

Value Creation Process

The Toyo Tire Group believes in the importance of organizing and disclosing our corporate philosophy, business model, governance, and business risks and opportunities to help promote a clearer understanding of the type of company we want to be in the future. As part of our value creation process, we have verbalized our six capitals, and defined the outputs generated through the utilization of these capitals and the outcomes that might impact stakeholders.

Our Mission

To create excitement and surprise with our products that exceed customer expectations and enriches society.

Inputs (FY2023)

Financial capital

- Total assets: **645,480**M yen

Manufactured capital

Production processes that respond flexibly to changing market needs and demand and supply conditions

- Capital expenditure: **34,102**M yen
- Number of production sites: **14** (Japan: 5, International: 9)

Intellectual capital

A technological base that encourages differentiation through a combination of basic performance and design features

- R&D expenditure: **12,729**M yen
- A highly efficient and accurate tire development platform

Human capital

Diverse human resources that can generate high added value

- Number of consolidated employees: **11,267** (In Japan 5,606; Outside Japan 5,661)

Social and relationship capital

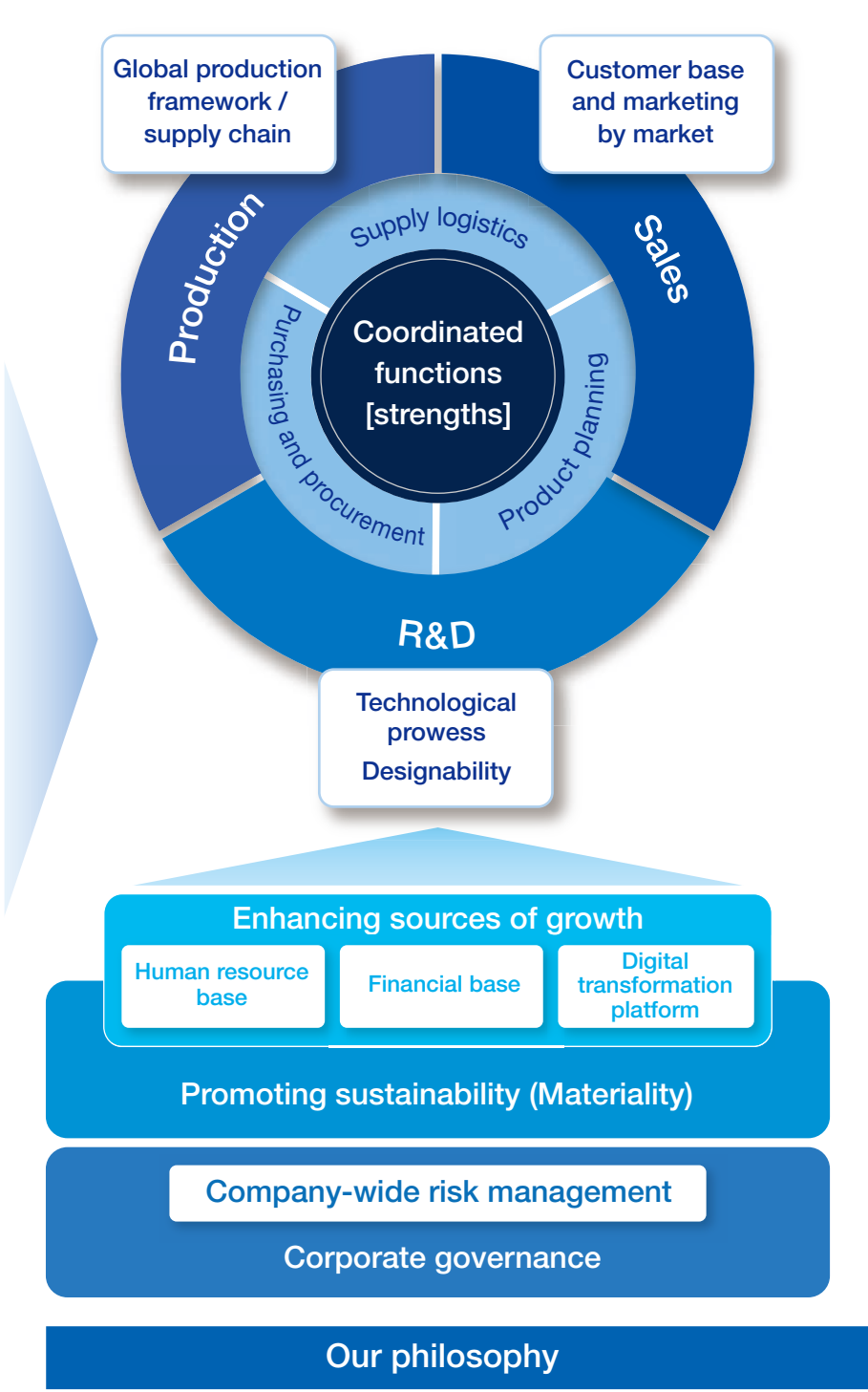
Partnerships for value creation

- Consolidated subsidiaries: **37** firms in **14** countries
- Firm customer base (distributors)
- Universities and other external research organizations

Natural capital

- Total energy consumption: 7,686.9 thousand GJ
- Total volume of raw materials: 549.0 thousand t
- Total water discharges: 3,247.6 thousand kl

Business processes



Outputs

Medium-Term '21 Plan Financial indicators	<ul style="list-style-type: none">• Consolidated operating income: 60.0B yen / Consolidated operating income margin: 14% or higher• Percentage of sales from priority products: over 55%
Medium- to long-term materiality indicators	Unique products and services <ul style="list-style-type: none">• Differentiated SUV and CUV products that combine environmental performance and sophistication• Innovation to address the shift to electric SUVs and pickup vehicles• Customer endorsement Rank 5th on sales share in North America (Medium-Term '21 Plan challenge)
	Human talent <ul style="list-style-type: none">• Introduction and revision of flexible human resources systems that adapt to the times• Creating diverse learning opportunities• Actions to improve engagement
