



# **Fiscal Year Ended March 2019 Financial Results Briefing**

May 24, 2019  
OPTiM Corporation  
President Shunji Sugaya

1. **Company overview**
2. **FY3/2019 result review**
3. **FY3/2019 major activities**
4. **Earnings forecasts for FY3/2020**

**Disclaimer**

All of the plans, forecasts, strategies, etc. described in this material are predictions based on information available at the time of creation, and are subject to variable factors, such as economic conditions, a competitive environment and the future prospects for newly introduced services. Accordingly, please be advised that the actual results of business performance may differ substantially from the projections described here. Market information and other statements contained in this report are based on information currently available, and we do not guarantee complete accuracy.



# Company Overview

Company name	<b>OPTiM Corporation</b> (Tokyo Stock Exchange, first section, code number: 3694)	
Location	Head office:	OPTiM Head Office Building, 1 Honjomachi, Saga, Saga Prefecture
	Tokyo head office:	21F Shiodome Bldg, 1-2-20 Kaigan, Minato-ku, Tokyo
	Kyūshūkōdai-mae office:	Center of Iizuka Research and Development 103, 680-41 Kawazu, Iizuka, Fukuoka Prefecture
Representative director	<b>Shunji Sugaya</b> (Invited Professor, Faculty of Agriculture, Saga University)	
Established	Jun 8, <b>2000</b>	
Capital	JPY 443 million	
Book closing	March	
No. of employees	<b>229</b> (Regular employees, as of Apr. 2019)	
Major shareholders	Average age <b>33.9</b> , 80% of employees are engineers Shunji Sugaya, Nippon Telegraph and Telephone East Corp., Fuji Xerox	
Content of business	License sales, maintenance support service business ("Optimal" Business; IoT Platform Services, Remote Management Services, Support Services, Other Services)	





# Corporate Mission

“We make the Internet  
as simple as breathing”

“We make sure network devices work for you.”



OPTiM Corporation

President and representative director: **Shunji Sugaya**

The Internet has become an indispensable part of the infrastructure of our lives. Under the concept of "making the Internet as simple as breathing," OPTiM's mission is to remove the existing need for a certain level of IT literacy when accessing it, and to make it instead like the air that we breathe, unaware. Since our establishment, we engage in developing products that allow everyone to benefit from the opportunities and convenience the Internet brings.

The company continues to grow by providing the latest AI/IoT/Robotics services in various industrial fields with its **rich technological capabilities and business creativity based on its intellectual property strategy.**

Features (Strengths)	Contents
Intellectual property strategy	Development of functions, products, services, and business models based on patents (Our CEO won No. 1 as an individual in patent asset scale ranking in the information and communications field.)
No.1 market share in Japan	"Optimal Biz" # 1 Share in Mobile Management confirmed by multiple market research firm reports
Growth potential	More than 20% revenue growth each year. Invest much of the proceeds in R&D. Open an office in Silicon Valley (United States)
Vendor Free	By developing AI, IoT, and Robotics technologies in-house, we can provide highly flexible combinations of services that are not tied to any specific IT vendor or technology. We don't lock in our customers like major domestic and overseas IT vendors.
Unique position in the ICT industry	We propose and provide flexible service solutions that combine our own products with those of other companies while leveraging open source and third-party technologies



We are becoming a leading company in  
the Fourth Industrial Revolution

## **"OPTiM Cloud IoT OS" will strive to become the de facto standard in the 4th industrial revolution and OPTiM will be leading the fourth industrial revolution in Japan**

We expand our AI, IoT and Robotics businesses more aggressively than in the previous fiscal year, as well as continue to invest intensively in these fields to advance necessary business development.

OPTiM Cloud IoT OS lets anyone access the full power of AI and IoT. It is an all-in-one IoT Platform that allows you to collect, store and analyze data from IoT devices like cameras and sensors.



OPTiM CLOUD IoT OS

As a company that will play a central role in the "4th Industrial Revolution", we will continue to invest aggressively in R&D in the current fiscal year to the extent that ordinary profit will not be negative, as in the previous fiscal year. The current fiscal year will be a foothold to achieve the de facto standard with OPTiM Cloud IoT OS, which is gaining results.

In particular, we will promote our "○○× IT" efforts we have been making over the past few years. "○○× IT" rebuilds various industries using the power of IT technology.



- OPTiM possesses **abundant intellectual property**
  - **Shunji Sugaya** is ranked **No. 1 individual** in patent asset scale ranking in the information and communications field. (As of the end of January 2015, research by Patent Result Co., Ltd.)
- He was awarded the “**Intellectual Property Achievement Award**”
  - By **Patent Office of METI** in April 2018
- We are developing innovative activities that effectively utilize our intellectual property in all aspects, including entry into new business fields, business diversification, and global expansion





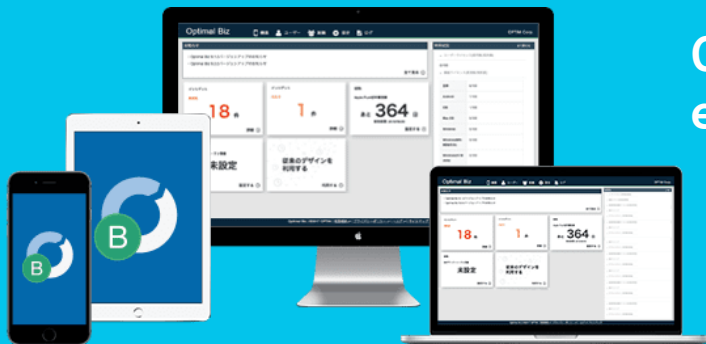
## OPTiM's Strengths: Highest Market Share in Japan



Optimal Biz – Highest MDM Market Share – Expanding mobile potential

Optimal Bizはスマートフォンや  
タブレット端末のビジネス活用  
における幅広い課題を解決します

Information leakage, unauthorized use, the burden of mobile device management...  
Optimal Biz solves the challenges of using smart devices in the enterprise.



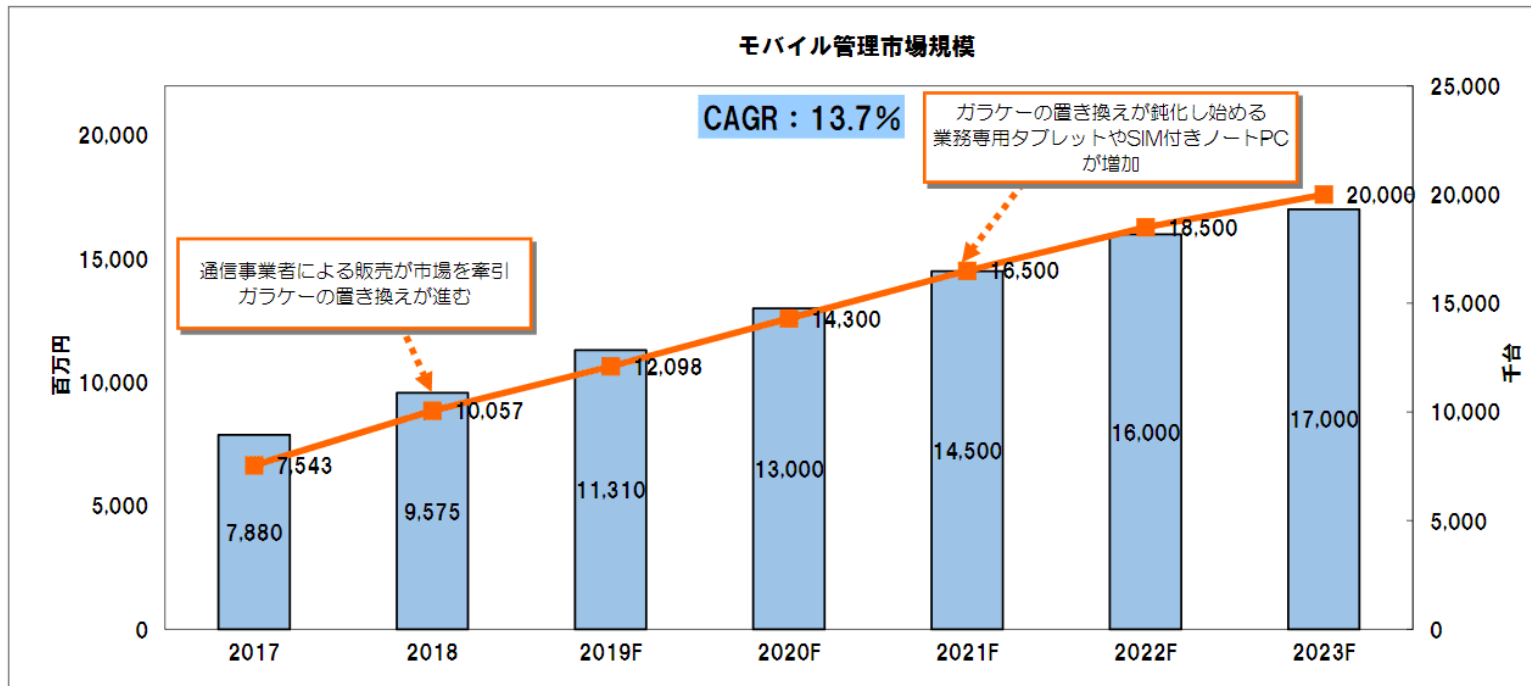
OPTiM's patented technology enables more  
efficient mobile device management

Optimal Biz's unique capabilities also meet more complex  
needs. This is why Optimal Biz is chosen over and over.

The MDM market was worth 8B yen ~ 10B yen as of fiscal 2018, and OPTiM has gained the de facto standard with a market share of 30 to 40%. Although a slight slowdown is expected after fiscal 2018, stable MDM market growth continues approximately at a CAGR (2018 -2022) of 11% to 13%\*.

\*Calculated with reference to the survey reports of market research companies (Techno Systems Research, Fuji Chimera Research Institute, Mick Economic Research Institute)

モバイル管理市場トレンド



Source: Techno Systems Research, Inc. Research Report "-2019 Endpoint Management Market Marketing Analysis 2018"



# OPTiM's Strengths: Vendor Free

Various vendor-free products based on open platform "OPTiM Cloud IoT OS"



Agriculture



Healthcare



Construction



Electric  
Power



Retail



Finance



Transportation



Manufacturing

etc.

abnormal sign detection

physical security

call center solution

In-store Marketing

Agriculture and Aquaculture Solutions

Medical and nursing care solutions

Smart Fields (field management)

OPTiM PaaS Apps



IoT Explorer



Insight



Code



Store

3rd Party Apps

Marketplace

Securely add apps and functions without development, and sell 3rd vendor apps

Cloud API Portal

API  
Free!!

You can choose or let AI choose AI from all around the world.

AI Computing

IoT Computing

Advanced identity management for greater security across organizations



## OPTiM Cloud IoT OS

OPTiM PaaS Apps



IoT Explorer



Insight



Code



Store

Resource  
Free!!

