

**INTEGRATED REPORT 2023**  
CREATING VALUE FOR PEOPLE



# Aiming to Enrich More People's Lives and Contribute to Their Greater Happiness and Well-Being

Yokohama Rubber established its corporate philosophy in 1992.

It consists of the Basic Philosophy, Management Policies, Action Guidelines and Corporate Slogan.

The Basic Philosophy embodies the types of business where Yokohama Rubber commits itself in all activities.

The Management Policies outline basic administrative principles for upper-level management to commit themselves to.

The Action Guidelines are the code of conduct for each employee to comply with.



## CORPORATE PHILOSOPHY

### BASIC PHILOSOPHY

To enrich people's lives and contribute to their greater happiness and well-being by devoting our wholehearted energies and advanced technology to the creation of beneficial products.

### MANAGEMENT POLICIES

- Take on the challenge of new technologies to produce new value.
- Develop proprietary business fields to expand the scope of business.
- Create a workplace that values, improves and energizes people.
- Deal fairly with society and value harmony with the environment.

### ACTION GUIDELINES

- Develop ourselves so that we may give our personal best.
- Trust, challenge and improve one another.
- Nurture a welcoming, open spirit.

### CORPORATE SLOGAN

Excellence by nature



## Editorial Policy

To give all stakeholders including shareholders and investors a proper understanding of the Yokohama Rubber Group's management strategies and business activities in general, we believe it is important to systematically identify and explain non-financial information such as society, the environment, human resources and corporate governance in addition to financial information such as results, business overviews and management strategy. Based on this approach, we have endeavored to further enhance and integrate non-financial information, and starting last year have consolidated our annual report and CSR report into an integrated report. During the editing process, we have made use of reference sources including the International Integrated Reporting Framework from the IFRS Foundation and the Guidance for Collaborative Value Creation from the Ministry of Economy, Trade and Industry, among other materials, as well as have made every effort to compile the report in a way that places an emphasis on the perspective of stakeholders.

Through this report, we hope to provide even more stakeholders with a deeper understanding of the Yokohama Rubber Group.

- **Reporting scope**

The Yokohama Rubber Co., Ltd. and Consolidated Subsidiaries

- **Reporting period**

January 1, 2022 to December 31, 2022

\* Information includes some activities which were conducted in or after January 2023

- **Month of issue**

October 2023

## Cautionary Note Regarding Forward-Looking Statements

This report contains statements on the Yokohama Rubber Group's projections, targets, plans, strategies and other matters related to the future. These statements are based on determinations made from available information at the time this report was published. Be aware that the actual performance and other metrics may differ from these forward-looking statements due to a variety of factors.

