

The Russell Compact Airswept Sieve™ provides easy-clean and safe solution for sieving of powdered ingredients

German food supplier SternMaid GmbH & Co. KG, further develops its product quality thanks to the integration of an innovative screening solution within select production lines and guarantees protection of its customers' end-products

SternMaid GmbH & Co. KG, based in Wittenburg in Germany, is a company owned by the Stern-Wywiol Gruppe. The group of companies have 12 German specialist firms, 18 foreign branch establishments, 8 Stern-Technology Centers and have production sites in 10 countries. For over 40 years, they have been considered the most successful internationally operating enterprises in the field of "Food & Feed Ingredients", exporting to over 130 countries worldwide.

Founded in 1996, Sternmaid is now one of the leading contract manufacturers of powdered food additives, food supplements and pharmaceutical excipients in Europe. With more than 350 employees, SternMaid offers a wide range of services. It is an expert in blending and refining special ingredients, for products like vitamin mixtures, pharmaceutical products, nutrients for special dietary purposes, and baby food.

Production process




SternMaid uses bulk bags which contain powdered food supplements, that are discharged through a sieve. A vacuum conveyor then pulls the product along a 10m long conveying line and feeds it into a filling line for sachets. SternMaid sought to improve this conveying process by integrating a new screener to provide increased protection against any risk of contamination entering its customer's products.

Already having worked with Russell Finex with former projects, SternMaid trusted Russell Finex again to help the company find the ideal solution to meet its needs. Technical Project Manager, Jan Zabel, comments: "As a contract manufacturer for the food and pharmaceutical industry, we are dealing with sensitive raw materials and products. This requires the trust of our customers. Having worked with Russell Finex in the past, we know its screening technology is innovative and the most reliable for our production and filling processes."

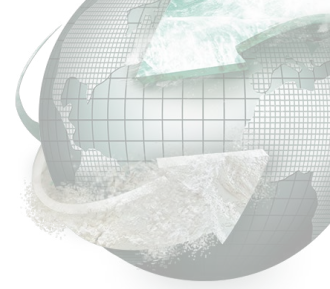
After testing it onsite and satisfied with how it handled



Figure 1. The Russell Compact Airswept Sieve™

-  **Improves production capacity** - increases the production capacity up to four times, compared to standard sieves
-  **Fits into smaller spaces** - Compact design fits easily into any other stage of the production process
-  **Ensures safety for operators** - Dust-tight operation reducing the risk of product inhalation

the powdered ingredients the 600mm Russell Compact Airswept Sieve™ was recommended, using 1000µm and 2000µm mesh size, as the best solution. With the installation of this unit, SternMaid further developed its production line enabling the company to optimize its processes and to work at a very high level of quality control.



The tests that were carried out with the sieve allowed the company to extensively assess the functionality and performance of the machine. This enabled SternMaid to sieve its powdered food product through a 1000µm mesh aperture size. This installation enabled the safeguarding of product quality, whilst another main advantage of this sieve meant that it could be installed within SternMaid's existing pneumatic vacuum line, and was easy to strip down and clean.

About Russell Finex

Established in 1934, Russell Finex is a global leader in sieving and filtration technology with a wide range of vibratory sieves, separators and self-cleaning liquid filters. With 85 years' experience, the company is not just a supplier but an innovator and advisor, serving a variety of different industries, including food and beverage, pharmaceutical, coatings, ceramics, and metal powders. Contact us today and find out more about how the machines can help with your specific requirements.



Figure 2. An example of some of the final packaged product produced by SternMaid

Innovative manufacturing solutions

The Russell Compact Airswept Sieve™ combines Russell Compact Sieve® technology with industrial conveying lines for easy installation whilst taking up less production floor space. Its easy to clean design reduces risk of product contamination and minimizes production downtime for the operator. It also ensures powders can be check-screened in one dust tight operation, reducing the risk of product inhalation by the operators, which was an important factor for SternMaid and its processing line.

“Know-how, quality and flexible production processes are our top priority. Russell Finex has responded to our requests, and the support and advice from the sales representative was very good”, Mr. Zabel concludes.