Cloud Virtual Machine

Cloud Computing

Works extremely securely in the cloud as well as on-premises environments

IoT hub

Cloud Driver

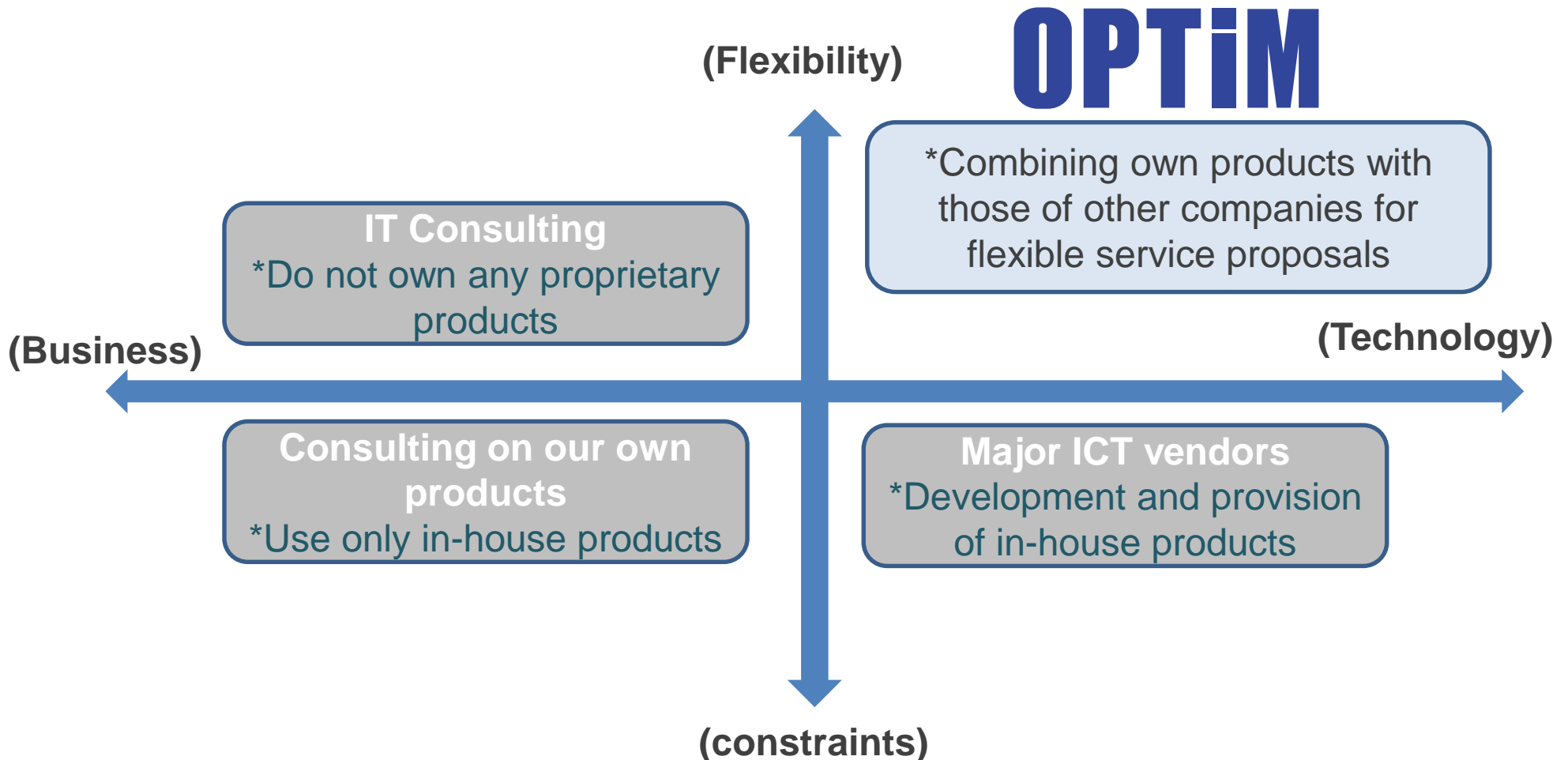
Device  
Free!!

Edge Computing

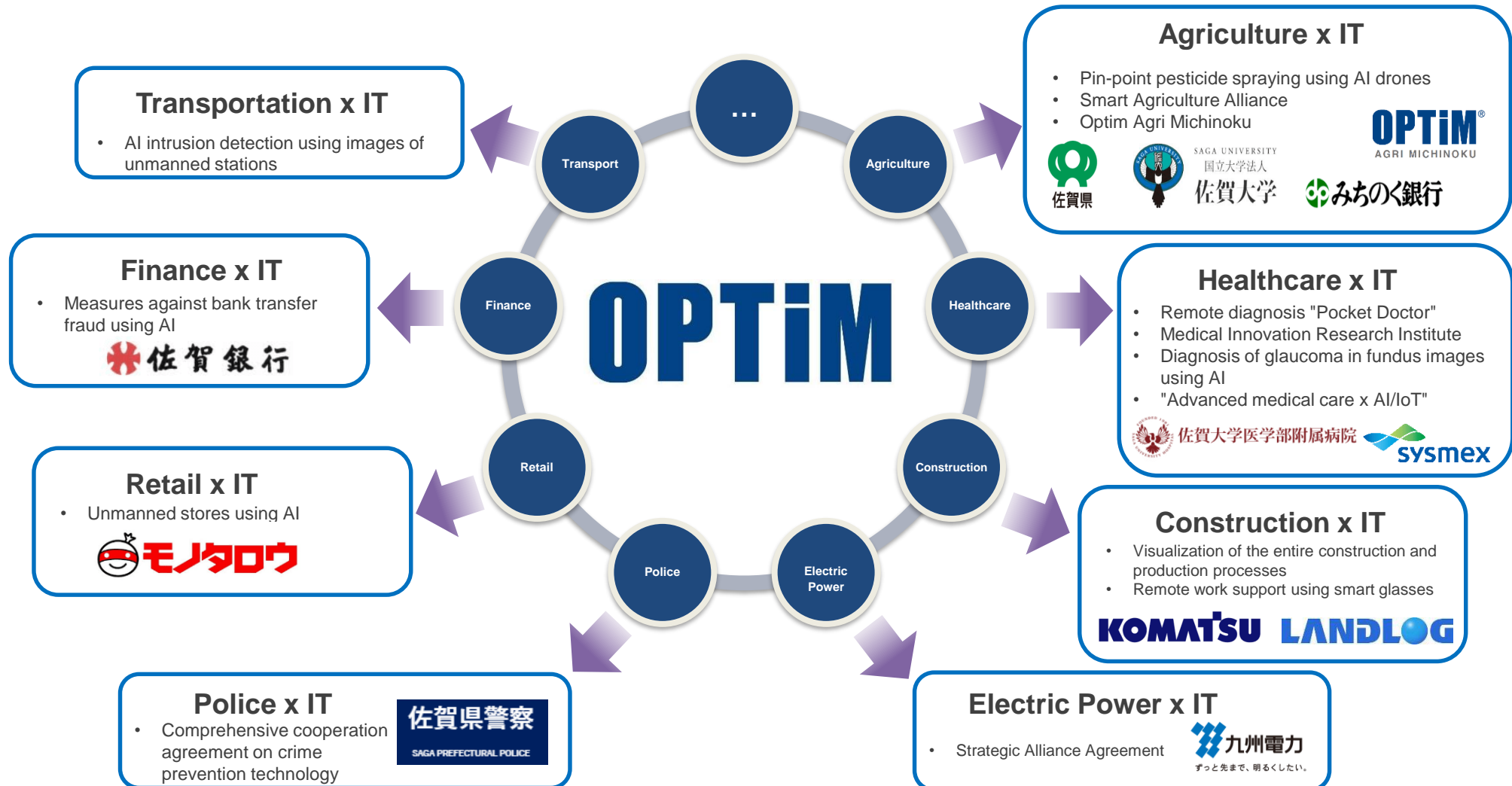
Efficiently manage edge devices through container distribution, etc.



Capable of developing technologies related to AI, IoT, and Robotics, we can provide flexible service solutions while leveraging open source and other technologies.



We are developing a wide range of businesses that integrate cutting-edge technologies such as AI, IoT, and Robotics with various industries to create new value and solve problems.





# FY3/2019 results review



## Record sales achieved in each of the 19 terms since foundation

**Sales of JPY 5.4 billion achieved in FY3/2019, surpassing initial target of JPY 5.06 billion**

License sales (stock sales accounting for more than 80% of sales) grew more than 20% YOY thanks to steady accumulation of licenses for existing services.

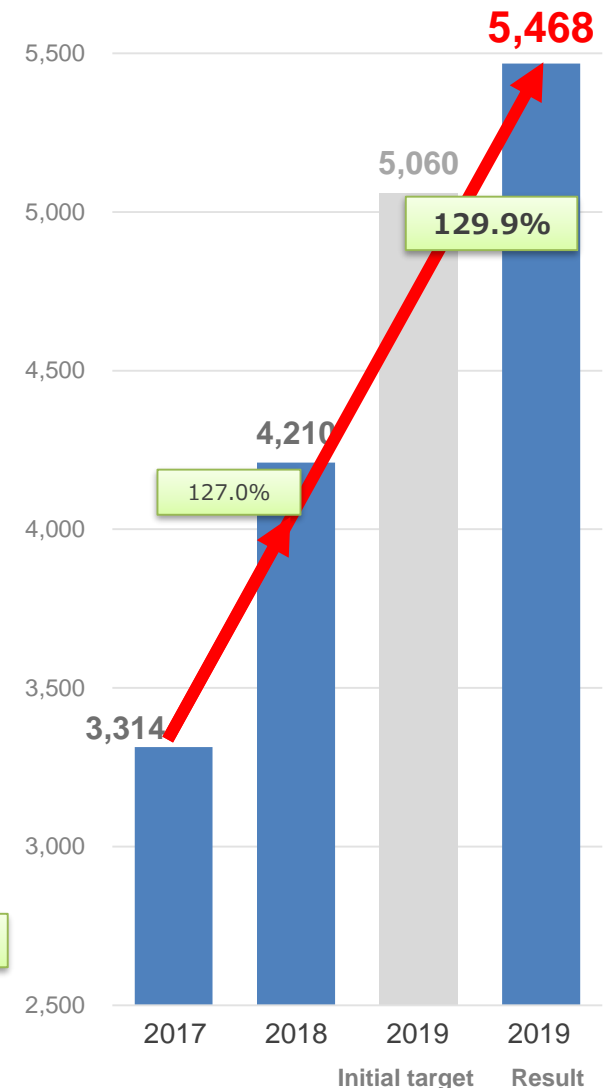
Customization sales (flow type sales are mainly from new service orders) achieved results of over 90% YOY.

As a result, an overall YOY sales growth of 29.9% was achieved.

Compared to previous year

(Unit : JPY million)

### Sales trend





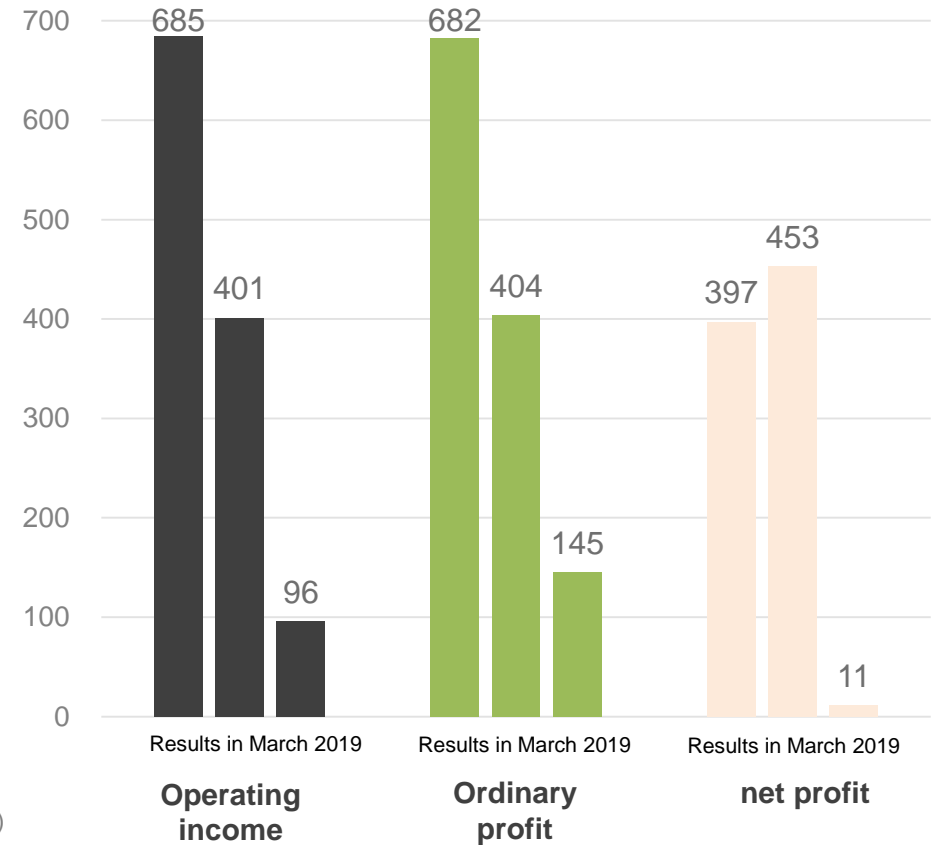
**To become a leading company in the Fourth Industrial Revolution  
To AI, IoT and Robotics  
Active investment ongoing  
~ Earnings are as planned for the full year ~**

As in the previous fiscal year, we made strategic investments in R & D during the year under review. As a result, over ¥2 billion (Approximately 130% compared to the previous year, an increase of approximately 450 million yen on a monetary basis) was invested in research and development.

As a result, operating income was 96 million yen, ordinary income was 145 million yen, and net income was 11 million yen.