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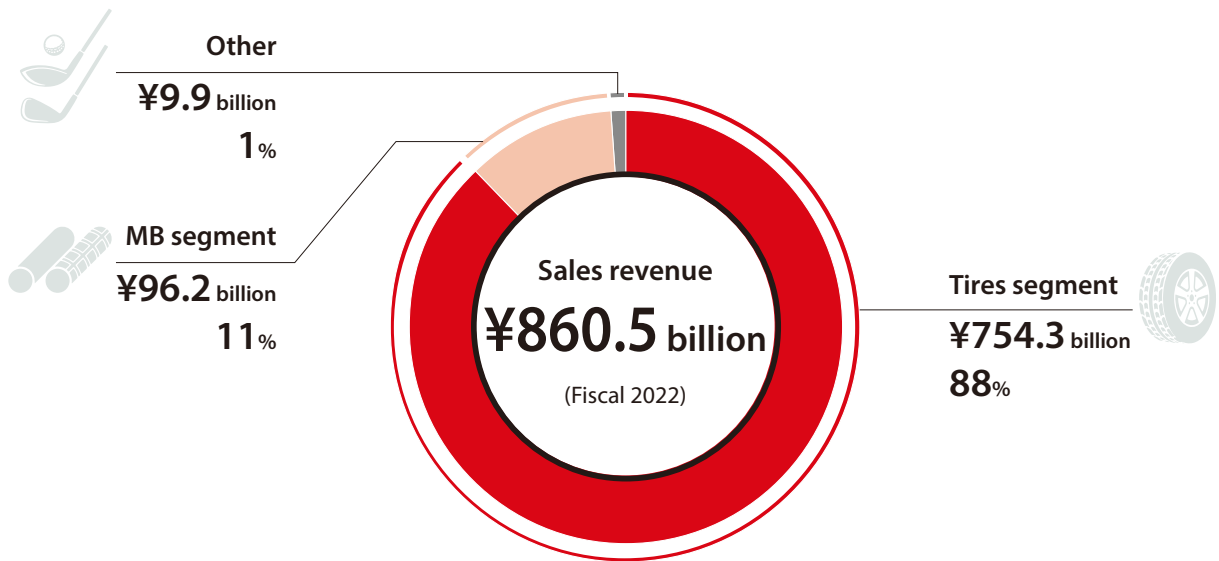
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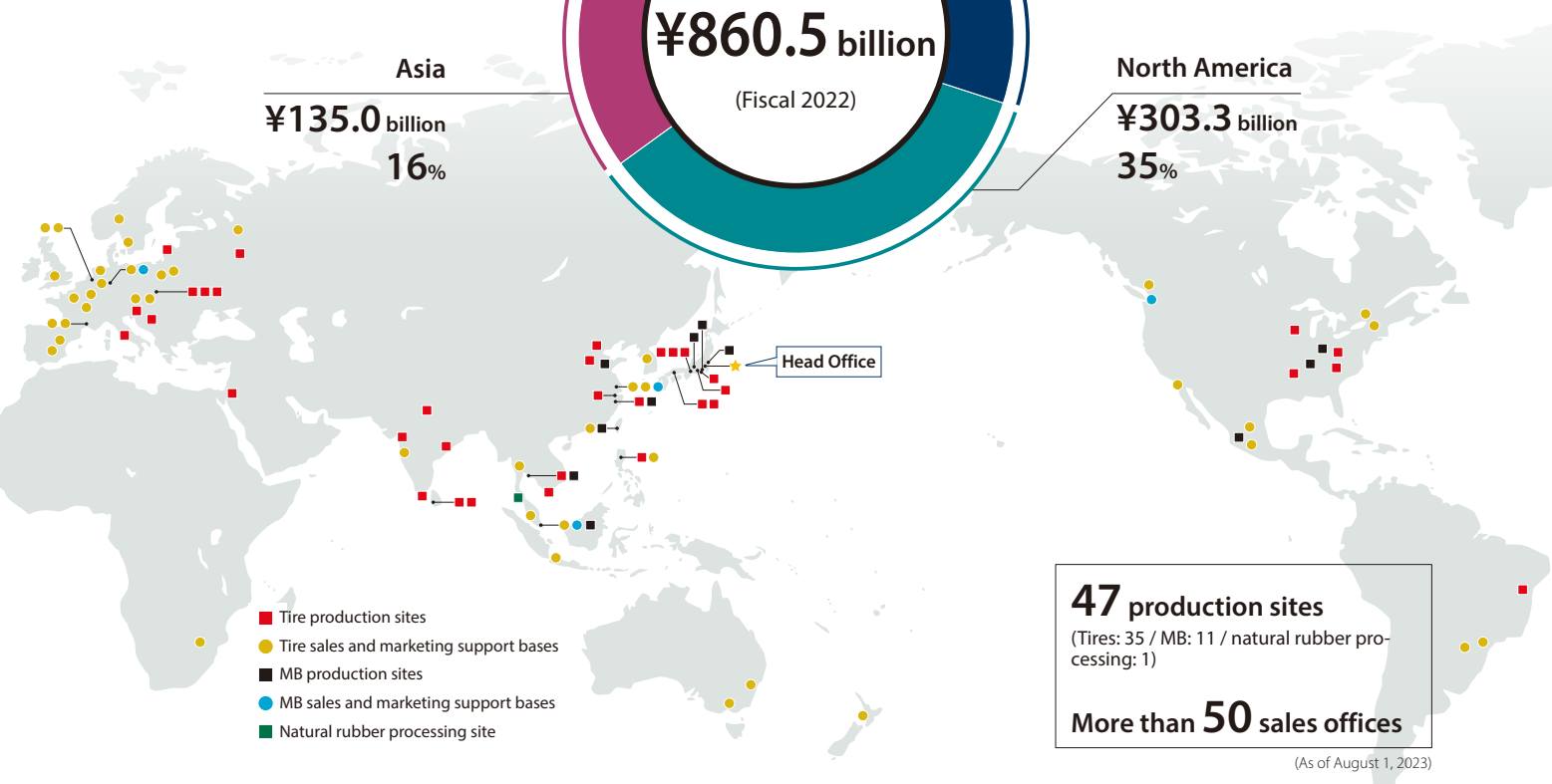
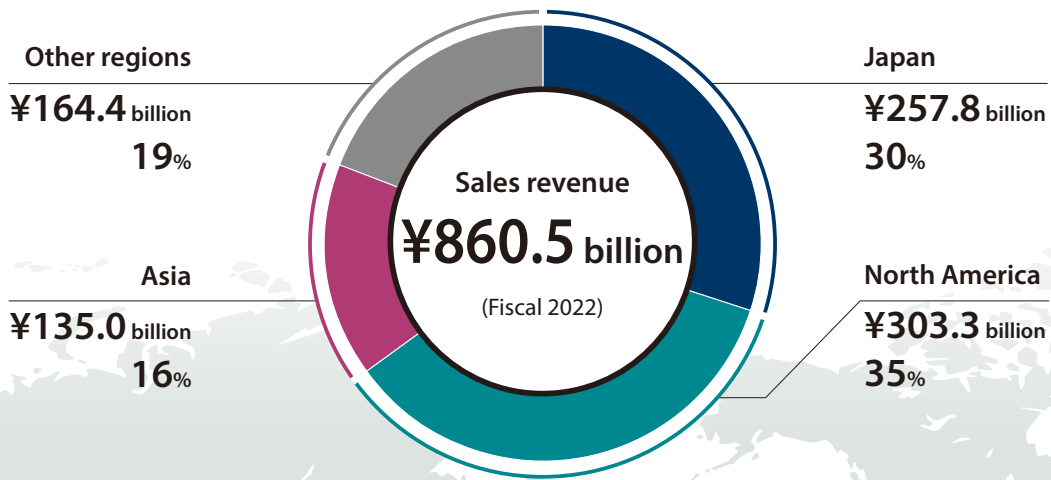
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# At a Glance

