

We Must Fight Two Battles: The Battle Right in Front of Us and the Battle with the current Era. Otherwise, We Will Have No Future.



Tadano celebrates its 100th anniversary

Although the company was officially established on August 24, 1948, its journey began on the day when the founder Masuo Tadano left Takamatsu for Asahikawa, Hokkaido, to start a welding business. That day, August 29, 1919, is the day we refer to as the date of our foundation. At that time, welding technology was gaining ground and developing rapidly outside of Japan, and its introduction in Japan was only beginning. Captivated by the sparks of welding, Masuo Tadano was convinced that the technology would make a positive contribution to society and ventured to start a business in Hokkaido. Guided by the spirit of *"Sozo* (Creation), *Hoshi* (Contribution), and *Kyoryoku* (Cooperation)," which continues to live on as Tadano's business objective, we are committed to society.

Tadano's past sales and profits show that sales in the Japanese market accounted for a majority of sales during the 1980s and 1990s. However, after the collapse of the bubble economy, sales dropped by half around 2002. Since then we focused on increasing the ratio of sales outside of Japan, and our performance peaked in fiscal year 2007. Then came the Lehman Shock and demand fell by half in just two years. In fiscal year 2010, the company recorded its biggest loss. Although the loss is partly explained by the demand cycle, we learned the hard way how easy it was for a company to slip into a deficit. One option was to revisit our business portfolio and diversify into areas other than the lifting equipment business. Instead, we took it upon ourselves to focus

business. Instead, we took it upon ourselves to focus on the lifting equipment business domain and since then have been working tirelessly to pursue our longterm goals of becoming No. 1 worldwide in the lifting equipment industry, attaining a sales ratio of 80% outside of Japan, and an average operating margin of 20% or more. We face many challenges ahead before we can reach

Past Achievements and Future Challenges

our ambitious goal of becoming No.1 in the world. Instead of trying to tackle everything at once, we set priorities and work on them one at a time.

Vulnerability to economic fluctuations

Compared with construction equipment like hydraulic excavators, mobile cranes are distinguished by their outstanding durability, long service life, and higher prices for used products. Rather than replacing old equipment when it breaks, our customers tend to invest in new products only when the economy is booming, and to postpone purchases when the economy is faltering. In other words, mobile cranes tend to be vulnerable to economic fluctuations.

Becoming a stronger company

As the top manager of a company particularly vulnerable to external factors, perhaps I should simply accept the reality of the economic cycle and hope that our business will turn a profit again when demand recovers. But while accepting the demand fluctuations in the lifting equipment industry, we must face the challenge of overcoming our vulnerability. We often hear the expression "unforeseeable events." Rather than blaming our performance on "unforeseeable events," we want to build a company capable of incorporating these challenges into our strategies.

Being a stronger company means being able to continuously generate profits and develop human resources, regardless of economic conditions. Tadano aims to be a company with stable and high profitability, and specifically targets an average operating margin of 20% or more. A margin of 20% is high, but I believe we need to achieve this target to continuously generate profits even when we face an unfavorable business environment. This approach is embodied in the "Four Tadano Arrows."

The "Four Tadano Arrows'

The Tadano Blue Arrow (the color of the sky) represents trends in markets, demands, and exchange rates (the external business environment) that change in complex ways like the weather. The Tadano Red Arrow (the color of passion) represents self-support efforts, or things which we can control ourselves by putting in our best efforts. The Tadano Yellow Arrow (the color of gold) represents large-scale investments such as construction of new plants and M&As. Combining the three Tadano Arrows produces the Tadano Black Arrow (the color of profits).



We have learned the importance of focusing on the Red Arrow, which we can control, instead of overreacting to the Blue Arrow. We must continue to strive both in good times and bad, and grow while producing results every year. This means that the Red Arrow must always be pointing up. This is the kind of company that we want to be. That is why we defined the basic policy of the Mid-Term

Management Plan (17-19) as "Becoming a Stronger Company (Focusing on the Tadano Red Arrow)."

In the past, we celebrated when a rise in demand led to better performance. We panicked when a drop in demand resulted in poor performance. Even though the fluctuations in our performance were primarily caused by shifts in demand, we simply reacted to only the results each time. To break this cycle, we need to focus on the Four Tadano Arrows, especially the Red. At the same time, we constantly need to anticipate, prepare for, and respond to the Blue Arrow given the unpredictability of the world we live in. We should prepare ourselves in both ways, so that we are ready to face changes at any time.