(Unit: 1 million yen)

## 3-year profit performance





# FY3/2019 major activities



New Services  
"OPTiM Cloud IoT OS"  
"○○ x IT"

**"OPTiM AI Camera" with over 300 pre-trained models,**

## Prediction service based on quantitative data analysis "OPTiM AI Prediction" announced

飲食向けパッケージ

# AI Camera for Restaurants

月額 **15,000** 円/カメラ

 <p>入店者数カウント</p>	 <p>入店者数予測</p>	 <p>入店率分析</p>	 <p>混雑分析 (レジ前など)</p>	 <p>混雑予測 (レジ前など)</p>
 <p>混雑検出</p>	 <p>侵入検出</p>	 <p>店舗内人数把握</p>	 <p>店舗内人数情報分析</p>	 <p>店舗内人数予測</p>
 <p>店舗前通行者 カウント</p>	 <p>店舗前通行者数予測</p>	 <p>滞在時間分析</p>	 <p>長時間滞在検出</p>	 <p>動線分析 (ヒートマップ)</p>

管理機能

- ダッシュボード
- デバイス マネジメントサービス
- エッジコンピューティング マネジメントサービス

月額5,000～15,000円/カメラ

※ その他の機能は裏面をご覧ください。

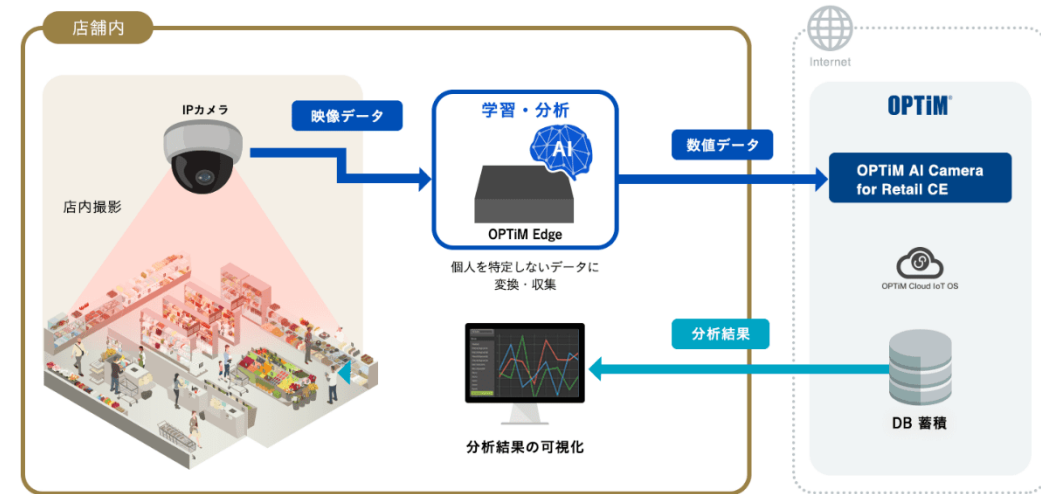
**"OPTiM AI Camera":** This is a package service that supports areas such as marketing, security, and business efficiency by collecting data from various types of cameras installed in different industries and for different purposes, such as stores and facilities, and analyzing images by utilizing pre-trained models.



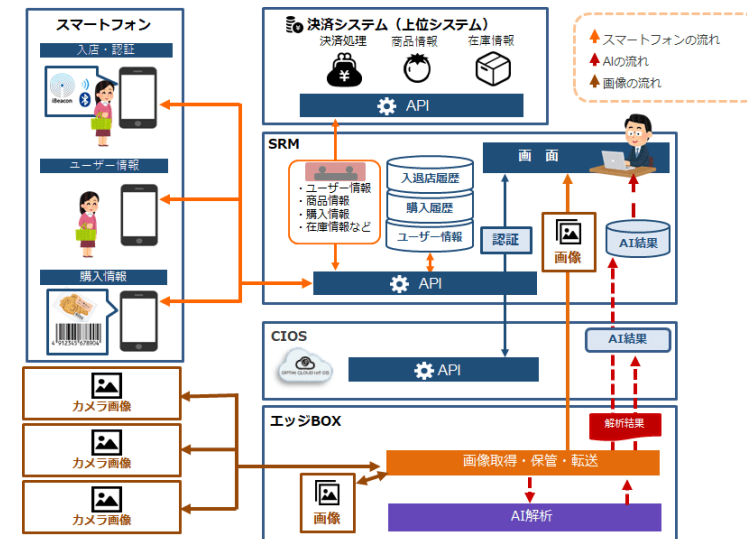
**"OPTiM AI Prediction":** A quantitative data analysis service that provides a predictive model for future trends by analyzing collected data in the actual operation of various AI data analyses such as FinTech, price fluctuation prediction, market trend prediction, and security monitoring.

## Next-Generation Showroom for the Internet Age "Tsutaya Home Appliances +" uses "OPTiM AI Camera for Retail CE"

Using AI to support consumer behavior analysis and marketing data acquisition from in-store camera images and tablets

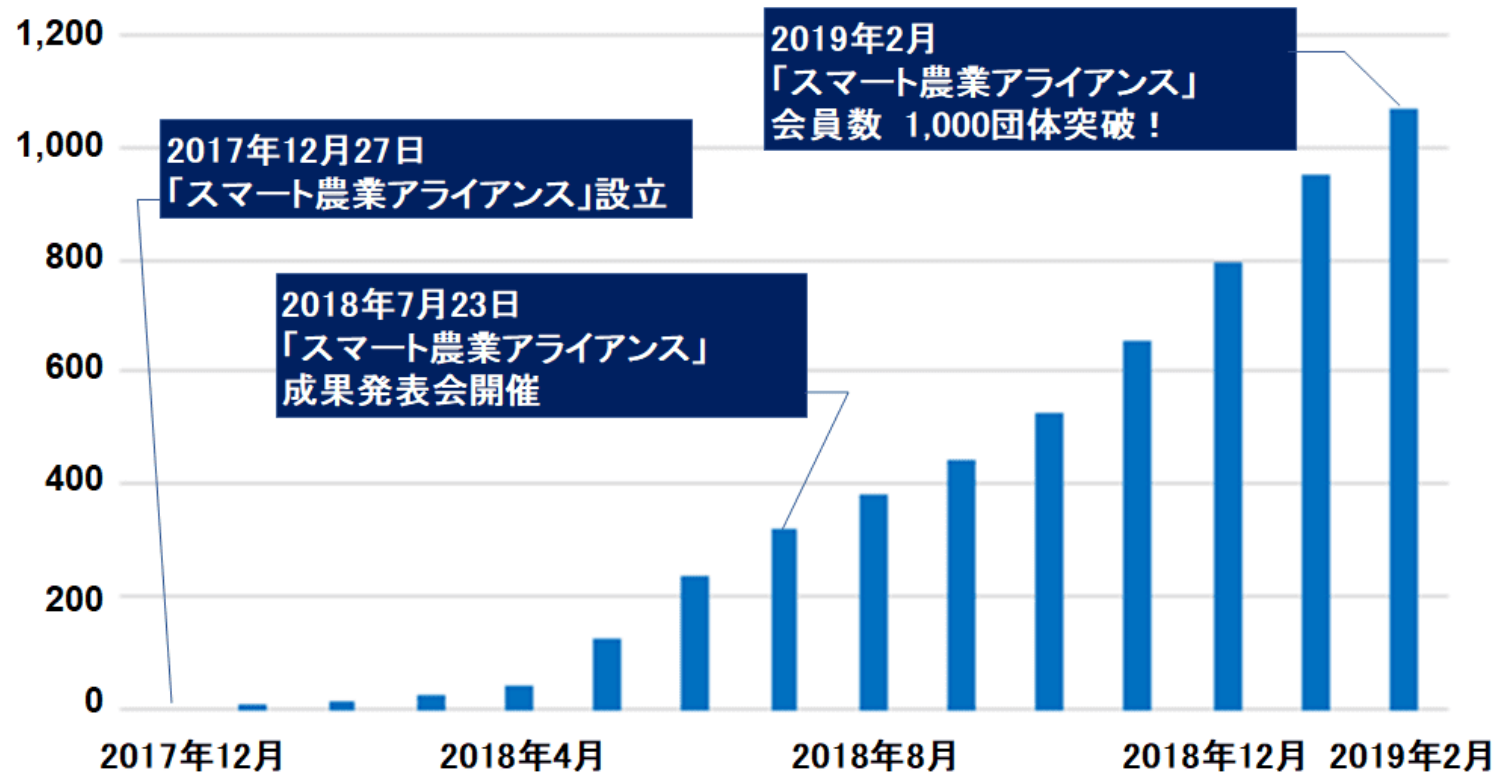


## Pop-up store "PAUL & JOE ACCESSOIRES" uses "OPTiM AI Camera"





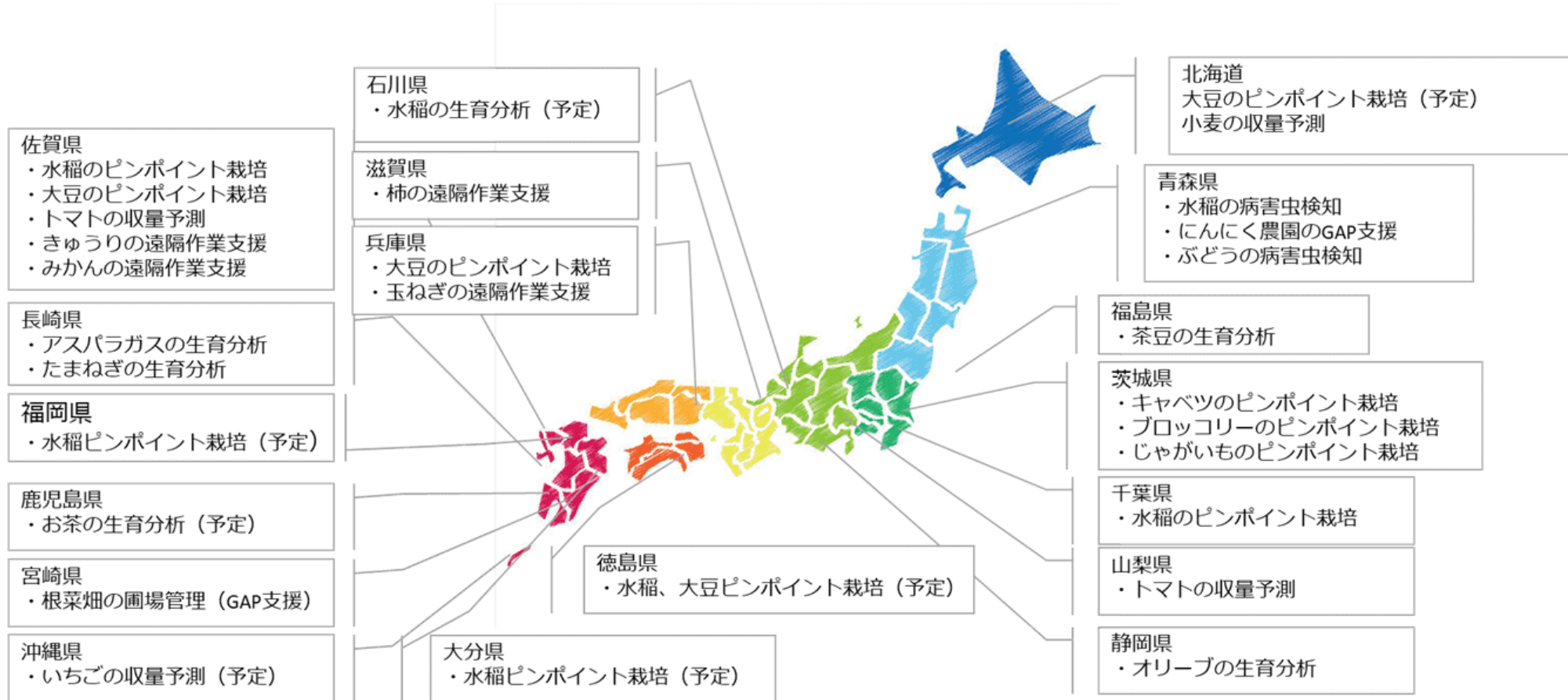
**"Smart Agriculture Alliance" working with future-oriented producers,  
The number of participating organizations exceeds 1,000.**





## OPTiM Smart Agriculture Alliance Results Presentation by Future-Oriented Producers Using AI, IoT and Drones

Promoting smart agriculture in 18 prefectures with 18 items (1/3 of Japan's prefectures participate)





## No detection of pesticide residues in product grown using AI drones The release of safe and secure "smart rice"



Cultivating Oita Prefecture "Hinohikari" and "Nikomaru" Saga Prefecture "Sagabiyori" and Fukuoka Prefecture "Hinohikari" and Aomori Prefecture "Masshigura" as "smart rice", achieving 50 to 100% reduction \* 2 in use of targeted agricultural chemicals \* 1

\* (1) Among agrochemicals, insecticides and fungicides that can be reduced by pinpoint pesticide application are defined as "Agricultural chemicals to be reduced".

\* (2) Regarding the amount of agricultural chemicals to be reduced, the amount of agricultural chemicals to be used is compared with the standard amount of agricultural chemicals to be used, which is the standard value for the average amount of agricultural chemicals to be used in the cultivation method used in the area every year or the standard amount of agricultural chemicals to be used when delivering to a Japan Agricultural Cooperatives (agricultural cooperative) in the area, and the amount of agricultural chemicals to be used when sprayed using the pinpoint pesticide spraying technology. The amount of reduction may vary by year or region.