## Sales Revenue by Business Segment



## Global Expansion (Sales Revenue by Region)



**47 production sites**  
 (Tires: 35 / MB: 11 / natural rubber processing: 1)

**More than 50 sales offices**

(As of August 1, 2023)

## Tire Business

Yokohama Rubber develops and manufactures high quality tires used in almost every aspect of our world, from tires for passenger cars for everyday use, truck and bus tires supporting people's mobility and logistics, tires for construction and mining vehicles at work on construction sites and in resource development, tires for industrial machinery to tires for agricultural and forestry machinery.

### Consumer Tire Business

In the Consumer Tire Business, we develop, manufacture and sell high value-added tires for passenger cars, meeting diverse needs of drivers.



**ADVAN**  
*Sport V107*



ADVAN, Yokohama Rubber's global flagship tire brand

#### Strengths and competitive advantages

Proprietary technology, quality, product performance, product lineup and global sales network

#### Customers

Car makers and drivers

### Commercial Tire Business

In the Commercial Tire Business, we develop, manufacture and sell tires for trucks, buses, construction, mining and industrial machinery, and agricultural and forestry machinery.



**BluEarth** 711L



BluEarth 711L, low-fuel-consumption and performance-oriented all-season tire for trucks

#### Strengths and competitive advantages

Proprietary technology, quality, durability, product lineup, cost competitiveness, global sales and service network

#### Customers

Vehicle makers (truck and bus, construction, mining and industrial machinery, and agricultural and forestry machinery) and companies

## MB Business

We also carry a broad range of other products including hydraulic hoses for construction vehicles and various machine tools, automotive hoses, conveyor belts, marine products and aerospace products. Yokohama Rubber has played a significant role around the world for many years contributing to the development of a host of industries, including automobiles, petroleum, gas, mining, construction and aviation.



Hydraulic hoses used in construction machinery

#### Strengths and competitive advantages

Proprietary technology, quality, product performance, product lineup and global sales network

#### Customers

Manufacturers (automobiles, construction machinery, machine tools, aircraft, etc.), petroleum, steel and other industries

## Other Business

In other business, we manufacture and sell golf gear under the PRGR (Pro Gear) brand.



