



Russell Finex's Self-cleaning filter safeguards Chinese food factory's reputation

The Self-Cleaning Russell Eco Filter® improves the quality of a popular baby rice cereal product

A multinational food processing, nutrition, and health company opened the doors to its first factory in China. Producing milk powder, cereals and infant formula, it leads the way in providing nutritious and healthy products to its customers.

With 99% of its products sold in the Chinese market being made locally, it is important that the products processed in these factories are of the highest quality. With strict health and safety regulations in place at its factory, including the Hazard Analysis and Critical Control Points (HACCP), it is imperative that its production line complies with these standards. Since it opened, consumer demand has increased for the group's products, which led to the company needing to optimize its production lines.

The food processing company approached Russell Finex, as the global leader in separation equipment, to provide it with a filtration solution. Having never used a filtration unit in its production line before, they first wanted to trial the Self-Cleaning Russell Eco Filter®. Specifically to improve the contamination removal from the rice paste included in its baby cereal, and protect its reputation and product quality.



Figure 1. Baby Rice Cereal

"We were very happy with the performance of the Self-Cleaning Russell Eco Filter and how it removed contamination from the rice paste. It vastly reduced product downtime for us and improved product quality."

Production Engineer

Providing improved filtration quality

After successfully testing the Self-Cleaning Russell Eco Filter® on its site, the company then decided to install the unit within its processing line, along with a Russell Filter Management System™. The machine was placed after the wet mixing of the paste but before the heat treatment to filter out any oversize and unwanted contamination in the mixture. Its installation added an extra layer of security to protect the product quality and met rising customer expectations.

An innovative filtration solution for a global company

Processing 6 tonnes/hr, the Self-Cleaning Russell Eco Filter® allowed the food company to improve its product quality and protect its reputation as a global food and beverage company. Product quality and throughput rates increased, matching customer demand for the baby cereal product.

The inclusion of a Russell Filter Management System™ allowed for the filtration process to be continually monitored, enabling it to run safely without operator involvement. It was also simple to integrate into the filtration system, and improved operator safety allowing minimal contact with any potential hazardous product.

The Self-Cleaning Russell Eco Filter® (SCF) has a stainless steel, reusable filter element instead of a filter bag. Filter bags need replacement and disposal when it becomes blocked which means higher operation costs and contamination risk.



the Spiroklene system, keeping it free from blockage and therefore guarantees higher productivity. Furthermore, the enclosed design of the Russell SCF protected the quality of the rice paste from any airborne contamination in the environment.

“This inclusion of the Filter Management System alongside the Self-Cleaning Russell Eco Filter helped to keep our production line running smoothly, automating the filtration process, and allowing our operators to focus on other value-added tasks.” Production Engineer

Advantages of the Self-Cleaning Russell Eco Filter® :

- **Reduces product waste** - with no need for filter media replacement, waste is reduced
- **Increases production rates** - eliminates stoppages to change filter media which improves throughput
- **Safeguards the health and safety of operators** - the enclosed system minimizes the risk of contamination and hazardous chemicals being released



Figure 2. The installation of the Self-Cleaning Russell Eco Filter®

About Russell Finex

Established in 1934, Russell Finex has over 85 years of experience providing innovative filtration solutions to its customers across the globe for a range of different food and beverage applications. With a team of expert sales engineers, Russell Finex has the knowledge, longevity and expertise to help your business improve its production line in whatever industry you are based in, from food and beverage to coatings, metal powders, pharmaceuticals, and water processing. To find out more, [contact Russell Finex today.](#)