The website that sells rice and vegetables that was cultivated using cutting-edge technology "Smart AgriFoods Direct Delivery (Smachoku)" opens

Sold on Amazon, Yahoo and other EC Sites



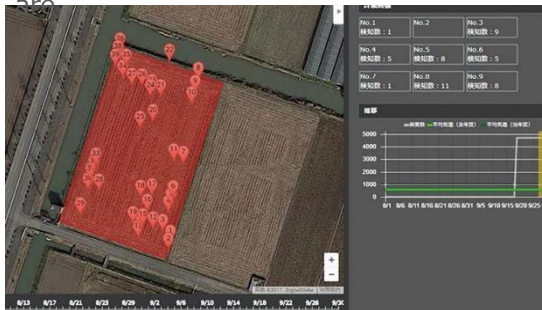
## Basic patent for pinpoint pesticide application and fertilization technology \*

~ AI-Based image analysis enables cultivation with reduced pesticide (fertilizer) use ~

\*Patent No. 6326009, issued January 9, 2017

**\*Image of utilization (Example of application of pinpoint pesticide spraying technology)**

1: A drone takes pictures of the field and determines where pests and diseases



2: The drone moves to the point of origin



3: It sprays agricultural chemicals



The soybeans grown in this demonstration experiment were named "Smart Edamame", and were sold at the department store Fukuoka Mitsukoshi in Fukuoka City, Fukuoka Prefecture at about 3 times the price of regular soybeans (Edamame beans).



The organic food market is expected to grow to about 20 trillion yen, mainly in East Asia.

表 3-1-1 有機食品に係る市場規模

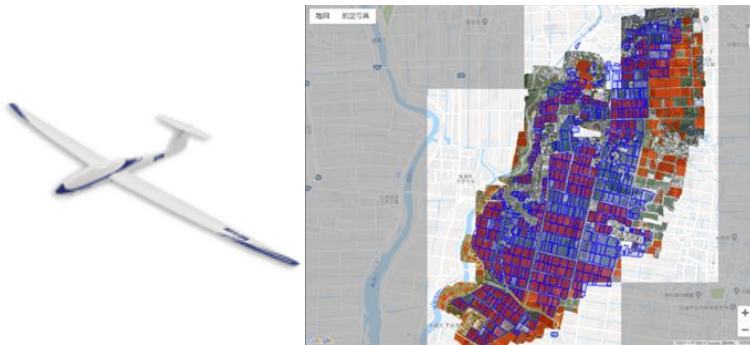
国名	年間販売額 (億円)		一人当たり 年間販売額(円/人)		輸出額 (億円)	
中国	989	(2009 年)	75	(2009 年)	375	(2008 年)
台湾	52	(2006 年)	227	(2006 年)	—	
韓国	429 (参考)283	(2010 年) (2008 年)	888	(2010 年)	—	
タイ	64	(2009 年)	88	(2009 年)	55	(2009 年)
アメリカ	26,298	(2011 年)	8,400	(2011 年)	—	
ドイツ	8,238	(2011 年)	10,125	(2011 年)	—	
日本	1,250	(2009 年)	1,000	(2009 年)	—	

**Per capita spending in Japan is about one tenth of that in the United States and Germany  
It is highly likely that a new organic food market of about 1 trillion yen will be created in Japan.  
Combined with the export market for organic foods to East Asia, a new market of about 20 trillion yen could emerge in the future.**

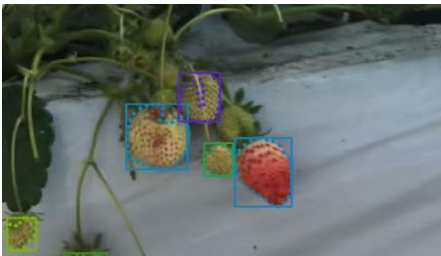


## Participation in national projects and advanced research (Efforts with the Ministry of Agriculture, Forestry and Fisheries)

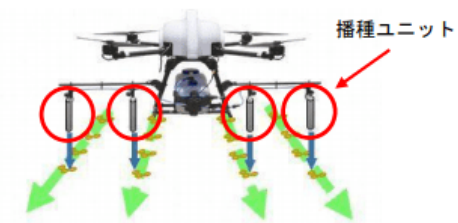
'Development of wide-area collection, visualization, and utilization technology for farmland and crop information using drones (Development of software that reduces the work time required to survey and analyze information on a wide area of farmland and crops to 1/2 or less)' in "Strategic Project Research Promotion Project"



Establishment of harvesting prediction and pest detection methods using AI image analysis technology in "Demonstration Project for Establishment of Advanced Model Agriculture through Cooperation between the Agricultural and Business worlds"



Establishing Ultra-labor-saving Paddy Rice Cultivation Technologies to Make "Innovative Technology Development and Rapid Deployment Project (Management enhancement projects)" More Competitive in Domestic Rice Cultivation



播種用ドローン

- ・播種ユニットの開発と改良  
(4条点播種 時速5km 播種深度0.5cm)
- ・播種時の水田状態のモニタリング技術の開発

Adoption of 2 projects in FY 2019 "Smart Agriculture Technology Development and Demonstration Project" (To be entrusted as a consignee member)

- ✓ Demonstration of Smart Agricultural Technology System Using Agricultural Bulldozers and Drone in Large-Scale Paddy Rice Management
- ✓ Demonstration of a Smart Agricultural Technology System (Large-Scale open field vegetable complex management) in which all employees participate through management of an agricultural corporation with diverse human resources

## Michinoku Bank and Japan's First Smart Agricultural Regional Trading Company Establishment of "Optim Agri Michinoku Co., Ltd."



**In the area of "Optim Agri Michinoku Co., Ltd." we will actively promote "smart agriculture" in order to make agriculture, the primary industry of Aomori Prefecture, a key industry in terms of both production and sales, a "profitable agriculture".**

### Business Profile:

1. Production and Distribution of the crops that were grown by the local producers using OPTiM's smart agriculture solution.
2. Providing the total commodity functions of smart agriculture.
3. Providing consultation services for smart agriculture.
4. Providing any other necessary AI/IoT services contributing to the development of local areas in Aomori prefecture.

## For agriculture, forestry, fisheries, distribution processing, and food industries AI, IoT and Robotics Platform "AGRI EARTH" announced

Promoting the use of agricultural big data. Working with WAGRI to Create Value through AI and IoT





## Drone pilot sharing service Start beta version of "DRONE CONNECT"

Professional drone services for any business

We provide professional  
drone services for all  
types of business

**OPTiM®**

**DRONE CONNECT**



**Optimal matching based on  
work requirements**

Our Alliance with pilot training firms and many professional drone pilots allows us to match each job with the best suited pilot.



**Anonymous feedback**

Evaluate your pilots' job performance. Your evaluation helps to improve overall safety service quality.



**Secure management of each  
pilots' profile**

We work with many reliable professional pilots. Each pilots' detailed information on flight experience, flight hours, operating drone type, etc. are recorded and saved in the system.



**Growth monitoring**

A multispectral camera is used to take images of your field and crops. These will be analyzed to visualize crop growth conditions (vegetation analysis.) Furthermore, these images can be used to estimate the time of fertilizer application.



**Spraying of pesticides**

Depending on time of disease and pest outbreak, pesticides can be sprayed directly by the drone. There is no need for hard manual spraying labor. The pesticide spraying service can be ordered anytime farmers want to spray pesticides.



**Pin-point spraying of  
pesticides (pest detection)**

Crop images taken by drone are analyzed by AI to detect disease and pest. Based on the results of the analysis, pesticides will be sprayed spot-on.

# Operating Smart Forestry Solution "Forest Scope" in collaboration with EverydayDrone by Komatsu



Forest aerial photography  
by EverydayDrone



Forest Ownership  
Information

## ■ Input

- Forest aerial photography by EverydayDrone
- Forest Owner Boundary Information

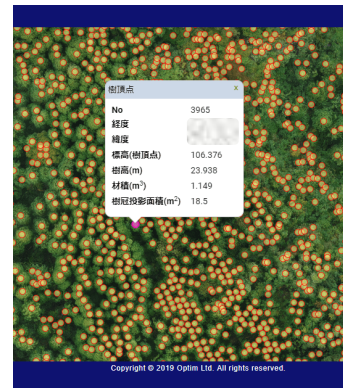
## ◆ Image Processing ◆

## ■ Output

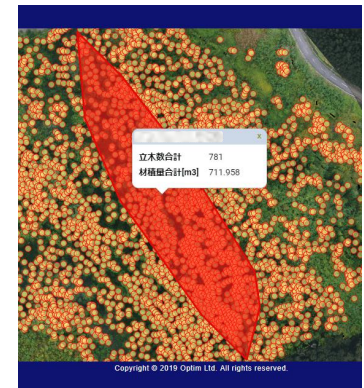
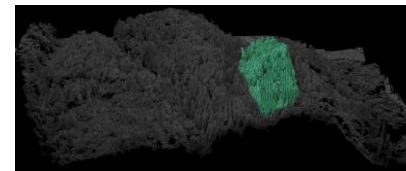
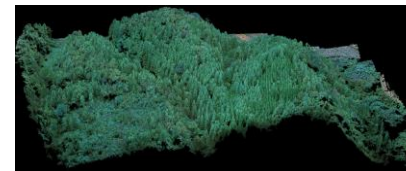
- Tree Information Estimation (Number of trees/Height/Position of trees/Area/Mass)
- Boundary information from ortho/3D images

Image: Ishikawa Prefecture/Ishikawa Prefecture Forest Association/Komatsu

## Forest Scope



Orthographic images +  
tree information



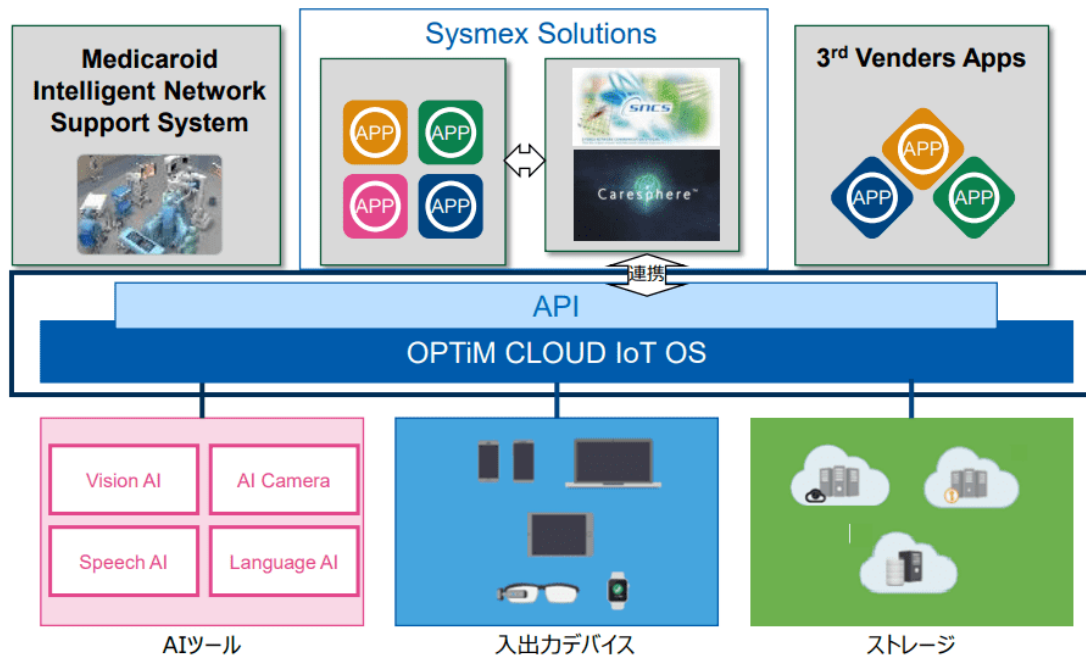
Orthographic image +  
boundary information  
+ tree information

3D Image

3D image + border information

## Business alliance with Sysmex in the area of "Advanced medical care × AI/IoT"

Accelerate development and deployment of IT solution platforms to support next-generation healthcare and diagnostics



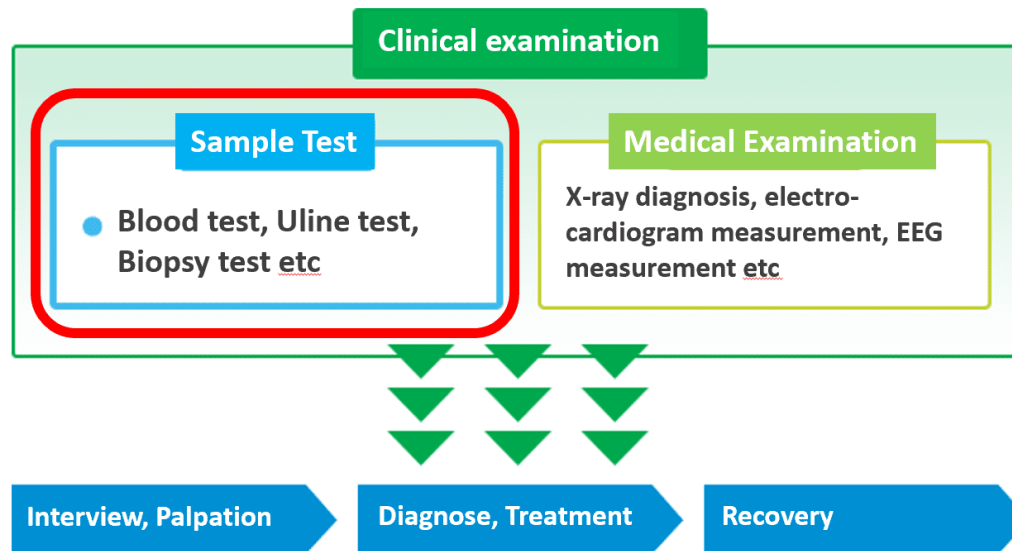
Examples of key initiatives:

- Disease prediction combining genome information and AI analysis and development of new diagnosis combining test image information and AI analysis
- Development of network services to support telemedicine and preventive medicine
- Development of services to support the improvement of efficiency and quality of medical institutions, such as remote monitoring of medical devices and the use of AI in response to inquiries
- Development of AI and IoT for "surgical support robot" to support optimization of the entire operating room

We are also planning to consider an optimal collaboration system with the possibility of a capital alliance in the future.