What we must never forget

I always tell our employees about the three important events we must never forget. The first is the layoffs we implemented three times during the recession between 1998 and 2002. The second is the recall in 2004, and the third is the four workplace fatalities we have suffered in the past.

Since experiencing these events, we have renewed our commitment to human resources development based on our understanding that employees are our greatest assets. Recognizing that our cranes being allowed on public roads is a privilege that comes with great responsibility, we began to devote our efforts to our Corporate Social Responsibility (CSR). Guided by safety, quality, and efficiency, our core values we hold sacrosanct, we put safety first in everything we do.



Future Outlook and Risk Awareness

The era of complicated, rapid, and extreme changes

The world is presently in a state of great instability and we have entered an era of complicated, rapid, and extreme changes. As the major advanced nations lose their political leadership, some are describing the current world situation as a "G-Zero" era, characterized by the absence of leaders. This political instability is impacting the economic environment and is causing unpredictable disasters. Also, as the pace of technological evolution accelerates, we are beginning to witness exponential changes generated by a world-changing technological revolution. Once a change manifests itself, it spreads explosively and results in social transformation. A similar change is imminent in the lifting equipment industry and we need to be ready.

Major changes caused by technological innovation

Tadano developed Japan's first hydraulic truck crane, the OC-2, in 1955, and over the next 60 years has made technological advancements essentially to lift heavier loads over longer distances for various constructions, maintenance, and service purposes. In 2017, the company established an Advanced Technology Research Division and is set to achieve further advances in technological innovation.

For instance, the construction sector, where Tadano's products play a vital role, now faces a major problem, particularly in Japan. The country's low birth rate and aging demographics are resulting in a decrease in the working age population and the number of construction workers. Given the declining number of experienced operators capable of maneuvering cranes with skill and ease, we must move toward further simplifying, facilitating, and automating crane operation through technological innovation to ensure on-site safety. Moving forward, we will likely shift toward the production of fully-electric and automated equipment.

We should keep in mind, however, that mobile cranes can be transformed into a range of traveling and operating configurations depending on the length and the angle of the boom. We need to ensure that our products are safe and secure and that they do not topple over when their positions change. Also, it serves no value if only our products demonstrate outstanding technology at construction sites; rather, it is more important to improve the efficiency of the entire operation. In light of our awareness for the need to revisit the role of cranes at construction sites, Tadano announced its agreement with Kyoto University for a comprehensive partnership for collaborative research. The company is also engaged in research with many other universities and partners on individual themes such as AI.

Diversity and flexibility in the workplace

The wave of the declining birth rate and aging population looms over every company in the construction sector and beyond in Japan. Adapting to this change will require us to utilize female, senior, and foreign workforces. Because Tadano first began as a welding business, we inevitably have a high proportion of male workers now. Today, women participating in welding and other technical competitions are achieving outstanding results. Going forward, we need to create a workplace where women can not only survive, but also thrive. At our new Kozai Plant that is currently under construction, we plan to install air conditioning equipment and increase the number of automated functions. We have also raised our capacity for rehiring retired employees, and have accepted a larger number of trainees from abroad.

As mentioned, our sector faces drastic ups and downs in demand. Flexibility is key to survival. In other words, we need to reduce fixed costs and increase variable costs so as to achieve the optimal balance.





Further global growth

Tadano is a Japanese company, born and raised in Japan. It is likely, however, that the Japanese market will gradually contract due to its declining birthrate and aging population.

Tadano is working to bolster its presence in Japan. Europe, and North America, which we consider to be our key markets. We have positioned all other markets as strategic markets, where we are building on our sales and service networks. In the last decade, Tadano has established 17 Group companies and expanded manufacturing centers 8 business locations outside Japan. In 2016, the company also opened a Global Parts Center in Kobe as part of its efforts to expand its lineup of parts and services in Japan and beyond. Tadano has also dedicated its resources to human resources development. The company established a new training center in the Shido Plant to further enhance the skills of our authorized service personnel who work for service contractors across Japan and to implement technical and safety training for our distributors and service personnel outside Japan.

"One Tadano" is a slogan that expresses our determination to achieve further global growth by sharing common values within the Tadano Group and working together as a team. The concept of "Breadth & Depth" reminds us of the importance of identifying and gaining a good understanding of our customers' needs in different regions while expanding our market share.

