cost, Consulting Fee, Exemption Application-related Cost in China, IPO-related Cost, etc.)  
Adj. EBITDA Margin = Adj. EBITDA / Revenue

\*3 Adj. Operating Profit = Operating Profit + PPA Amortization + Impairment Losses + One Time Costs    Adj. Operating Profit Margin = Adj. Operating Profit / Revenue

\*4 R&D Ratio = R&D Expenses / Revenue

\*5 Capex Ratio = Capex / Revenue    Capex is calculated as the amount of capex excluding right-of-use assets.

\*6 The Capex Ratio for the Medium-term Goal in FY2027 does not include in its numerator the portion of capex for any investment in large-scale plant upgrading and expansion after Yamanashi Plant, which is not planned as of the date of this Medium-term Business Plan.

\*7 Headcount is presented as the sum of total employees at the fiscal year-end plus the average number of temporary employees throughout the fiscal year.

## 7. Capital Allocation Policy

Considering its capital cost, Rigaku is committed to a capital policy that balances growth investment with financial soundness from a medium- to long-term management perspective, while distributing dividends to shareholders according to business results in each fiscal year.

### (1) Disciplined Investment in Growth

- ▶ Rigaku is continuing to invest in growth, including R&D investment with a focus on X-ray core technologies, aimed at generating innovative products, and investment to expand the Company's operating platform worldwide.
- ▶ The Company selectively explores opportunities for inorganic expansion into new growth areas to further strengthen its solution capabilities utilizing X-ray technology. This includes partnerships with external parties, M&A investments, and expansion of operations into fields of other analytical technologies that supplement X-ray technology.

### (2) A Sound Balance Sheet

- ▶ Rigaku is reducing debt obligation to ease its interest burden and decrease net leverage. These measures enable the Company to invest in growth and build a resilient financial base capable of withstanding temporary market downturn risks.

### (3) Balanced Shareholder Returns

- ▶ Rigaku aims to maintain and improve **a dividend payout ratio of 30% of consolidated net income** by taking a comprehensive view on income and cash flow in each fiscal year.