- Contributes to the health of all through “Diagnostics”.
  - Mainly develops, manufactures, and sells the equipment, reagents, and software required for "specimen examination".
- Has the largest share in the global market for "Hemocytometers".
- Operates in more than 190 countries.



It is essential to perform examination in any stages.

Source: <https://www.sysmex.co.jp/ir/individual-investors/in-brief/about-us.html>

## Efforts with Medicaloid "surgical support robot"

**OPTiM**



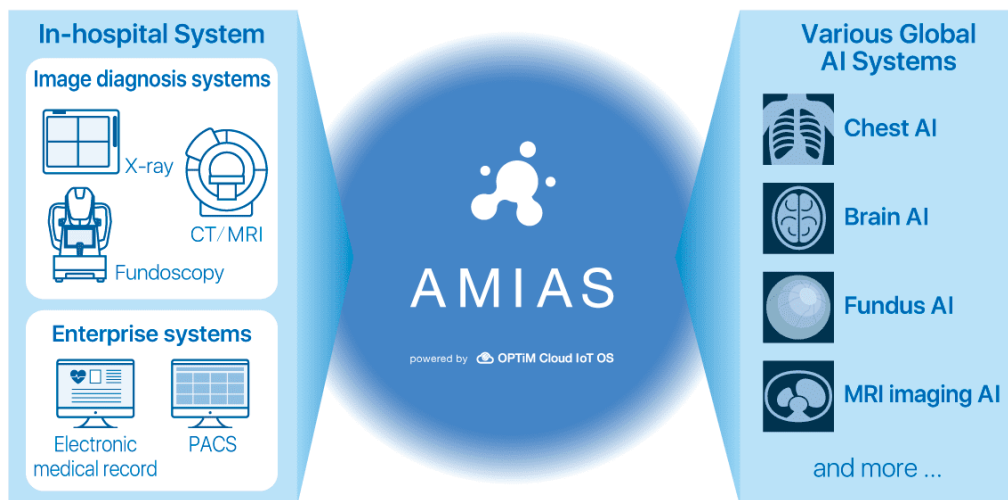
Supporting the aging society in which "EVERYONE..." can live safely  
through medical robots

As medical IT solutions in the advanced medical field, we are promoting the networking of "surgical support robot" which is being developed by Medicaloid Co., Ltd. (Head Office: Kobe City, Hyogo Prefecture Representative Director: Yasuhiko Hashimoto), a joint venture between Sysmex and Kawasaki Heavy Industries, Ltd., and the joint development and verification of the usefulness of services that support the optimization of the entire operating room.

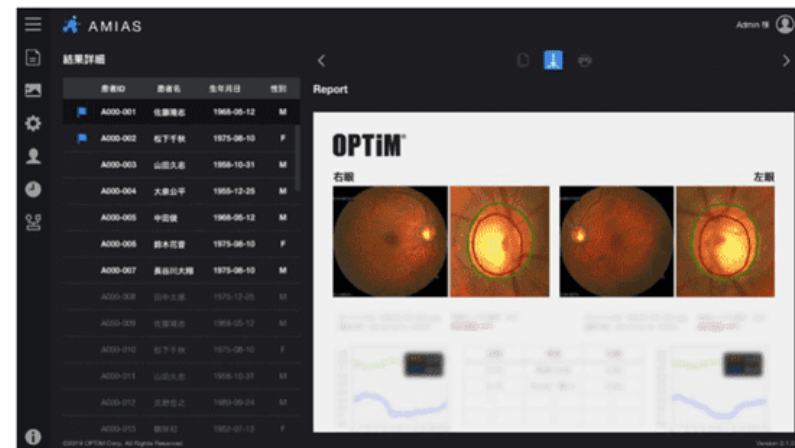
Source: <http://www.medicaroid.com/about/>

## AI Integrated Open Platform for Medical Imaging Launch of "AMIAS" (AI Medical Image Analysis Suite)

Various medical imaging support AI programs developed by domestic and overseas AI program manufacturers, including OPTiM, can be used in conjunction with in-hospital systems such as PACS (MEDICAL IMAGE MANAGEMENT SYSTEM) and Modality (CT, MRI, etc.)



### ■解析結果表示



### ■「AMIAS」パートナー

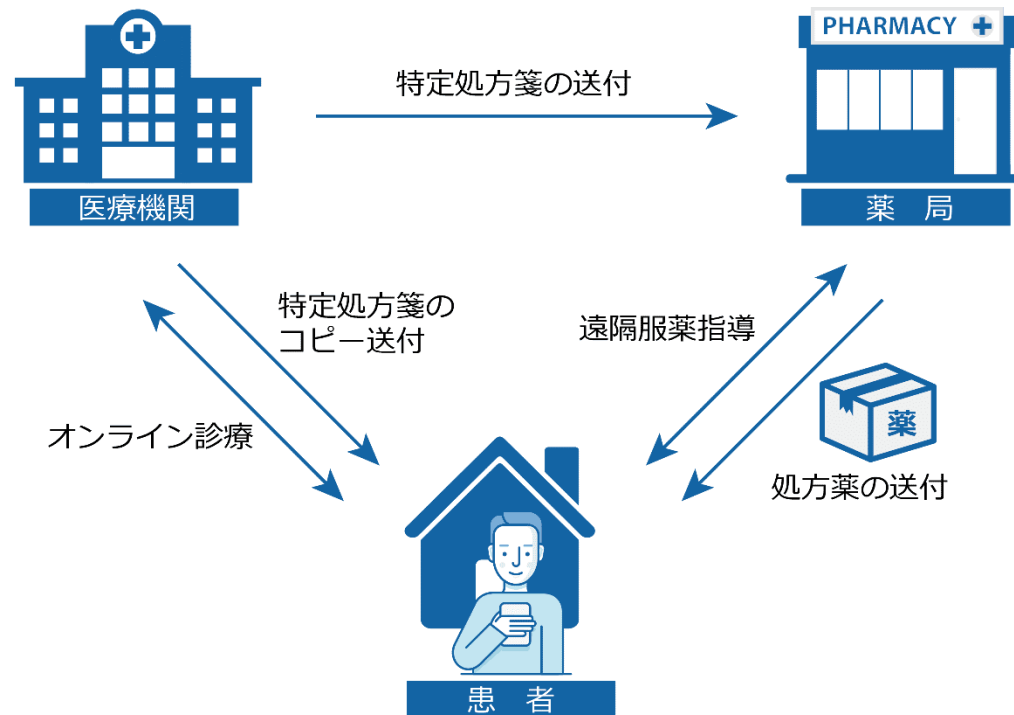
#### AI プログラムメーカー



#### その他パートナー

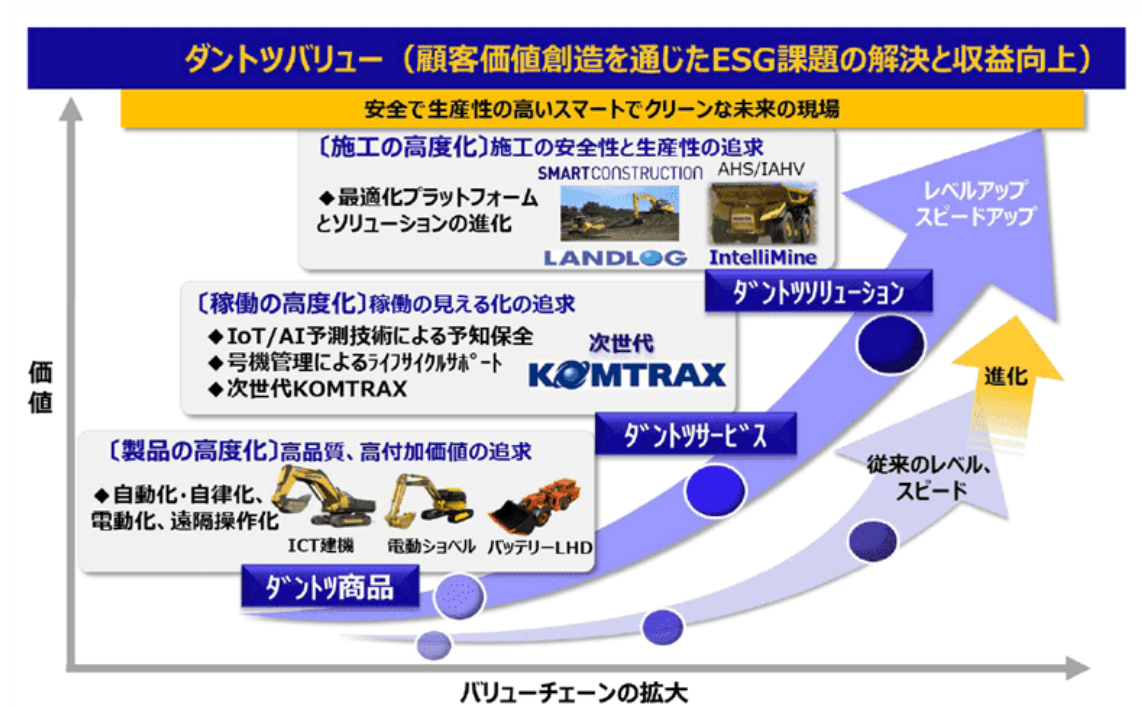


## “Online Clinical Pocket Doctor” was adopted in the demonstration experiment of remote medication instruction in Aichi Prefecture



Patients can receive treatment by a doctor and medication instructions by a pharmacist at home, and prescription drugs are also delivered to their home.

## Under Komatsu's medium-term plan announced on April 26 Positioning "LANDLOG" as a pillar of growth strategy



### [The Three Pillars of Growth Strategy and Key Activities]

#### 1 Value creation through innovation

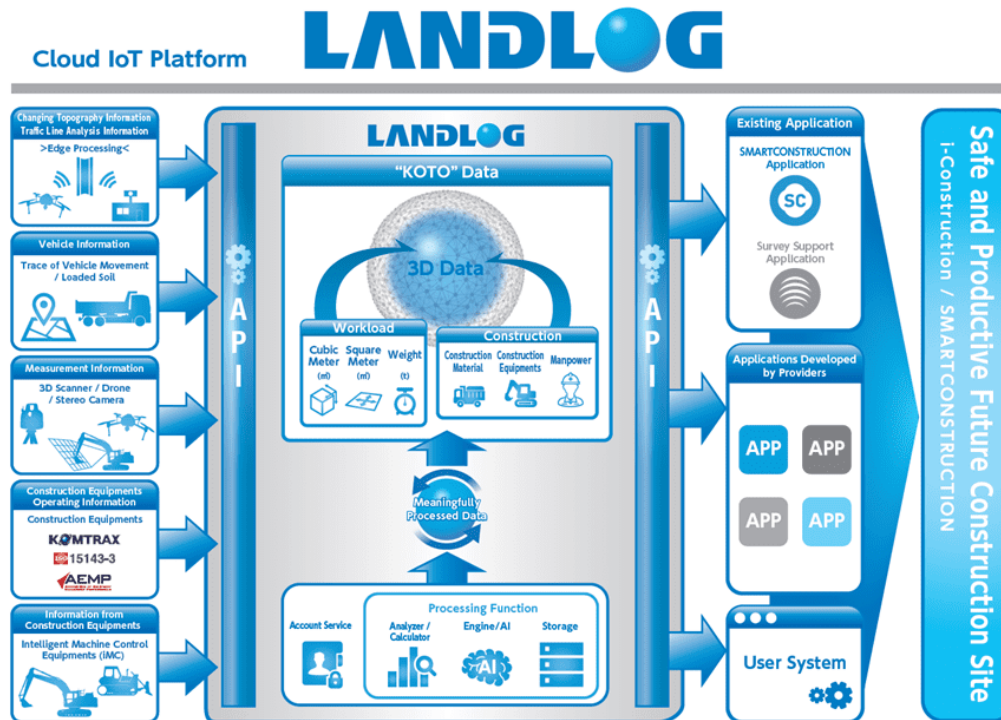
Based on Komatsu's monozukuri technology, which pursues quality and reliability, we will actively incorporate technologies that are not available within the Komatsu Group, and thereby bring about innovation that will create a safe, productive, smart, and clean workplace for the future. For construction sites, we will strengthen the development of an open platform "LANDLOG" compatible with digital transformation, advanced ICT construction equipment such as autonomy and cooperation, and construction simulation that optimizes construction by utilizing production technology, and promote "Smart Construction" on a global scale by rapidly expanding the market.