RS JUST series for athlete golfers

#### Strengths and competitive advantages

Proprietary technologies, innovative ideas and analyzing hitting data at directly operated stores

#### Customers

Golfers around the world

## Brands Supporting Yokohama Rubber's "Exploitation" and "Exploration"



The OE installation of our tires on new premium cars, including renowned brands such as Porsche, BMW, Mercedes-AMG, and LEXUS, is a testimony of confidence in our world-class quality and technological capabilities.



We are accelerating the expansion of our GEOLANDAR tire brand product lineup for SUVs and pickup trucks to meet increasingly diverse needs in the SUV market.

### Consumer Tires

With the aim of maximizing the sales ratio of high-value-added tires, we are making efforts in three categories: ultra-high-performance tires, tires for SUVs and pickup trucks, and winter tires. We are actively developing products, with a main focus on high-value-added tires for ADVAN, GEOLANDAR, and winter tire lineups.



**ADVAN**

ADVAN is a global flagship tire brand delivering a high level of driving performance by bringing out the full potential of passenger cars.



**GEOLANDAR**

GEOLANDAR is a brand of tires for SUVs based on the concept of "driving freely on all roads and terrain across the planet."



**iceGUARD**

The iceGUARD brand of winter tires offers a wide selection of products, as well as unique compound and design technologies of tread pattern realizing high performance on ice and snow.



**BluEarth**

The BluEarth brand of fuel-efficient tires balances basic performance with enhanced fuel efficiency, wet surface and anti-wear features, making it suitable for a wide range of uses, from city driving to leisure activities.

### MB (Multiple Business)

**Versatran**



This brand of hydraulic hoses for overseas markets was created by integrating three main series of hoses. The performance of the products has been greatly improved, and they are now available for use in mines and other challenging operating environments.

**HAMAHEAT**



One of the most widely recognized conveyor belt brands both in Japan and overseas. These products have a strong reputation for their heat resistance performance, especially in the steel and cement industries.

**Seaflex**



The world's top brand of marine hose, highly valued by major oil companies and other users around the world for its outstanding quality.



Using the latest silica compounding technologies to significantly reduce rolling resistance, these environmentally friendly, economical, and high-performance tires will contribute to the coming new era of logistics.



We provide agricultural machinery tires for a variety of applications on farms in Japan and overseas, contributing to the improvement of overall agricultural productivity.

## Commercial Tires

We provide a wide range of tires, including tires for trucks and buses and off-highway tires for construction and industrial vehicles, and for agricultural and forestry equipment. As one of the world's leading commercial tire specialists, we contribute to improving safety and productivity on the most demanding worksites.

Truck and bus tires (TBR)  
Light truck tires (LTR)

Off-highway tires (OHT)



This brand of tires for trucks and buses provides economic efficiency through superior fuel economy, while at the same time providing excellent basic performance in terms of durability and safety, and realizing environmental friendliness and improved transportation efficiency.

Off-highway tire brands comprise product lineups in all categories, from basic and standard, to premium, providing powerful traction support for vehicles used on agricultural, mining, and construction sites, and in other locations.

## PRGR (Pro Gear) Business



Viewing golf from a scientific perspective, we proposed the industry's first "head speed (H/S) theory," and have created numerous hit products that have been popular with golfers for the past 40 years.



We leverage a variety of innovative technologies to develop products that enable people to experience the fun and joy of golf.

# Pioneering History

Yokohama Rubber's history of over 100 years is also a history of pioneering, leading the times with pride as a manufacturer and strong ambition as a challenger. For the next 100 years, we will continue to contribute to solving social issues through our business activities by carving out unique areas through the creation of new value.

## Strengthening of the Management Base

**1917**

Established.

**1952**

Completed Phase 1 of the Hiratsuka Plant in Kanagawa Prefecture and started production there of belts, large tires, and vinyl products.



**1961**

Completed construction of the new corporate headquarters, the Yokohama Rubber Building.



**1969**

Established Yokohama Tire Corporation, a US tire sales company.

**1974**

Started operations at the Ibaraki Plant. Started production of high-pressure hoses.



