

Our New Management Plan: Grand Design 100

As noted elsewhere, our new management plan for the 12 years to fiscal 2018 calls for increasing net sales to ¥1 trillion by that year. Our principal goals in the initial three-year segment of the plan, which focuses on profitable growth, are to increase net sales 24% over fiscal 2006, to ¥560.0 billion by fiscal 2009, and to increase operating income 60%, to ¥35.0 billion.

Vision

Evoke a distinctive global identity in building corporate value and in building a strong market presence.

LONG-TERM FINANCIAL TARGETS (YEAR TO MARCH 31, 2018)

Net sales¥1 trillionOperating income¥100 billionOperating margin10%

BASIC POLICY FOR FULFILLING VISION

- Deliver the best products at competitive prices and on time.
- Assert world-class strengths in technologies for protecting the environment.
- Foster a customer-oriented corporate culture that honors rigorous standards of corporate ethics.

Fiscal 2009 Targets

	BILLIONS OF YEN, PERCENT, TIMES		
	Fiscal 2006 result	Fiscal 2009 target	Percent increase
Net sales	¥451.9	¥560	23.9%
Tires	¥335.7	¥433	29.0%
Multiple Business	¥116.2	¥127	9.3%
Operating income	¥ 21.9	¥ 35	59.8%
Tires	¥ 18.1	¥ 28	54.7%
Multiple Business	¥ 3.9	¥ 7	79.5%

	Fiscal 2006 result	Fiscal 2009 target
Operating income on assets	4.7 %	More than 6.0%
Interest-bearing debt	¥163.0	Less than ¥180
Capital turnover	0.97	More than 1
Interest-bearing debt to Shareholders'equity	0.96	Less than 1



ADVAN tires. Yokohama's ADVAN brand is an increasingly prominent presence in the original equipment market. That includes a growing range of fitments on high-performance cars and on airliners.

PHASE ONE STRATEGY

TIRE GROUP

Strengthening our position in high-value-added products and building a strong global brand

We will work to expand our business in high-value-added tire products, largely by building global momentum for our premium brand, ADVAN. Our efforts will include working to secure new original equipment fitments for ADVAN tires on high-visibility, high-performance vehicle models, as well as promoting ADVAN tires in the replacement market. Expanded activity in motorsports will highlight the technological excellence of the ADVAN brand.

We will support sales growth in high-performance tires by developing new materials and by creating and deploying technology for high-quality, high-precision manufacturing. Raising efficiency in manufacturing is another emphasis. We will adopt integrated product specifications that we can accommodate at tire plants worldwide.

In support of our planned sales growth, we will expand our production capacity, mainly in Asian nations besides Japan. Our target is to increase our annual production capacity by 11 million tires, to 57 million, by fiscal 2009. We will deploy compact, integrated production platforms that will be flexible and cost-competitive in accommodating a broad range of tire specifications in small volumes.

Growing Global Demand for Tires

Unit volume poised to continue expanding

The world market for tires shows every sign of continuing to grow for the foreseeable future. J.D. Power-LMC Automotive Forecasting Services projects that vehicle ownership worldwide will increase 8.7% over the three years to 2008, to 958 million vehicles. It projects that annual demand for tires will increase 11.6% over the same time span, to 1.5 billion units. The prominent market research firm predicts especially strong growth in Asia. It projects that Asian demand for tires will increase 21.7% over the three years, to 416 million tires in 2008.

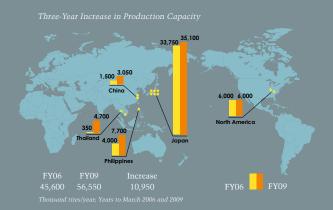
Tire Sales in Asia



Increasing Production Capacity in Southeast Asia and China 2.6-fold by Fiscal 2009

We are expanding our tire production capacity in Southeast Asia and in China to serve growing local demand and to serve export markets. Our plans call for increasing our aggregate production capacity in those regions to 15.45 million tires in fiscal 2009, from 5.85 million in fiscal 2006.

Yokohama Tire Manufacturing (Thailand) began producing truck and bus tires in April 2005, and it will begin producing passenger car and light truck tires in November 2006. In China, Suzhou Yokohama Tire will begin producing truck and bus tires in October 2007. We expect to expand the production capacity of both of those plants in step with trends in demand. Projects for expanding the production capacity of existing plants are under way at Yokohama Tire Philippines and in China at Hangzhou Yokohama Tire.





Yokohama Tire Manufacturing (Thailand). This and other production subsidiaries in Southeast Asia and China are the focus of Yokohama's moves to increase production capacity in tires.

MULTIPLE BUSINESS GROUP

Allocating resources strategically

In diversified business, we have identified eight product categories for allocating assets on a priority basis: hydraulic hoses, automotive hoses, construction sealants, automotive sealants, conveyor belts, civil engineering materials, civil aviation aircraft products, and self-defense aircraft and ship products. Along with concentrating resources on those sectors, we will work aggressively to raise profitability. Our efforts will include working in Asian nations besides Japan to expand sales of products that have strong market positions in Japan. Those products include hydraulic hoses, automotive hoses, automotive sealants, and conveyor belts.