Our current policy is to maintain and expand our sales in the Japanese market while increasing the ratio of sales outside of Japan. We have established the following mid-term goals on the basis of our long-term goals: 300 billion yen in net sales in fiscal year 2022 (100 billion yen in Japan and 200 billion yen outside of Japan) and 50 billion ven in operating income. To achieve these targets, we must find the optimal balance in two possible tactics, organic growth and M&As, and two viable strategies, namely expansion of regional presence and product lineup.

Higher resilience

Tadano has established the following six keys to success to cultivate higher resilience to sudden demand changes: Extending our capabilities, becoming lean, flexibility, diversification, agility, and quality improvement.

As one of our specific strategies, we are constructing a new plant in an effort for Global & Flexible Monozukuri, or attainment of flexibility in manufacturing. While we achieved record business



results in fiscal year 2014 and 2015, the Shido Plant, our core plant, was operating at full capacity at the time. To further increase our market share in the future, we may need to enhance our production capability.

Driven by the need to build new plants to achieve our goal of becoming No. 1 worldwide in the lifting equipment industry, we acquired a 20-hectare plot in Takamatsu, where construction is currently underway. We have invested more than 20 billion yen as part of a Tadano Yellow Arrow strategy with the goal of commencing operations in the summer of 2019. One of the most important advantages of the new plant is its seashore location, which allows us to transport large cranes directly to Kobe Port for shipment outside of Japan.

Overview of the new plant

Name: Kozai Plant Location: Kozai Kitamachi Takamatsu Kagawa No of employees: Approx 100 Site area: Approx. 200.000 m Total floor area*: Approx. 47,000 m²

Amount invested: Over 20 billion yen *First phase: (Nov. 2017 to Jul. 2019) Second phase: TBD



Enhanced competitiveness

To become No.1 worldwide in the lifting equipment industry, we want to differentiate ourselves from our competitors and establish a lead that cannot be closed by our competitors even in 10 years. To this end, we aim to be a manufacturer with four synergistic strengths, which consist of product competitiveness and used crane value, along with the Tadano Group core competencies—the source of our competitive strengths—of product quality and service capability (including parts).

One of our concrete strategies is enhancing product competitiveness. Developed for the Japanese market, the new CREVO G4 rough terrain crane series is equipped with more than 10 cameras. The series also offers a range of new functions including Wide Sight View, enabling the operator to be constantly aware of his or her surroundings, and a human alert system, which warns the driver with a buzzer and light when it detects motorcycles, bicycles, and pedestrians on the left side of the vehicle, which is easily hidden in the driver's blind spot. These new features benefit the safety of our customers and society. What do we need to do to increase profits? One might naively believe that all we need to do is to raise the selling prices of our products and lower the costs. It's not that simple, however. All our efforts will be lost if a higher sales price means a loss of competitiveness and market share, and thus a fall in sales. The real challenge is maintaining and improving our sale prices while expanding our market share. From our customers' perspectives, the important question is whether we can offer equipment that is truly useful to them and whether we can create value-added features that enable them to use our equipment safely, efficiently, and with sense of security. We want to distinguish ourselves from our competitors by becoming a manufacturer with four synergistic strengths.

Changes in Tadano's Net Sales and Operating Margins





Aim High, and Keep Moving Forward

What "growth" means for Tadano

To repeat, the basic policy of our Mid-Term Management Plan is to focus on areas we can control (the Red Arrow), instead of overreacting to the Blue Arrow. By maintaining our focus on the Red Arrow, we can continue to grow. We can confirm how much we have grown by checking our results against that of the previous cycle.

Specifically, looking at the progression of our financial results (sales volume and operating margin) over the past 16 years in the above bar graph, the upsurge that began in fiscal year 2002 peaked in fiscal year 2007 then plummeted as a result of the Lehman Shock. In the latter half of the graph, the cycle that began after hitting the trough in fiscal year 2010 shows that our net sales and operating margin are much higher than they were in the former cycle. This shows Tadano's true growth. Achieving sales and profit growth at all times would be ideal, but we believe that true growth comes from always outperforming the previous cycle. I try to convince our employees that we can continue to grow even if we record a sales and profit loss because of the impact of the Blue Arrow.

The battle right in front of us, the battle with the current era

Moving forward, we must fight two battles: the battle right in front of us and the battle with the current era. The first is the battle right in front of us. Each year and each month we must continue to fight the battles in front of us or there will be no tomorrow. However, if that is all we do, we may survive today but will have no future beyond tomorrow.