	R&D <ul style="list-style-type: none">• Ratio of sustainable raw materials used in products 2030: 40%
	Decarboni-zation <ul style="list-style-type: none">• Scope 1, 2 emissions 2030: 46% reduction vs. 2019 levels, 2050: carbon neutral• Scope 3 emissions 2030: 20% per tire vs. 2019 levels
	Supply chain <ul style="list-style-type: none">• Expanded number of sustainable suppliers 2025: 100% implementation of risk assessments for primary suppliers
	Quality <ul style="list-style-type: none">• Established process assurance system• Traceable individual management to end of market• Improved user safety awareness

Outcomes

- ROE over Medium-Term '21 Plan: **12%** or higher
- Shareholder returns: Maintain a dividend payout ratio of **30%** or higher

A society of sustainable mobility

The enjoyment of mobility for all

Mobility with reduced impact on the environment

Contribution to a carbon-neutral society by consider the whole life cycle of products when planning and developing them

► Story 1 (See P.36)

The ultimate enjoyment, excitement, and surprise of driving

Satisfied with the quality of life that mobility brings, the ultimate joy of connecting society through mobility

► Story 2 (See P.38)

Safety, peace of mind, and comfort

Inbuilt safety performance that adapts to social and mobility changes

► Story 3 (See P.40)

Our Strengths

During the Medium-Term '21 Plan, we have been working to bolster our ability to promptly and flexibly respond to changes through global collaboration.

ProductionOptimal global production and supply system

We are promoting local production for local consumption in markets where our production bases are located, while working to optimize the product mix and level production at each of our plants in order to increase our flexibility to respond to diversifying customer needs and changes in supply and demand. These efforts enable us to deliver products to our customers in a timely manner. For example, large-diameter tires for SUVs and pickup trucks, an area in which we excel, enjoy tremendous support in the North American market. In order to meet such demand, we are gradually increasing the production capacity at our U.S. plant and we have also updated facilities at our Japanese plants and set aside capacity at our Serbia Factory, which opened in 2022, to fulfill supplies to North America.