We will also work to strengthen our position in sports business. A technology newly developed at Yokohama provides unprecedented precision in analyzing golfers' swings and in identifying optimal clubs for different kinds of swings. That technology will help differentiate our club products advantageously and raise profitability in global products.

To set the stage for long-range growth, we will launch products in promising new sectors.

Those sectors include electrical, electronic, and optical materials and alternative energies.

TECHNOLOGY STRATEGY

Asserting core technological strengths to create new materials and new technologies

Our core technological strengths are in chemical synthesis and modification and in rubber and origomer compounding. We will work to develop new kinds of natural materials, nanomaterials, modified polymers, electrically conductive polymers, and other new materials. We will also undertake development work on nanocontrol and precision processing. Along with deploying these kinds of new materials and new technologies in established products in the Tire Group and in the Multiple Business Group, we will use them in working to develop completely new business in information technologies, in electrical and electronic materials, and in other promising sectors.

ENVIRONMENTAL MANAGEMENT

Asserting world-class strengths

We will strive to assert world-class strengths in technologies for protecting the environment. One, we will adopt consistent environmental management at our operations worldwide. Two, we will adopt environmental technologies in all of our products. And three, we will work to recycle waste completely at our operations everywhere.

In products, we will launch showcase environmental tires. As part of our efforts to reuse and otherwise recycle all waste at our plants everywhere, we will install cogeneration systems. We will undertake thoroughgoing measures to reduce our output of carbon dioxide, including initiatives for reducing paper consumption.

FERTILE RESEARCH AND DEVELOPMENT

Improving the performance of truck and bus tires with a new mixing process

A low-temperature, high-torque mixing process developed at Yokohama raises efficiency and quality in producing rubber compound for tires. The method of mixing rubber with carbon black and other raw materials affects the characteristics of the resultant rubber compound and thus affects the durability and wear resistance of tires. Durability and wear resistance are overriding considerations in truck and bus tires, and our new mixing technology is especially promising in that product category.

Our new technology is notable for permitting mixing at low temperatures. Traditional mixing takes place at high temperatures in fixed-speed mixers, but heat can cause the deterioration of rubber quality. We employ a variable-speed mixer in our new process. Our mixer helps prevent the temperature of the rubber from rising and therefore helps maintain the integrity of the compound. The molecular weight is even throughout the compound, and the polymer chains are extremely long. The dispersion of the carbon chains is also even.

ENVIRONMENTAL PROTECTION

Eliminating landfill waste one year ahead of schedule

All eight of our tire plants and diversified products plants in Japan stopped outputting waste for landfill disposal by the end of March 2006. We accomplished that goal one year ahead of schedule.

By March 2005, less than 1% of the solid waste generated in our production processes went into landfill. The small amount of material that had proved stubbornly difficult to recycle and that still required landfill disposal consisted of sulfur, sulfur-contaminated sludge, and tale-containing rubber scrap. Employing improved technology for separating the different substances enabled us to recycle all our plant waste and to eliminate landfill disposal completely.

CASE STUDY: COGENERATION

New system at Mie Plant to reduce output of carbon dioxide by more than one-fifth

We aim to reduce our output of carbon dioxide and other greenhouse gases at least 12% from the 1990 level by 2010. Tire manufacturing consumes a great deal of energy, especially in generating steam for the curing process. Our measures for reducing the output of carbon dioxide thus center on raising energy efficiency at our tire plants.

Cogeneration, which supplies electric power and steam, is ideally suited to tire manufacturing. We started up a cogeneration system in January 2006 at our Mie Plant, in Japan. The system comprises two generating units and has an aggregate generating capacity of 14,460 kilowatts. It converts the energy potential of its fuel into electricity at the extremely high rate of 33%. We expect the system to reduce the plant's output of carbon dioxide 22%. The Mie Plant is the third of our six tire plants in Japan where we have installed a cogeneration system.



In truck and bus tires, our new mixing process results in an improvement of 10% to 15% in resistance to chipping and an improvement of 5% to 10% in resistance to wear. The new technology also reduces lead time greatly—some 90%—in mixing and therefore shrinks inventories of work in process. Heat builds up rapidly in traditional mixing and requires repeated interruption of the mixing process to let the compound cool. Our low-temperature mixing allows for conducting the mixing swiftly in a single, uninterrupted process.

RUBBER STRUCTURE MODEL TRADITIONAL MIXING New Low-Temperature, HIGH-TORQUE MIXING Soft, less-stretchable rubber Polymer molecules are short and irregular - Carbon dispersion is uneven - Dioxide occurs extensively Polymer molecules are long and regular - Carbon dispersion is uneven - Dioxide occurs extensively

