

Beyond the Ri'ichi

Part 1: From local town in Japan, to the world

by Hiromi Saita, Senior Staff, International Management Office, Satake Corporation, Japan

Since its foundation in 1896, Satake's 123 years of history have been an endless challenge with technological breakthroughs and regional boundaries. Initially started as a short grain rice milling machine manufacturer in Japan, Satake's products now range from rice milling machinery, flour milling machinery, biomass gasification systems and microbial analysers for ballast water, to packaged rice for the food industry.

Satake currently serves its customer with 29 offices in 13 countries outside of Japan, and supply products and services to over 150 countries worldwide, establishing and extending its global production system and service network.

We would like to go back in time and explore how Satake expanded its application of the short grain rice milling machine beyond the realms of imagination to all other products.

Born in Saijo

In 1863, Ri'ichi Satake was born in a small town of Higashi-Hiroshima city, Hiroshima prefecture, Japan, as the first son of the Satake family who made their living as farmers for generations. It was in 1878, at age of fifteen, during the laborious work of manual rice milling that the first new ideas started to flash through Mr Satake's mind on how to improve the rice milling process.

However, as he was about to start trials on a new type of rice milling machine, he was appointed as a person in charge of water management of the largest lake in Hiroshima Prefecture. In 1893, immediately after completing this work, he was again assigned



Ri'ichi Satake

as a commander of line construction for the railway between Mihara city and Hiroshima city, both in the prefecture.

The railroad later became one of the main lines in Western Japan, the Sanyo line. Furthermore, he was then chosen for the post of line construction between Kyoto city and Nara city.

It was 1895, he was finally able to start the development of the rice milling machine. In 1896, Ri'ichi had realised his dream of creating a power-driven milling machine - the first of its kind in Japan.

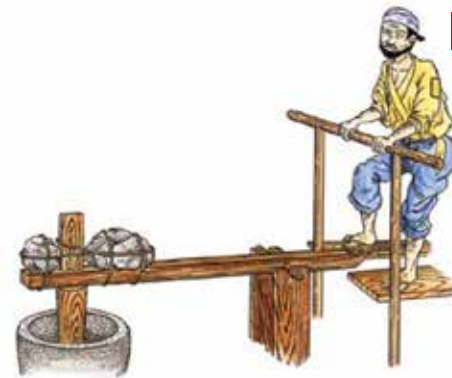
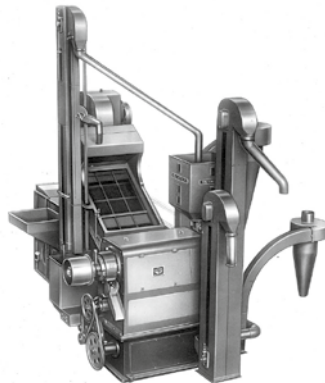
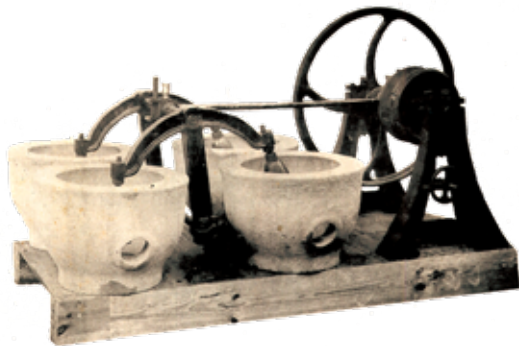
He not only designed it but crafted all parts by himself in a small shack. Its performance was 20 times more efficient than that of man-powered alternatives and impressed everyone who saw the demonstration; he immediately sold three of them.

However, not completely satisfied with its tall bulky heavy weight body (at near 370kg in total), he was led to recalling all machines he had already delivered to customers and begin the addition of further improvements.

The improved version became the famous four-linked type motor power-driven milling machine, twice the capacity but half the size of the first machine. The sales of this revolutionarily efficient rice milling machine expanded so rapidly that soon the tiny manufacturing facility became one of the largest in the area, hiring over 200 employees. This is the foundation of the current Satake Corporation.

Ri'ichi continued improving the equipment and, in 1908, his new invention resulted in the first circulating abrasive type milling machine in Japan, now including an emery milling chamber and an internal spiral roll.

This abrasive-type machine was the foundation of brewing an



Above centre: Satake's Tropic HS-type rice milling machine

innovative Japanese rice wine, Ginjo sake, which used rice with over 40 percent of the weight milled off, leaving just the centre part of the rice.

Overseas

Satake's first overseas expansion began 85 years ago, in 1932. As people in northern part of China suffered from undernourishment (particularly beriberi due to vitamin B1 deficiency), provision of vitamin-rich "germ-retained rice" became an urgent necessity, and Satake's germ-retained rice milling machines were exported to Manchuria.

In 1933, the need for Satake's rice machines to mill kaoliang increased and they began major export. In 1939, Satake established a rice milling machine manufacturing facility - Satake Manchuria.

The business outside of Japan continued to grow. In 1942, Ri'ichi's son, second president Toshihiko Satake visited Burma (now Myanmar), Thailand, and French Indochina (now Vietnam and Cambodia) at the request of the Japanese Government and

took about 10 months to conduct an intensive survey of the rice mills in those areas.

From the result of these on-site surveys, Satake learned more about rice variety and rice milling environments in different countries outside of Japan and found that rice milling equipment optimised for Japan and nearby countries is not necessarily best suited for rice in Southeast Asian countries.

The rice from Southeast Asia typically held much less fat and fragility than that of Japan, which resulted in a higher percentage of broken rice once milled. Satake developed the "Tropics HS-type" rice milling machine, which was optimised for the region.

In 1950, Satake participated in the Food Machinery Exhibition held in Burma by the Food and Agriculture Organisation of the United Nations (FAO). Since then, Satake has expanded their export and sale of rice milling machines to Asian countries.

For the next article, we would like to examine further the processing of what was a new product for Satake at that time: long grain rice.

www.satake-group.com