The use of IoT and AI technology has increased dramatically. Cars and trucks are heading in the direction of full electrification, signaling the death of the internal combustion engine. We are on the brink of a technological revolution which will greatly change the world. Unless we fight the battle with this era there will be no future for us.

The importance of aspirations

What we want to achieve for the future is long-term profit growth. But while this is our goal, it is not our mission. Our true mission is to forever continue to pursue and realize "Sozo (Creation), *Hoshi* (Contribution), *Kyoryoku* (Cooperation)," Tadano's corporate philosophy. This corporate philosophy, along with Tadano's vision and core values, will remain unchanged.

We aspire to uphold these enduring corporate principles and values, as well as the long-term targets and policies set by the company, instead of simply following the instructions of the president or superiors. We want to be able to object to our superiors when their instructions contradict company policies and steer them in the right direction.

We will continue in our pursuit of Tadano's original mission of providing products that will contribute to society and becoming a company that can contribute to the world through its business. At Tadano, we always make the distinction between "being profitable" and rather than "making profits." If a company sets mere profit generation as its only goal, it will end up losing its way. It is important to be a company that naturally becomes profitable as a result of contributing to the world, a concept described by Peter F. Drucker as a creation of customers. As we celebrate our 100th anniversary next year, we remain committed to Tadano's aspirations that have endured since the time of its founding.



What is Lifting Equipment?

Lifting Equipment is mobile machinery used for lifting loads and carrying out aerial work.

One of our long-term goals is to become No. 1 worldwide in the lifting equipment industry, trusted and preferred by our customers.

Lifting equipment plays a vital role in the developments of national and urban infrastructure as well as natural resources and energy, performing the heavy lifting that people alone could not accomplish otherwise.

Comparison of Lifting Equipment companies

| Product category offered | Hydraulic cranes | Telescopic boom crawler cranes | Crawler cranes | Tower cranes | Stiff boom cranes | Folding boom cranes | Aerial work platforms | Overhead cranes | Dockside cranes | Offshore cranes | Industrial cranes |
|-----------------------------|---------------------|--------------------------------------|-------------------|-----------------|-------------------|---------------------|--------------------------|--------------------|--------------------|--------------------|-------------------|
| Company A | \checkmark | | \checkmark | \checkmark | | | | | \checkmark | \checkmark | \checkmark |
| Company B | \checkmark | | \checkmark | \checkmark | | | \checkmark | | \checkmark | | \checkmark |
| Company C | | | | | | \checkmark | | | \checkmark | \checkmark | |
| Company D | \checkmark | | \checkmark | \checkmark | \checkmark | | | | | | \checkmark |
| Tadano | \checkmark | \checkmark | | | \checkmark | | \checkmark | | | | |

Lifting Equipment is a Growth Industry

From the perspective of demographics, lifting equipment is a growth industry in the long term. Looking forward, both the industry and Tadano have major potential.

However, in the short- and mid-term, demand tends to be volatile despite the uptrends in the long term.

To become No.1 worldwide in the lifting equipment industry, Tadano aims to be a manufacturer with four synergistic strengths optimally combined to achieve excellence: product competitiveness, product quality, service capability (including parts), and used crane value.

Changes in Demand for Mobile Cranes Worldwide (on a calendar year basis)



Note 1: The line graph shows how demand changed in Europe, North America, and Japan. "1 unit" represents the nur 2009 for Japan). The graph indicates annual fluctuations in proportion to this unit.

2009 for Japan). The graph indicates annual fluctuations in proportion to this unit. Note 2: In preparing this graph, the "number of cranes produced in China and sold outside China" was added to the statistics after 2010 (according to the new standards established in the spring of 2018). However, the "number of cranes produced in China and sold in China" is not shown on the graph. The total demand in China is said to be as follows: 2010: Approx. 35,000 units, 2011: Approx. 50,000 units, 2012: Approx. 29,000 units, 2013: Approx. 17,000 units, 2014: Approx. 14,000 units, 2015: Approx. 9,000 units, 2017: Approx. 9,000 units, 2017: Approx. 20,000 units, 2017: Approx. 20,000 units, 2016: ApproX. 20

Lifting equipment contributes to society in a way that no other machinery can. Tadano's goal is to become recognized by our customers around the world as an indispensable company in this vital field.

Global Population Trends (United Nations Projections)