~ snip ~

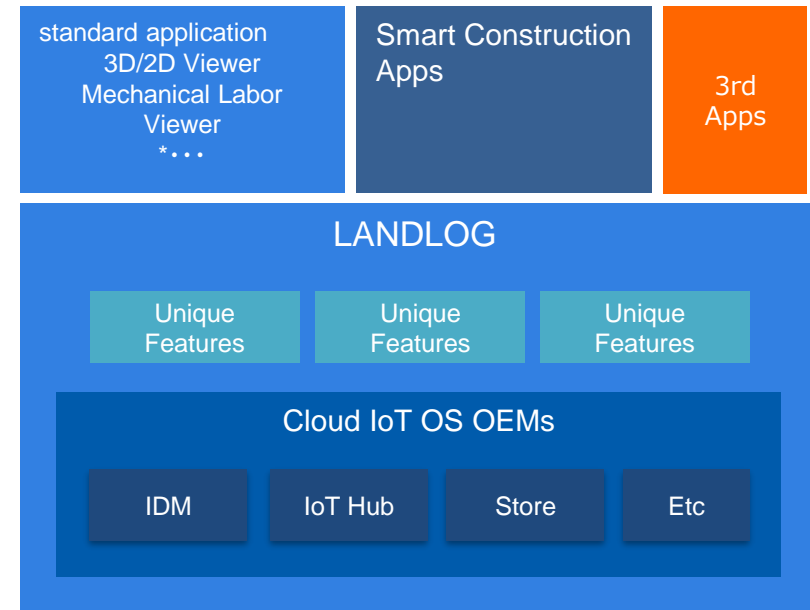
#### Growth Strategy through Business Reform (c) Structural Reform for Growth

Source: Excerpt from press release "New Medium-Term Management Plan (2019 – 2021) "DANTOTSU Value - FORWARD Together for Sustainable Growth" Launched"  
[https://home.komatsu.jp/press/2019/management/1202302\\_1600.html](https://home.komatsu.jp/press/2019/management/1202302_1600.html)

## An open platform that connects construction production processes "LANDLOG"



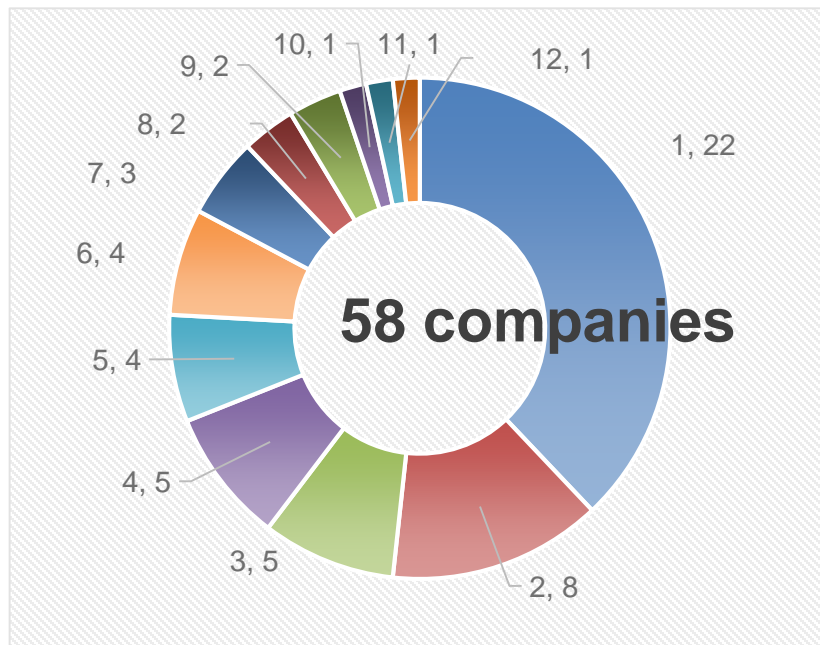
### Built on Cloud IoT OS



## LANDLOG Expands to 58 Partners

Many applications and services are being developed by each company

[Number of Partners]



[App]



**GembaCam**  
Visualization of the site



**PosiCom**  
Share location information with field members



**construction equipment operation viewer**  
Visualization of construction equipment operation



**Building MORE**  
Visualization of the actual situation

Etc...



## Power x IT



Tie-up to develop new services and businesses utilizing AI, IoT, etc.

### Strategic Alliance Agreement

## Finance and IT



Activities for crime prevention inside and outside banks using AI and IoT

### Conclusion of strategic comprehensive alliance

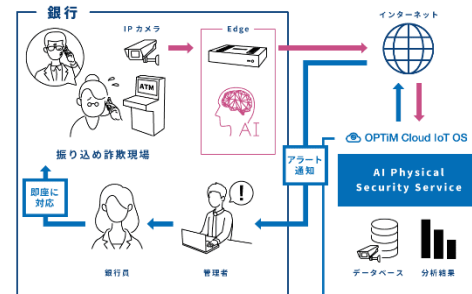
## Police x IT



Comprehensive Partnership Agreement on R & D and Operation of Security Technologies Related to Local Safety and Security Using AI and IoT

For crime prevention technologies, etc.  
Conclusion of the Comprehensive Partnership Agreement

Face recognition technology images of montage images and camera images using AI



Demonstrating "ATM Corner Monitoring System" to Prevent Billing Fraud at Saga Bank's ATM Corner





# Existing Services

In a research report published by Mick Economic Research Institute,  
Achieved the No.1 \* share in the domestic EMM market in fiscal 2017



\*Source: Mick Economic Research Institute, September 2018, "Collaboration and Mobile Management Package Software Market Outlook 2018 Edition".

In the research report published by Fuji Chimera,  
Achieved the No. 1 \* share in the domestic MDM and EMM market  
for the third consecutive year

Achieved 34.3% ID count (+ 3.3%) and 37.0% total shipping cost (+ 7.5%)



\*Source: Fuji Chimera Research Institute "2016 Network Security Business Survey Overview (first volume)" published in November 2016, "2018 Network Security Business Survey Overview (first volume)" published in September 2017, "2017 Network Security Business Survey Overview (first volume)" published in October 2018.

In Techno Systems Research  
In "mobile management market" in 2018,  
Achieved the No.1 share \* in 8 out of 10 divisions



2018-2019年版  
エンドポイント管理市場のマーケティング分析

2018年モバイル管理市場  
**No.1** を獲得

\*Source: Techno Systems Research, February 2019, "2019 Endpoint Management Market Marketing Analysis 2018"; 2018, "Manufacturer's share of sales" \*Number of licenses shipped by manufacturers; "Share by Delivery Method - SaaS"; "Share of -99 or less by user size"; "-100 to 999 shares by user size"; "-1,000 to 9,999 shares by user size"; "-10,000 + shares by user size"; "Share OEM by Product/OEM".

Business alliance with Sea's Factory  
Began offering "POWER Watch" and other products



"JARAAN (SPLASH)" travel magazine launched  
It is full of information about outings such as and "Value" hotels.



Began offering "DoMAGAZINE", an all-you-can-read magazine service for stores  
Step Forward: Realizing "hospitality" and "Store development"



Japan's only weekly digital magazine  
Launched 16 magazines including "Weekly ASCII"



Launched in "LIBMO" mobile service provided by TOKAI Communications

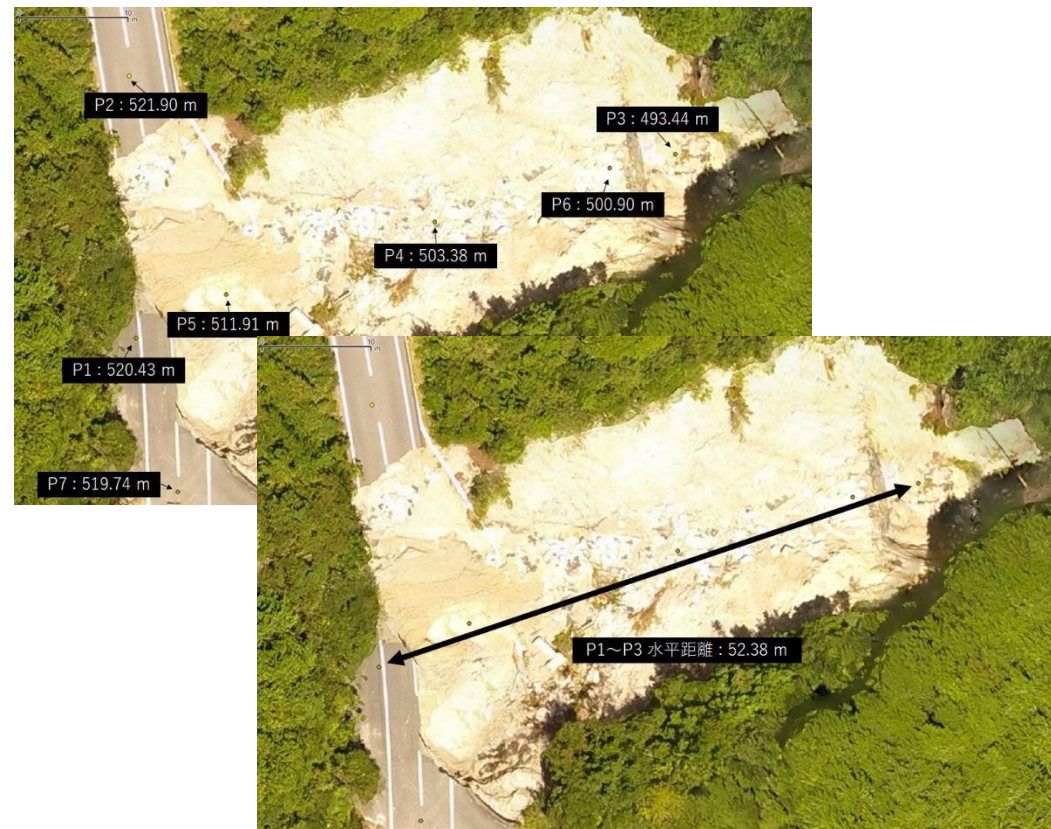


As disaster support in the "Torrential rain in July 2018"  
Free online health consultation for doctors using  
"Health consultation Pocket Doctor"



As disaster assistance for "Torrential rain in July 2018", a survey using drones was conducted free of charge to grasp the damage situation by OPTiM, LANDLOG, and Komatsu

Komatsu's "EverydayDrone"  
Leverages Optim's "DRONE CONNECT"





# Management Advisory Committee



"Management Advisory Committee" Brief Personal History of Members	
<b>Masaaki OKUHARA</b>	Former Vice Minister of Agriculture, Forestry and Fisheries
<b>Kunio NOJI</b>	Director, Komatsu Ltd.
<b>Masayoshi HAYASHI</b>	Special advisor to Sysmex Corporation

Our Company is currently using AI, IoT and Robotics to restructure various industries and industrial infrastructures to become a company that will play a central role in the 4th Industrial Revolution through its "〇〇 × IT" strategy. In order to accelerate this strategy, we have established the "Management Advisory Committee" as an advisory body. Under the "Management Advisory Committee" Our Company invites leading experts in the fields of agriculture, construction, and medical care who are currently working on Our Company as members (Executive Advisor). We hope to use the insights gained from this experience in our future "〇〇 × IT" and other management strategies.