Our strength also lies in the talent that enables us to respond flexibly to production. We are fostering talent based on the characteristics of each plant and the local conditions. At the same time, the size of the working population in Japan is declining and we need to ensure skill and know-how succession, an issue we are addressing by leveling operations and eliminating dependency on individual efforts or skills in coordination with enterprise resource planning (ERP) and through the introduction of new production systems. These initiatives are undertaken in line with our company-wide efforts toward data-driven management. We believe that leveling operations will also lead to greater diversity at production bases.



Masami Miyamori
Corporate Officer and Vice President of Production Headquarters

R&DProprietary technology and tripolar R&D collaboration between Japan, the U.S. and Europe

The automotive industry is currently undergoing major transformations and tire development is also expected to quickly provide quantitative performance and functions to support the evolution of mobility. We are developing high-performance, high-quality products by linking our Nano Balance Technology, a proprietary platform technology for rubber materials, and T-MODE, a tire design platform technology, and we are constantly updating such proprietary technology. Our R&D functions in Japan, the U.S. and Europe each play a different role in our research and we are combining their results and collaborating with sales and production departments to develop highly functional and differentiated products that meet the needs of each market.

The use of artificial intelligence (AI) is becoming indispensable in the development of technology, such as T-MODE. We believe that it is essential for engineers to be able to explain the principles behind their designs and provide evidence to support their convictions, without over-relying on AI. We are working to train and improve the skills of our engineers so that they can use AI to expand their cognitive skills and capacity.



Satoru Moriya
Corporate Officer and Vice President of R&D Headquarters

Material design technology (Nano Balance Technology)

We strive to develop the ideal rubber material by predicting, creating functions, precisely controlling, and observing and discovering the properties of the various materials used in tire rubber at the nano-level (1 nano = one billionth of a meter).

Simulation technology (T-MODE)

We incorporate design support technology that uses AI into our tire and driving simulations to simulate aerodynamics and snow traction and accurately analyze tire patterns behavior in detail.

Design support technology (T-MODE)

We centrally manage various data as common assets, and add value by correlating data, and we use machine learning to enable the acquisition of tire characteristic values in real time.

Japan-R&D

- All R&D functions
- Development of high-performance technologies (research, development, evaluation, utilization of big data and AI)

Responsible for all R&D functions and updates various platform technologies.

NA-R&D

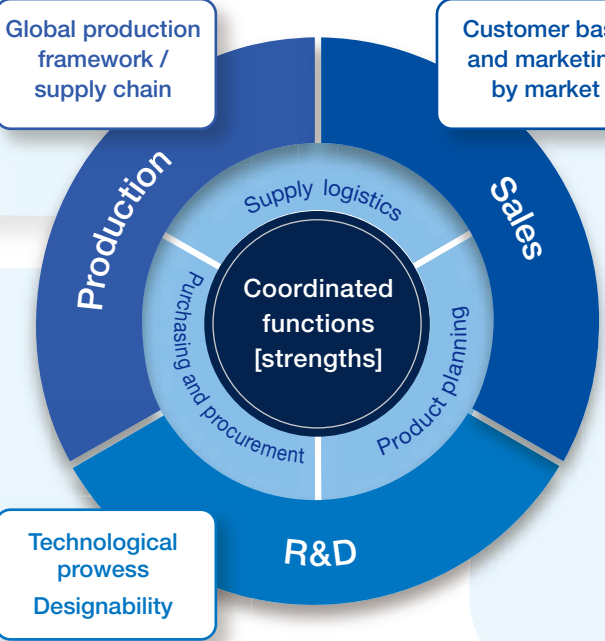
- Marketing
- Development of customer-oriented products

Cooperates with the marketing department in North America, our core market, to develop customer-oriented products that respond to preferences

Europe-R&D

- Advanced materials / next-generation mobility survey
- Development of high-performance technologies

Focuses on surveys and research for the utilization of cutting-edge materials to facilitate the development of next-generation mobility technologies such as EVs.



