

Propelling

Issue 2



Nakashima People Vol.2

Kanae Takebayashi Sales and Marketing Department, Nakashima Propeller

Propelling, a newsletter from Okayama, Japan, spotlights the hidden allure of propellers and aims to steer the world's ships, and their world, one step into the future

Born and raised in Okayama, where Nakashima Propeller is based, Kanae Takebayashi studied abroad in Britain and worked in Tokyo before returning to her hometown. Hired 10 years ago as the first woman in Nakashima Propeller's sales division, she now oversees many foreign clients, including ship owners in Germany and Greece and shipyards in China. We asked Kanae for her thoughts on Nakashima Propeller.

Q. How do your studies abroad relate to your current work?

In Britain, I studied the theory behind "public art." I also took part in projects such as turning construction sites into art spaces. Frankly, I did not imagine at the time that I would eventually work in sales.

But my background in art and my current

work with propellers are not as unrelated as they might at first seem. The propellers that I sell—some weighing more than 100 tons are all unique and beautifully shaped. They are the product of excellent in-house design techniques and functional beauty sharpened by the care and skill of Japanese craftsmanship. Because propellers are hidden from people's view, they may seem like the opposite of public art. However, Japanese culture values beauty in areas that are not seen from the outside, such as the lining of the kimono. The way we see the "outside" and "inside" is different from Western culture. The beauty of the propeller is also a reflection of its high efficiency, and I would like to pursue my own unique way of interpreting and conveying that value to others.

Propelling Issue 2



Q. What are the challenges of selling propellers?

Nakashima propellers are known for their high efficiency, but the difference between numbers generated from performance tests is often just a fraction of a percentage. We thus need to better demonstrate to customers how the high quality of Nakashima propellers translates into minimal maintenance costs, superior safety and propulsion performance for ships in actual operation, and a long 20- to 30-year lifespan.

Q. What do you enjoy about working for Nakashima Propeller?

I still remember the excitement I felt when seeing the first propeller I sold leave the factory for shipment. We closed the deal with a customer in Taiwan after 7 months of negotiations.

It makes me happy that more customers now come to me for consultation and advice. Given that I work in a maledominated industry, many people were not accustomed to working with a female salesperson. My hope is to deepen trust for the Nakashima brand by co-ordinating closely with the technology and design team, and by building on my track record of responding to clients with competency and kindness.

Q. What do you envision your work to be at Nakashima Propeller 10 years from now?

Whenever I see big ships in the news or in films, I become fixated on the images, thinking that one of our propellers may be operating them. Because propellers are so large, I imagine them to have possibilities that are just as big. Nakashima Propeller is constantly evolving and transcending existing boundaries. Ten years from now, I would still like to be delivering a new, "distinct Nakashima" to the rest of the world. Perhaps the propellers will not be the same as they are now—but without doubt, they will play a paramount role in the seas of the future.

Maxim of Nakashima Propeller

"Good for sellers, good for customers, good for the world"

This saying has been handed down by merchants in the Omi region (currently Shiga Prefecture), where businesses flourished. The third part of the phrase was originally "good for society." The saying teaches us to conduct business that benefits not just the sellers, but also customers and society as a whole.

The late Tamotsu Nakashima (the second president of Nakashima) embraced these words in the company's archives, saying he "hoped for the new, big dream of 'good for the world' to come true," and thus Nakashima Propeller's maxim was born.





INTROSPECTION – JAPANESE INNOVATION Small Architecture

Fighting for survival, companies around the world are being forced to shift their mindset away from simply providing products towards providing solutions.

At first glance this change may seem undesirable for Japan, which is more celebrated for its *monozukuri* (craftsmanship) culture than for its big-picture, strategic thinking.

However, there is an aspect to Japanese craftsmanship that excels in building soft and hard wholes from delicate details. Take, for example, the style of architecture that Kengo Kuma, a world-famous Japanese architect, advocates.

Kengo refers to it as "small architecture." But he does not mean architecture that is small in scale; rather, one that is made up of flexible small units, as seen in his projects such as the Water Branch House (New York), Casa Umbrella (Italy) and the Great (Bamboo) Wall (China).

The way in which the small becomes the innovative whole is shown stunningly at the Water Branch House, which comprises filled water-tank blocks, each made of biodegradable polyester (see photo). The stackable tanks can form anything from furniture to an entire house. They also play multiple roles in insulation, lighting and comfort.

Yet there is more here than beautiful and innovative design, execution and function. Kengo is committed to creating architecture that relates to its surroundings. He sees it as a way of connecting people to a place and allowing them to experience more deeply and intimately the nature that surrounds them. "Small architecture" tries to be humble and respect its surroundings instead of dominating them.

Kengo's thinking is both innovative and born out of the best Japanese traditions, which are based on a worldview and aesthetic rooted in the unique relationship between humans and nature, with humans believed to be part of nature. The Japanese have long taken lessons from the natural world, including the delicate details of flexible components that form a whole.