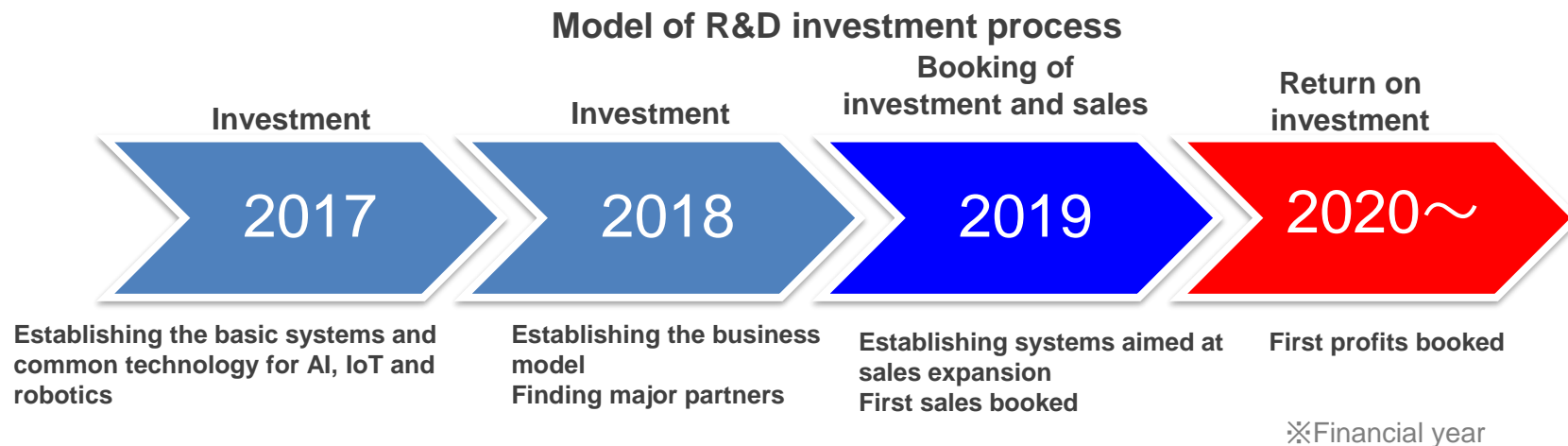


# FY3/2020 Earnings Outlook

# Ongoing investment in our “Industry x IT” strategy

Advancing the further acquisition of AI, IoT and robotic technology

We continue to invest aggressively in the field of AI, IoT and robotics, full-fledged booking of sales and return through profits will follow the schedule below.





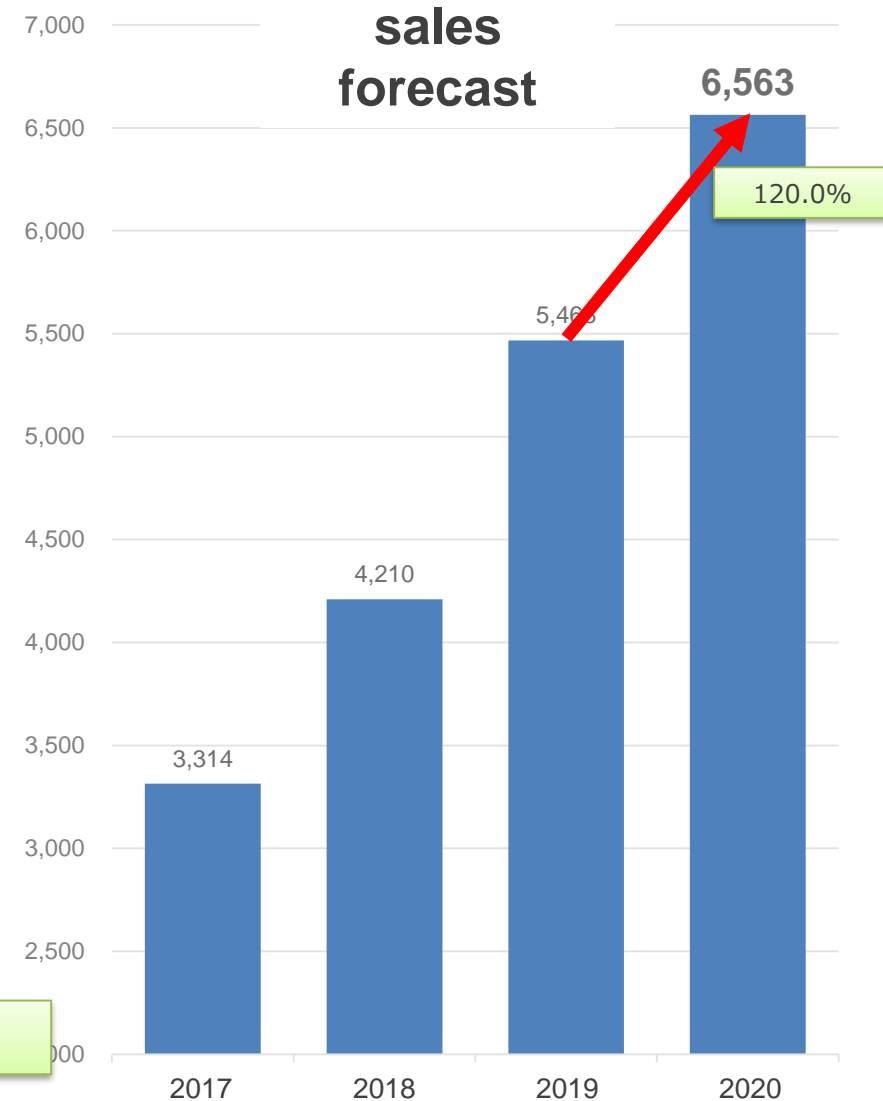


For the year ending March 2020, we aim to achieve record sales for the **20th consecutive year** since our founding.

Sales of ¥6.5 billion due to stable growth of existing services and conservative estimation of new services (120.0% compared to the previous year) is an achievable prospect

Compared to the previous year

(Unit: 1 million yen)

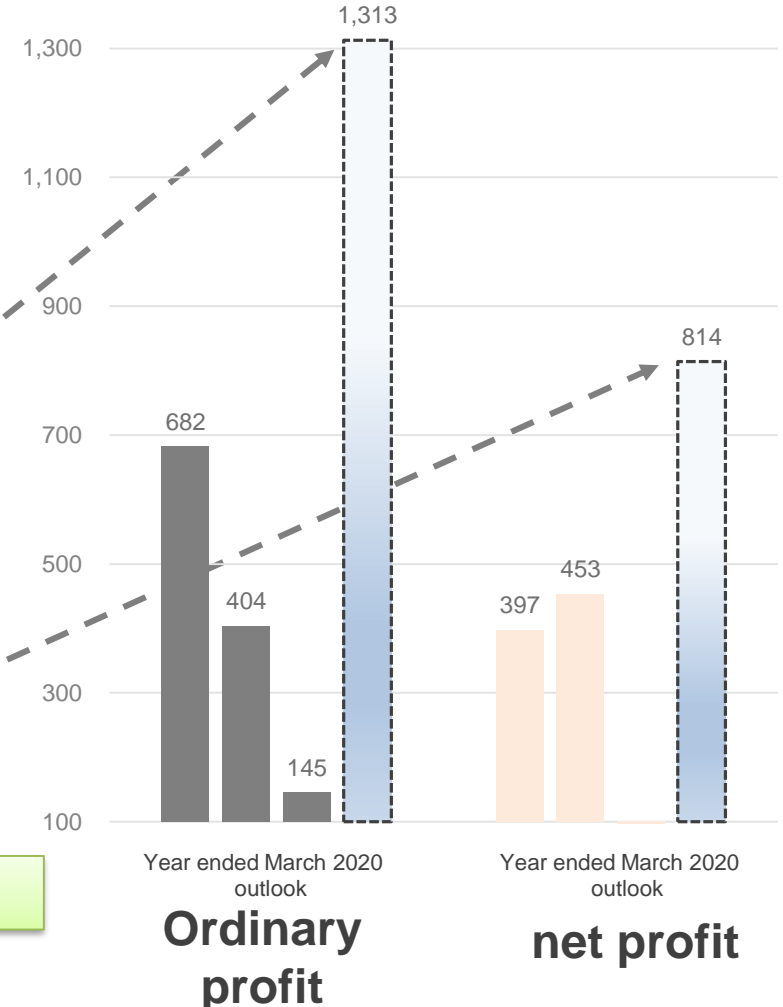




We will make flexible and aggressive investments in AI, IoT and Robotics to become a leading company in the fourth industrial revolution.

As a result, we will continue to use a range of forecasts for ordinary income and net income.

## Change in actual profit for the past 3 years and forecast for the year ending March 2020



**Forecast**  
**Year ended March 2020**  
**Ordinary income: ¥1.3 billion to ¥1 million**  
**Net income: ¥814 million to ¥0**

Aggressive investment in R & D to the extent that profits are not negative  
Disclosure as soon as progress is made

- For the year ending March 2020, we aim to achieve record sales for the 20 consecutive years since our founding. Based on a conservative estimate of stable growth in existing services and new services, we expect to achieve sales of ¥6.5 billion (120.0% compared to the previous year).
  - The markets in which Our Company operates continue to grow steadily, and Our Company's position in these markets remains strong. Assuming that we will continue to invest for growth as usual in the next fiscal year, based on conservative estimates of sales of existing services, "OPTiM Cloud IoT OS" and related services, we can estimate growth of approximately 20% year-on-year, and operating income and ordinary income of approximately 20% relative to sales.
  - In the past few years we have actively invested in AI, IoT and Robotics in order to play a central role in the field of AI, IoT and Robotics. In the year ending March 2020, as in the year ending March 2019, we will continue to invest aggressively in R & D to the extent that our current profit does not drop to a negative maximum, and we intend to make it the 1 year mark for completion in order to achieve the de facto standard in the highly successful OPTiM Cloud IoT OS. Specifically, we will continue our efforts over the past few years to rebuild each industry and industrial base by leveraging the power of IT through the "○○ × IT" initiative that fuses IT with various industries and industries.
- Both sales and profits are expected to increase due to new service orders. Any deviation from the planned values will be promptly disclosed.



# Intellectual Property Strategy and Others



# Concrete Measures for "○○ x IT"

Industry)	timing of the announcement	Contents	Partners
Agriculture	2015/8	<b>Tripartite Pact in IT Agriculture: Saga Prefecture begins efforts to become the world's No. 1 in IT agriculture with the aim of realizing "Fun, Cool and Profitable Agriculture"</b>	Faculty of Agriculture, Saga University and Saga Prefectural Production Promotion Department
	2017/12	World's First Pin-point Pesticide Scattering Technology Utilizes AI, IoT and Drone to Succeed in Cultivating Soybeans: Less than 1/10 of Pesticides Used, No Residual Pesticides Detected, and Equal Yield Quality	
	2017/12	Establishment of a "Smart Agriculture Alliance" led by producers: Free provision of smart agricultural solutions such as drones and AI, and distribution of profits to producers by purchasing the entire harvest	
	2018/7	Holding the Optimum Smart Agriculture Alliance Results Presentation Meeting for future-oriented producers using AI, IoT and drones: Smart agriculture is being promoted in 18 prefectures with 18 products (1/3 of Japan's prefectures participate)	
	2018/7	First drone sowing verification project in Japan: A fixed-wing drone "OPTiM Hawk" and field management service "Agri Field Manager" were used to scan the world's largest area of 8,500 hectares, excluding mountainous areas, to verify the sowing of wheat.	Shiraishi-machi, Kishima-gun, Saga
	2018/7	AI, IoT and Robot Platform "AGRI EARTH" for Agriculture, Forestry, Fisheries, Distribution, Processing and Food Industry announced: Promoting the use of agricultural big data. Working with WAGRI to Create Value through AI and IoT	Agricultural Data Alliance Council
	2018/8	Launch Beta of Drone Pilot Sharing Service "DRONE CONNECT"	
	2018/10	<b>Announcement of basic patents on pinpoint pesticide application and fertilization technology</b>	
	2018/11	Start of sales of safe and secure "smart rice" rice, which uses AI and drones to reduce the amount of agricultural chemicals used	
	2018/11	Kyushu Economic Federation establishes "Smart Agriculture Promotion Consortium" with Fukuoka and Oita Prefectures.	Kyushu Economic Federation, Fukuoka Prefecture, Oita Prefecture
	2019/1	Establishment of "Optim Agri Michinoku Co., Ltd." Japan's first Smart Agriculture Regional Trading Company with Michinoku Bank	Michinoku Bank
	2019/2	"Undetected" produced by pinpoint pesticide spraying technology, and obtained inspection results of pesticide residue "smart rice" by a third party inspection organization.	
	2019/2	Release of "Smart brown rice", which does not detect pesticide residue produced by pinpoint pesticide spraying technology, started.	
	2019/2	"Smart Agriculture Alliance" with Future-Oriented Producers Tackles 1,000 Groups	