SalesStrong customer base built on advantages gained by not operating dealerships

The Toyo Tire Group does not operate any directly managed dealerships in order to sell our tires, making dealers our closest customers. We believe it is important not only to understand the actual need for the products that dealers want to deliver to consumers, but also to elicit and respond to the latent needs of dealers in terms of what kind of value-added proposals and services they expect from us. Our strength lies in our ability to accurately link our customers' needs, which vary widely from market to market, with what we can offer, and in our ability to collaborate between small and agile functional organizations, and quickly adapt to information that comes directly from the market. Our North America business strategy has become an iconic business model for the Group's tire business.

Our sales function is thoroughly aware of the need to correctly understand Toyo Tire's position within the industry as well as our strengths and weaknesses in order to implement product and channel strategies.



Tatsuo Mitsuhashi
Corporate Officer and Vice President of Sales Headquarters

Product planningProduct planning to achieve the enjoyment of mobility for all

Product planning is one of the functions that plays a role in guiding company-wide value creation. Product planning takes the lead in discussions that overlap between production, sales, and R&D, and takes on issues requiring collaboration, that tend to be overlooked due to the specialized and independent nature of each function.

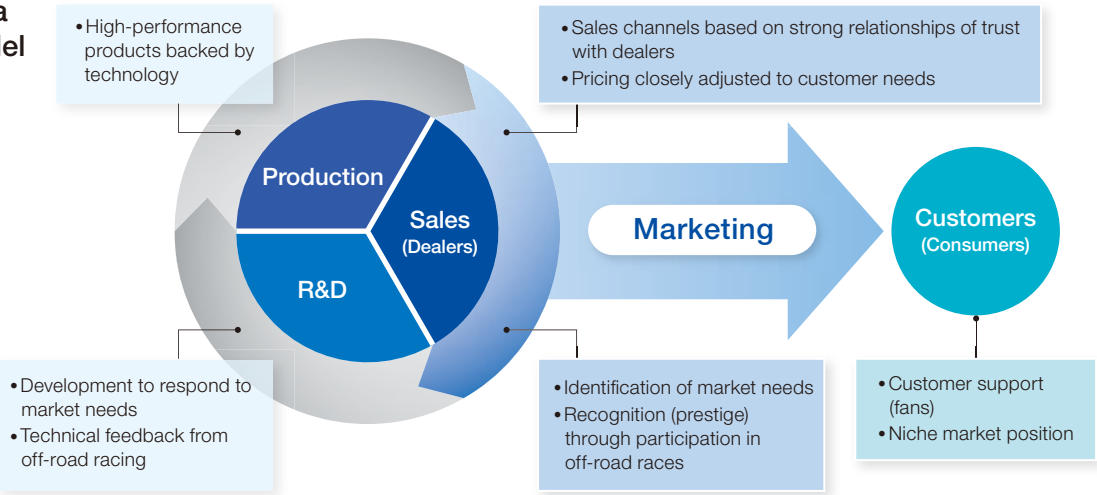
Rather than simply focusing on changes in mobility, market trends and interests, we strive to create and realize plans to make mobility more fun and interesting while ensuring the basic performance required of tires. This product planning stance has resulted in our unique, differentiated products. In particular, our strength lies in our ability to communicate with sales companies across the world on a daily basis. Such communication enables us to identify future trends and come up with product ideas, which we combine with the basic technology that our R&D function updates in anticipation of trends in the automotive industry and the level of performance and functionality required of tires, to create actual products.

We believe that products created bearing in mind the various situations in which customers use tires can be sold not just as consumable items, but as luxury items that help achieve the enjoyment of mobility for all.