The wisdom of "small architecture," according to Kengo, is inherent in traditional Japanese architecture. Obvious examples are the *fusuma*, or papered sliding doors that partition rooms, and the rows of thin pillars, or *hashira*, that support the building—both can be rearranged to allow for flexible use of space. Traditional products and ideas such as these are becoming increasingly relevant and can form spectacular designs that are globally admired.

The most important thing to note here is that the solution to the whole is conceived from the start in the individual components. Japanese craftsmanship's unique power of innovation can be applied to create a wide range of structures, not just architecture.

In this regard, the recent focus on solutions is not a threat to Japanese craftsmanship, but rather a golden opportunity to unlock its potential. Just beyond the horizon is a future with a variety of small solutions making up a new form of humble and sustainable civilisation.

Reference: Kuma, K. (2013) Small Architecture (Iwanami Shinsho) The original article was in Japanese Written by Yaoyorozu–ING

NAKASHIMA PROPELLER

We Go Beyond

Headquartered in Japan's Setouchi region, the centre of the country's shipbuilding industry, Nakashima Propeller is a manufacturer of marine propulsion equipment boasting a leading share in marine propellers.

Having started as a foundry for fishing boat propellers, the company has continued to pursue innovation in the capability of propellers to deliver security, safety and comfort. It will be celebrating its 100th anniversary in 2026.

A ship's optimal state is found when it is viewed from the propeller, the centre of propulsive functions. With this fresh perspective, Nakashima Propeller seeks to offer a full range of

services catering to each ship's entire life cycle while achieving fuel efficiency to reduce the burden on the environment. Nakashima Propeller works to contribute to the world, beyond the realm of its industry.

OUR STRENGTHS

JAPANESE QUALITY

Nakashima Propeller offers refined in-house capabilities in design and manufacturing. Using a high-performance computer with a 3000 core large-scale processor, Nakashima's craftsmen create a blueprint based on data accumulated from a world-class production history of 1 million propellers. Moreover, with its unique manufacturing skills that integrate cutting-edge technology and experienced craftsmanship, Nakashima is fully equipped to delicately reflect design in manufacturing and deliver reliable Japanese-quality products.

CUSTOMISED PRODUCTION

The propeller is at the centre of optimising propulsion performance—and a hundred

different vessels will have a hundred different propellers. Rather than pursuing efficiency as a manufacturer, Nakashima takes pride in its commitment to build-to-order production, designing and manufacturing optimal propellers for each unique ship under an integrated production system.

CUTTING-EDGE USE OF SMART TECHNOLOGY

Nakashima's smart technology is able to define the shape of the high-efficiency propeller's complex three-dimensional, curved surface. By increasing the surface area of machining with adjustments such as modification of the trailing edge, a process requiring special craftsmanship is simplified and speedy production without dispersion is achieved.

SERVICE ANY TIME, ANY PLACE

Nakashima Propeller promptly responds to propeller damage by sending repair engineers from its worldwide network to your site. Nakashima takes into account various conditions such as the ship's fuel efficiency, course and degradation due to ageing to propose solutions such as edge modification, fuel-saving polishing and retrofit, providing detailed support throughout the ship's entire life cycle.



Nakashima Propeller designs and manufactures marine propellers (FPP and CPP), thrusters, energy-saving devices for the stern and CFRP propellers.

We also offer a full range of after-sales service, including repair of damaged propellers, edge modification, fuel-saving polishing, support of propulsion equipment for ships in operation and optimisation of propulsion performance for fuel efficiency.

*We provide propellers for ULCS, VLCC, VLOC, VLGC, LNG/LPG-carriers, PCC, cruise ships, working boats, coastal vessels, research vessels and coast guard vessels *Our services satisfy requirements for all major classification certificates (including ice-class)



"World-recognised Japanese quality cannot be described solely in terms of mechanical precision or reproducibility. Lacquerware used at the dinner table, Japanese knives that are indispensable to create Japanese delicacies—only with the deep commitment and thorough experience of the people who make them can the full potential of such products be unleashed. Our propellers embody the same spirit of Japanese quality."

-H. Kubo, general manager, innovation section, Nakashima Propeller

EVENTS

ASIA PACIFIC MARITIME – Singapore 16-18 March 2016 SEA JAPAN – Tokyo, Japan 13-15 April 2016 OFFSHORE TECHNOLOGY CONFERENCE – Houston, USA 2-5 May 2016 SMM – Hamburg, Germany 6-9 September 2016

NAKASHIMA PROPELLER CO., LTD.

688-1, Joto-Kitagata, Higashi-ku, Okayama, 709-0625, JAPAN +81 86 279 5111

npcwebmaster@nakashima.co.jp

Japan • Singapore • Vietnam • Philippines Korea • Taiwan • China • U.S.A. • Brazil • Turkey • U.K. • Namibia • UAE

Propelling, Issue 2 (November 20th 2015) Produced by Yaoyorozu-ING Gompany Co., Ltd. Photo by Takumi Ota [P1, 4], Masako Nakagawa [P2] Copyright 2015 NAKASHIMA PROPELLER Co. Ltd. All rights reserved.