**1986**

Built the D-PARC comprehensive tire proving ground in Ibaraki Prefecture.



## Business Transitions

**1954**

Launched the Y-29, Japan's first snow tire.



**1955**

Launched the HAMA SAFETY and HAMA LINER, Japan's first tubeless tires.



**1965**

Launched sales of Unicon Belt, a commodity conveyor belt.

**1967**

Launched sales of G.T. SPECIAL, a radial tire for passenger cars (left photo). Launched sales of the Surge Series of high-pressure hoses (right photo).



**1971**

Launched sales of G.T. SPECIAL STEEL, Japan's first steel radial tubeless tire.



**1978**

Launched sales of ADVAN HF for passenger cars.

**1987**

ADVAN racing tires-equipped car won the Japan Endurance Championship series for the third consecutive year.



## Changes in Society

**1950**

Start of the Korean War.

**1964**

Start of the Tokyo Olympics.

**1973**

Oil crisis.

**1983**

Birth of the Internet.

## Topics

● **1920** Completed Hiranuma Plant (Yokohama City). Developed Japan's first corded tire.



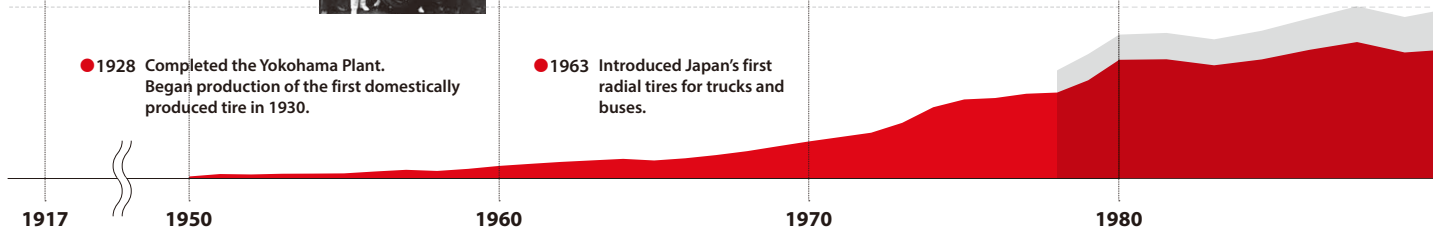
● **1928** Completed the Yokohama Plant. Began production of the first domestically produced tire in 1930.

● **1963** Introduced Japan's first radial tires for trucks and buses.

● **1978** Developed Japan's first sports radial tire, ADVAN HF.



● **1983** Launched sales of PRGR golf equipment. Photo shows a PRGR carbon driver.





**I 1991**

Completed R&D integrated center (RADIC) at the Hiratsuka Factory.



**I 1996**

Established Yokohama Tire Philippines Inc., a tire manufacturing and sales subsidiary.

**I 2006**

We aimed to become a company with top-level contributions to the environment with Environmental GD100 as our guiding principle, and enhanced our CSR management under our long-term management plan GD100.

**I 2009**

Merged with domestic tire sales companies and established Yokohama Tire Japan Co., Ltd.

**I 2016**

Acquired the Alliance Tire Group B.V. (ATG), a Dutch company that manufactures and sells tires for agricultural and construction machinery.

**I 2017**

Our 100th anniversary.



**I 2020**

Selected for inclusion in two ESG stock indexes—the FTSE4Good Index Series for the 16th straight year and the FTSE Blossom Japan Index for the 4th straight year.

**I 2023**

Acquired Trelleborg Wheel Systems Holding AB, a Swedish company that manufactures and sells tires for agricultural and industrial machinery.

**I 1990**

Launched sales of SY101, a studless tire for trucks and buses.



**I 1994**

Developed components for H-II rocket engines.

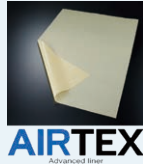


**I 2000**

Launched sales of DNA dB, a fuel-efficient tire for passenger cars.

**I 2009**

Developed AIRTEX Advanced liner, enabling lighter weight tires.



**I 2011**

Electric car equipped with BluEarth tires won the Pike's Peak Hill Climb in the U.S. in record time.



**I 2020**

Launched sales of BluEarth-4S AW21, an all-season tire for passenger cars.