# Concrete Measures for "○○ x IT"

Industry	timing of the announcement	Contents	Partners
Healthcare	2016/2	"pocket doctor" Japan's First Smartphone/Tablet Telemedicine Service Launched	MRT
	2016/12	"Institute of Medical Innovation" established to conduct joint research and demonstration of future-oriented medical care using IoT and AI	Saga University School of Medicine
	2018/3	Acquired "Medical Device Manufacturing Business Certificate" to manufacture medical device programs using AI technology	
	2018/4	Launch of "Smart Home Medical Care" a home medical support service that utilizes AI and IoT in hospital rooms via television for medical institutions nationwide	Yuaikai Oda Hospital
	2018/10	"online clinical pocket doctor" Introduces "video call" Function on PC	MRT
	2018/11	"online clinical pocket doctor" adopted in the demonstration experiment of remote medication instruction in Aichi Prefecture	MRT, Kyowa Chemical, Toyone-mura, Aichi Prefecture
	2018/12	"heartwarming TV calling system" Solution for Home-Visit Nursing Service Using Optim Platform for Medical and Nursing Care, Launched by ND Software	ND Software
	2019/1	Get permission for "Sellers and Lessors of Specially Controlled Medical Devices"	
	2019/2	Business alliance in the area of "Advanced medical care × AI/IoT"	Sysmex
	2019/3	Presented the latest AI products for solving medical imaging problems at the "2019 International Medical Imaging Exhibition"	
	2019/3	Obtaining approval for "Second-class medical device marketing business license" enables the design, development, manufacture, application and sale of medical devices	
	2019/4	Launch AI Integrated Open Platform "AMIAS" (Amias) for medical imaging support	



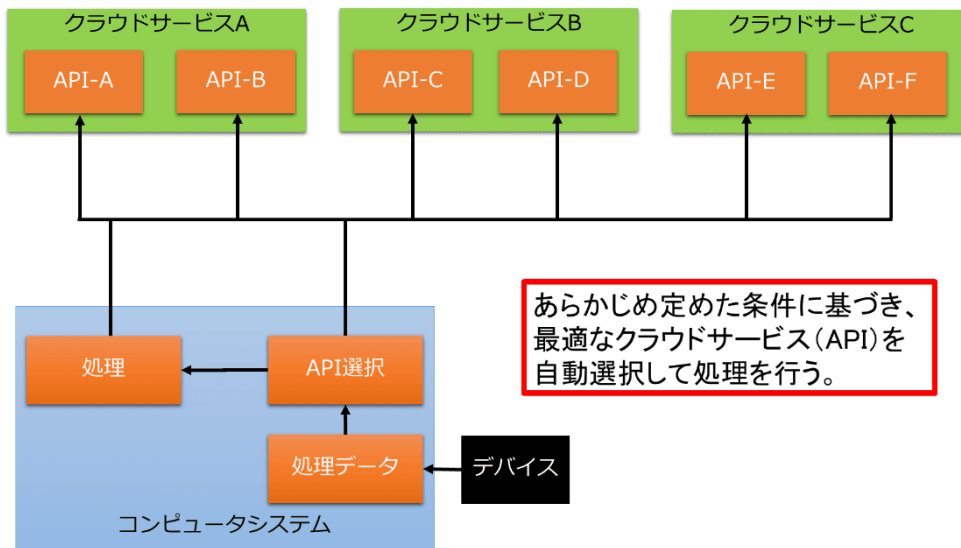
# Concrete Measures for "○○ x IT"

Industry	timing of the announcement	Contents	Partners
Construction	2017/7	Decided on joint planning and operation of a new platform "LANDLOG" that links the entire construction and production process	Komatsu, NTT DOCOMO, and SAP
electric power	2018/10	"Strategic Alliances" Continuous collaboration and cooperation in the examination and development of services utilizing AI, IoT, etc., and new businesses	Kyushu Electric Power
police	2018/10	Comprehensive Partnership Agreement on R & D and Operation of Security Technologies Related to Local Safety and Security Using AI and IoT	Saga Prefectural Police
Retail	2018/3	Opening of "Monotaro AI Store" using AI store management support service "Smart Retail Management"	Monotaro
	2018/12	Providing "OPTiM AI Camera for Retail CE" to "Tsutaya Home Appliances +" a next-generation showroom for the Internet age	Tsutaya Home Electronics Enterprise
	2019/3	Pop-up store "PAUL & JOE ACCESSOIRES" offers "OPTiM AI Camera"	
Finance	2017/12	"Financial and IT Strategic Comprehensive Alliance" was concluded to promote initiatives utilizing AI, IoT and blockchain technologies.	Saga Bank
	2018/7	Demonstration of "ATM Corner Monitoring System" to prevent billing fraud using AI surveillance camera service "AI Physical Security Service" at bank ATMs	
Transportation	2017/10	Using AI to detect anomalies and start demonstration of "AI Physical Security Service" to improve the safety of passengers using JR Kyushu stations	JR Kyushu
	2018/6	Conducted a verification test of "AI Physical Security Service" at Sawa Station on the Joban Line, which is under the jurisdiction of the Mito Branch Office of JR East. The result exceeded the verification test target of 90% and achieved a detection rate of 96.2%.	JR East

## Announcement of basic patent ownership to automatically select the most appropriate AI (artificial intelligence) and API based on predetermined conditions

Implemented as a core function of "OPTiM Cloud IoT OS" and implemented in various services such as "OPTiM AI Camera" and "OPTiM AI Voice"

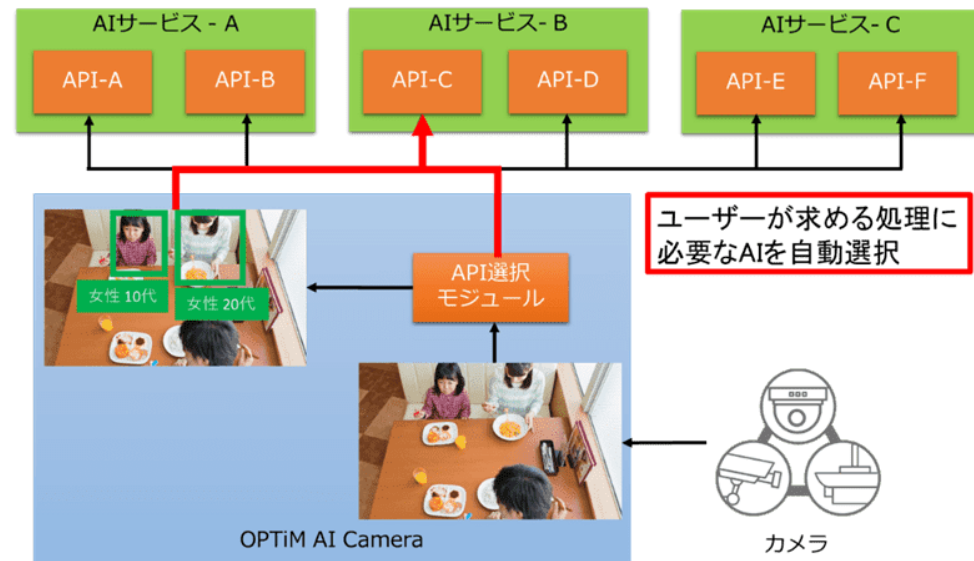
\*Image of patent contents



Patent No. 6404529

\*Image of "OPTiM AI Camera"

Example) Counting by the attributes of visitors (age and sex)





A patent was granted in the United States that allows the user to set the size and location of the display area for text-based instructions.



U.S. Pat. No. 9959083

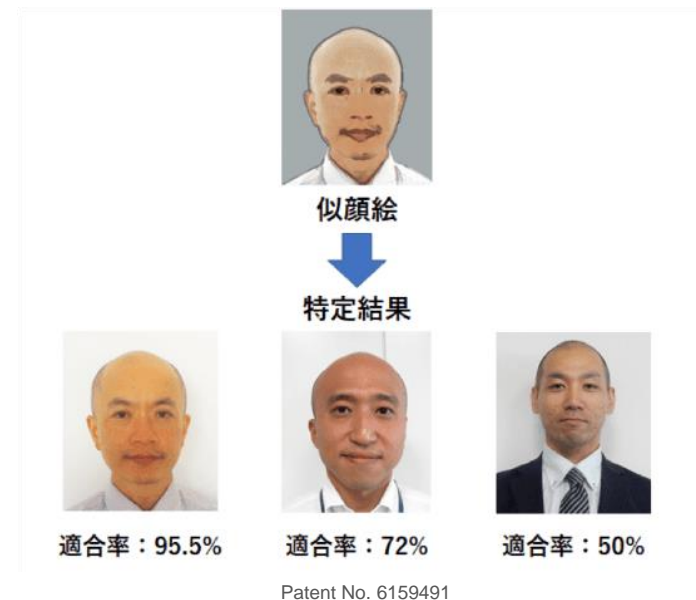
## Patented AI system that analyzes and manages contracts

AI analyzes partners, terms, types of contracts, and keywords.  
Notify users of potential risks and important information

Patent No. 6290459

Acquired a patent to identify people from portraits

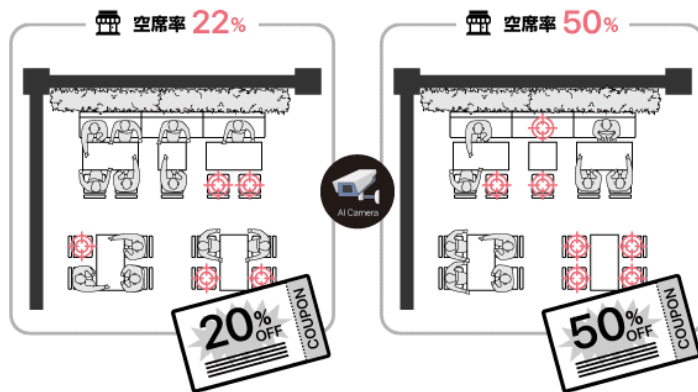
AI is used to analyze facial caricatures.  
Identify a portrait from a database of portraits



## AI analyzes the camera image, Patent Ownership Announced for Offering Discount Coupons Based on Vacancy Rate

The discount rate varies depending on the vacancy rate and the time it takes to come to the store after the coupon is issued.

The service also provides information on the number of vacant seats and sales

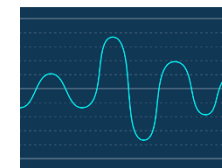


Patent No. 6246446

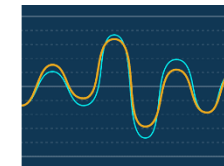
## Announcing Patent Ownership for Secure, Unmanned Retail System

Aiming to expand the CtoC market by  
using the system in unmanned stores

## Announcement of patent for AI machine learning of normal sound of equipment installed in facilities and detecting abnormal sound

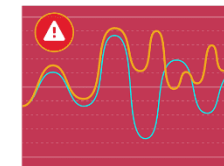


正常音の波形



波形パターンが一致

➡ 正常音と判定



波形パターンが不一致

➡ 異常音と判定

Patent No. 6441550



Patent No. 6483925

## Introduce technologies that support OPTiM "OPTiM TECH BLOG" established

<https://tech-blog.optim.co.jp/>

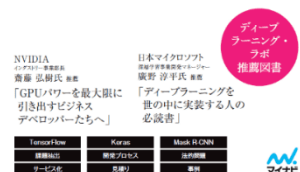


- \*Technologies related to artificial intelligence (machine learning, deep learning)
- \*Cloud Technologies for the IoT Platform
- \*AI technology for smart agriculture, robotics technology including drones
- \*AI diagnostic support and technology related to online medical care
- \*1 million device management technologies from the cloud
- \*Development environment and development process and so on.

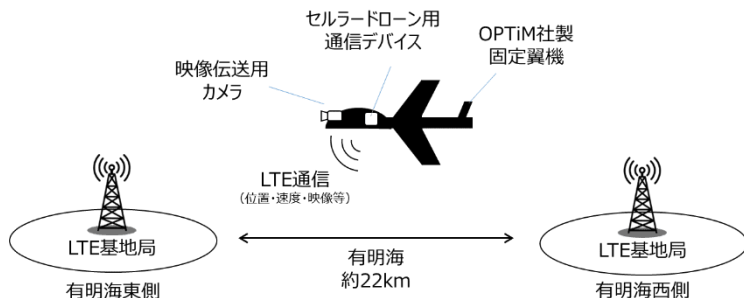
## "AI Project Practical Reading Book for Problem Resolution and Service Implementation" goes on sale.

課題解決とサービス実装のための

**AI** プロジェクト  
株式会社オプティム [監修]  
山本 大祐 [著]  
実践読本 第4次産業革命時代の  
ビジネスと開発の進め方



## Real-time video transmission using a fixed-wing drone and a communications device for a cellular drone successfully achieved a long-distance flight experiment outside of sight.





OPTiM is becoming a leading company in  
the Fourth Industrial Revolution

# OPTiM

[www.optim.co.jp](http://www.optim.co.jp)