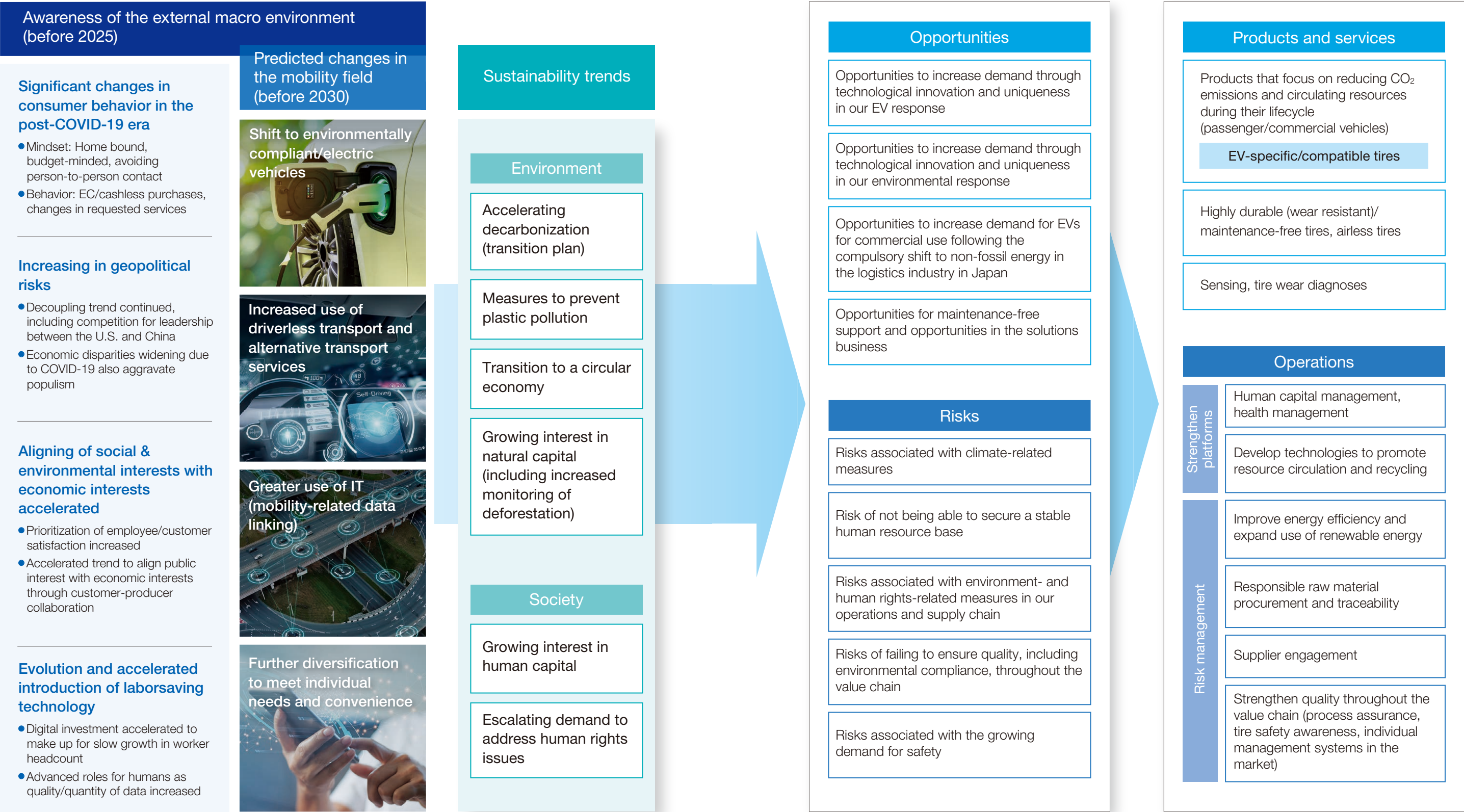
Kiyohito Hasumi
Corporate Officer and Vice President of Business Headquarters

North America business model



External Environment and Risks & Opportunities

We are aware of the risks and opportunities posed by the external macro environment in which the Medium-Term '21 Plan was formulated and is being implemented, as well as the changes in the mobility field that are expected to occur by around 2030. We will work to create value along the entire value chain through our operations, products and services based on this awareness.