**I 2020**

903W ultrawide-base studless tire for trucks selected for inclusion in Japan's Good Design Best 100.

**1992**

Collapse of the economic bubble.

**1997**

Adoption of the Kyoto Protocol.

**2008**

Lehman Brothers collapse.

**2011**

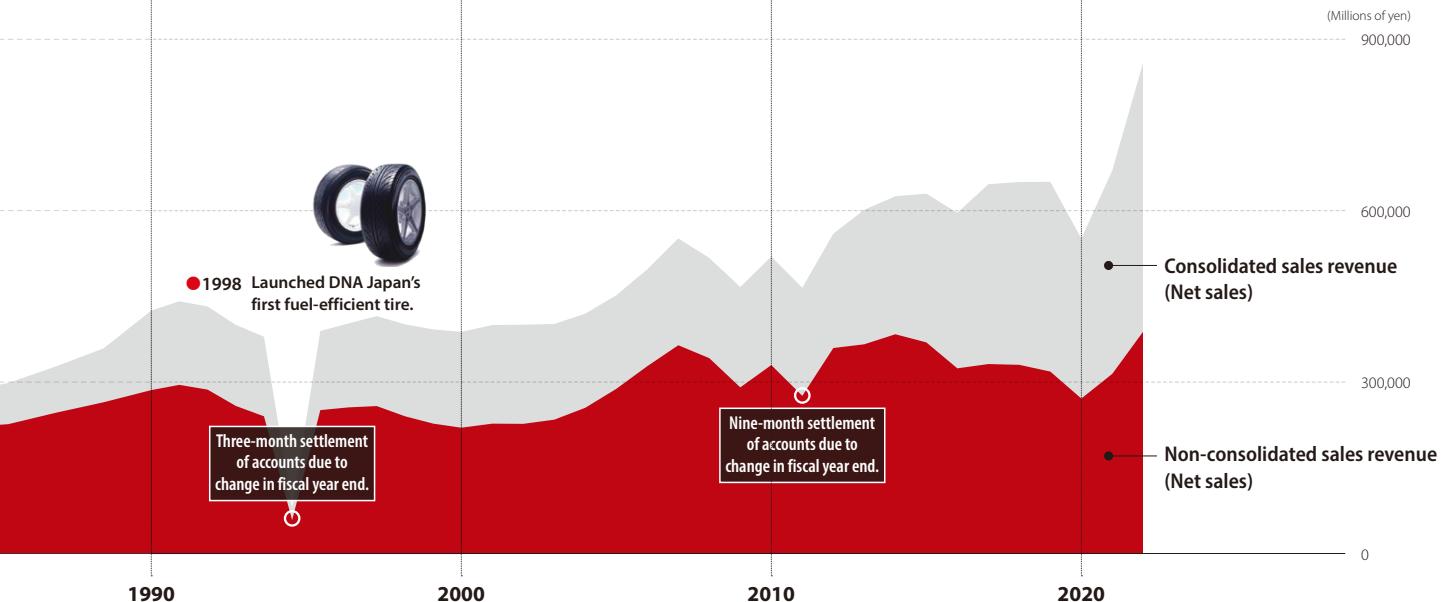
Great East Japan Earthquake.

**2015**

SDGs adopted.

**2020**

Outbreak of COVID-19.



Special Feature

# Helping transform the mobility industry by strengthening our presence in the OHT business

The off-highway tire (OHT) market is expected to grow in the future amid increased food production and the growth of logistics driven by economic development in global markets. In May 2023, the Yokohama Rubber Group acquired all shares of Trelleborg Wheel Systems Holding AB (TWS), turning it into a wholly owned subsidiary, with the aim of expanding earnings in the OHT business, which is expected to generate consistently high profits. Yokohama will make full use of TWS's advanced technological capabilities in the OHT market to tap into greater growth.

## Current market situation for commercial tires and our challenges

Considering the global tire market, the ratio of consumer tires to commercial tires is around 1:1, within a market scale of around ¥20 trillion. As CASE, MaaS, and DX become more widespread in the future, the number of privately owned cars is expected to decrease, while the number of infrastructure vehicles that support the movement of people and goods is expected to increase. The Yokohama Rubber Group has positioned the OHT business, which offers consistently high profits among commercial tires, as a growth driver and is focusing on business expansion.

The global OHT market was valued at \$30 billion in 2022 and is expected to grow at a compound annual growth rate (CAGR) of 6% from 2023 to 2027, reaching \$40 billion by 2027. This is due to continuous and stable growth in North America, the largest market, as


well as the growing need for residential construction due to the rapid population growth and migration to large cities in the Asia-Pacific region, as well as the expected growth of agricultural and mining industries worldwide.

With the acquisition of Trelleborg Wheel Systems Holding AB (TWS), the Yokohama Rubber Group aims to achieve sustainable growth by seizing growth opportunities and solving social issues, while optimizing its sales ratio of consumer tires and commercial tires from 2:1 currently to 1:1, in line with the global market.

## TWS: Leading manufacturer of tires for agricultural machinery and industrial vehicles

TWS, headquartered in Tivoli, Italy, is a leading manufacturer of tires

### After TWS joins: OHT product portfolio

		 Agriculture	 Construction	 Earthmover and Mining	 Forestry	 Lawn Garden & Turf	 Material Handling	 Truck (off highway)	 Two wheelers	 Rims
Tier 1			✓	✓			✓	✓		
										
		✓	✓	✓	✓	✓	✓	✓		
After TWS joins: OHT product portfolio										
Tier 1		✓	✓	✓	✓	✓	✓	✓		✓
										
										
Tier 2		✓	✓	✓	✓	✓	✓		✓	
										
Tier 3		✓	✓	✓	✓	✓	✓	✓		
										



for agricultural and industrial machinery with a history spanning more than 110 years, as it began producing tires in 1909. Approximately 60% of its products are for agricultural machinery, about 20% for industrial vehicles, and the rest for construction vehicles and motorcycles. TWS boasts world-class product strengths, brand power, technical prowess, and service capabilities in agricultural machinery and industrial vehicles. In fiscal 2022, the company's net sales totaled 13,277 million Swedish kronor (approximately ¥172.5 billion), and over the past decade, its net sales and EBIT have more than tripled.

## Strengthening the Yokohama Rubber Group's ability to help transform the mobility industry through the acquisition of TWS

### Expanding product portfolio

The acquisition of TWS renders the brand lineup of tires for agricultural machinery and construction vehicles complete in all categories, from basic to standard and premium. This enables the Yokohama Rubber Group to better respond to sales channels and increase its resilience to economic fluctuations.

### Global network covering major markets

TWS has 14 production bases in nine countries: in Europe in Italy, the Czech Republic (3 bases), Latvia, Serbia, Slovenia; in North America in the United States (2 bases); in South America (Brazil); in Asia (China (2 bases), and Sri Lanka (2 bases)), with Europe accounting for about 60% of the company's sales. By adding TWS's strengths in Europe to the Group's strengths in Japan, North America and Asia, the Yokohama Rubber Group will be able to build a global network that covers major markets, and anticipates greater growth.

In terms of services, Yokohama Rubber will expand TWS's proprietary tire maintenance services for industrial vehicle tires currently offered at 83 bases in 21 countries around the world to include tires for agricultural machinery and construction vehicles.

### Use of DX

TWS is developing remote monitoring systems for air pressure and tire temperature, similarly to Yokohama Rubber. Its Adaptive Tire Management System (ATMS) improves agricultural productivity by detecting working conditions such as load, pressure, and temperature in real time and constantly suggesting the optimal tractor vehicle settings. Its Tire Pressure Management System (TPMS) developed for construction and port vehicles constantly monitors air pressure and temperature to improve operational efficiency and ensure operator safety. The combination of TWS's and Yokohama Rubber's DX knowledge will promote the provision of more convenient and efficient services.



ATMS: Real-time tire data for ultimate tractor performance



TPMS: Digital tool for construction/port vehicles

## Future issues and responses

Going forward, the Yokohama Rubber Group will need to maximize synergies from the TWS acquisition, and it is now implementing a PMI program toward this end. Specifically, utilizing the bases of both companies, the Group will work to further grow the OHT business by combining its strengths with TWS's in all areas, such as building optimal production, sales, service, and quality assurance systems that meet the needs of each region, combining our R&D knowledge to create new tire products and services, and strengthening sustainability initiatives such as utilizing sustainable materials.