Toyo Tire Materiality

We have established our Group material issues, which were decided upon by the Sustainability Committee in June 2021 and then approved by the Executive Committee in July. Along with strategically investing our internal resources into initiatives related to the material issues, we also use this opportunity to foster a corporate culture where each employee addresses sustainability issues by connecting materiality to their own duties, as well as strengthen materiality-focused stakeholder engagement.

Process of identifying material issues

Following the statement in our Medium-Term '21 Plan that we are going to integrate sustainability into corporate management, we established a steering committee comprising the president and the vice presidents of each headquarters to start developing sustainability-related policies and identifying material issues. The work was transferred to the Sustainability Committee in April 2021, with further discussions taking place over four months. In the meantime, a total of 40 division general managers and general managers, who would be at the heart of the teams handling the task of driving and promoting sustainability, also had their own discussions on the same themes, and the outcome of their discussions was fed back to the Committee's discussions.



Material issues

Domain I Value creation

Unique value provided to customers and society through our products and services

1 Help create a society of sustainable mobility

We will contribute to a society of mobility that achieves net-zero environmental impact and zero accidents while providing efficient transportation by offering unique products and services.

2 Support the enjoyment of mobility for all

We see it important to offer creative added value that supports the diversity of sustainable mobility by meeting the varied expectations people have for their own mobility through our unique products and services.

- Key achievements of fiscal 2023:
- Product development based on plan to upgrade fuel efficiency at each model change
 - Development of differentiated products based on strategy of unique approach to EVs
 - Development of truck and bus tires that address environmental and social issues in logistics industry

Domain II Foundation for value creation

The base for value creation

3 Support diverse talent with motivating challenges and job satisfaction

We will secure a foundation for diverse talent who support our company's business management and create high added value in these rapidly changing and uncertain economic and social times.

4 Continue innovating next-generation mobility technology

We believe it is vital to engage in technological innovation that supports the evolution in mobility being demanded in this new era and make continuous advancements that meet the needs of society.

- Key achievements of fiscal 2023:
- Second employee opinion survey and action to improve organizational culture
 - Training to empower women and unconscious bias training to promote diversity and inclusion
 - Percentage of sustainable raw materials used in products: 26% (by weight in products produced at the end of 2023)
 - Industry-academia collaboration (joint research) in and outside Japan on sustainable raw materials

Domain III Risk management

Responsible business practices that protect the means of value creation

5 Pursue decarbonization in all corporate activities

We aim to reduce our environmental impact through our products and services and decarbonize our entire manufacturing process and supply chain while leveraging these measures to increase our cost competitiveness.

6 Promote supply chain sustainability

We understand that the sustainability of the Company's operations, as well as the genuine enjoyment of mobility we endeavor to provide, depend on a healthy supply chain. We are therefore committed to addressing environmental and social issues in the supply chain.

7 Ensure the fundamentals of manufacturing: quality and safety

Quality and safety are fundamental to any product or service. The value our products and services offer will mean little to society if their quality or safety is in doubt, as the lessons from our past have taught us. Quality and safety are therefore our top priority in all of our operations.

- Key achievements of fiscal 2023:
- CO₂ emissions reduction achieved (against 2019): Scope 1, 2: 35.6%, Scope 3: 1.5%
 - Percentage of electricity from renewable sources used at production sites: 71.1%
 - Trial of internal carbon pricing (ICP) program (for investment decision-making)
*Officially introduced in January 2024
 - Human rights risk assessment carried out across value chain.
 - Percentage of suppliers assessed for environmental and social risks: 70% of total transaction amount of raw materials for tires
*100% of primary suppliers of natural rubber