

Ruggedly Built for Best Manufacturing Results

A box-type foundation provides rigidity, even at high line speeds. All product contacting surfaces are stainless steel or approved plastic. A built-in system uses brushes and high-pressure air jets to clean out mating slats between cycles. Oil-tight switches and push buttons are used throughout the system, and controls are in NEMA 12 electrical enclosures.

Quick Changeover and Maintenance

Lakso Slat Fillers quickly and efficiently meet the needs of all your container sizes and product lines.

Changing container sizes? Filling chute assemblies can be replaced in minutes without the need for tools.

Changing products? Mating slat sets are easily accessible for fast replacement or cleaning. Lakso machines open wide for maintenance or cleaning, and all side panels are hinged for convenient access and interlocked so the machine cannot be operated when panels are opened. The entire machine is mounted on a portable base.

Automatic Controls

These controls provide security against container jams and product spills. Automatic infeed and backup controls stop machine operation if the container supply fails, or if a backup occurs on the conveyor line.

Programmable Machine Control

All solid state electronics control every phase of machine operation. The color touchscreen provides reliability and fast, easy change in setup or operation. Setup data is held in a menu format for single touch downloading.

**The Lakso Series 73 Hoist Bulk Feeders**

Used in conjunction with Lakso Slat Fillers, these feeders give you complete tablet-capsule handling capability from bulk supply to final packaging.

Efficient Sifting and Screening of Product

The Lakso Sifti-Feed hopper screens out dust and chips by means of a perforated screen and dust collection manifold that ties into the machine-based dust collection system.

Hoist Bulk Feed

This system is available in different configurations with 1) hoppers as part of the assembly; 2) a separate stainless steel tote hopper with wheels; or 3) use with other totes.



Lakso Slat Fillers



▲ Lakso Model RF450

Lakso Fillers provide superior performance in pharmaceutical product counting and container filling. Excellent manufacturing practices and the high-speed accuracy of these rugged Fillers allow NOVA Packaging Systems to meet your present and future filling requirements. Choose from different sizes of NPS Slat Fillers with high-speed counting capabilities to best satisfy your requirements.

Careful, Clean Product Handling

One-piece mating slats, which carry products, are made of approved engineering-grade plastic. Product cavities are smooth and open without undercuts or crevices that can trap dust and contamination. The interlocking feature of Lakso mating slats adds rigid strength for more efficient cavity filling.

Dual Lane Applications

The patented Lakso shuttle chute is used to maintain full product visibility, minimize chute jam possibility, and maximize filling speed.

Air Cylinder Index

This feature indexes containers without the use of feedscrews. Air-operated stops clamp to any conveyor rail to direct the next batch of containers into filling position. All containers are visible during indexing – as well as fillings – without precision adjustments.

Feedscrew Index

The feedscrew index quietly handles and precisely locates containers of varying sizes and shapes directly under filling chutes.

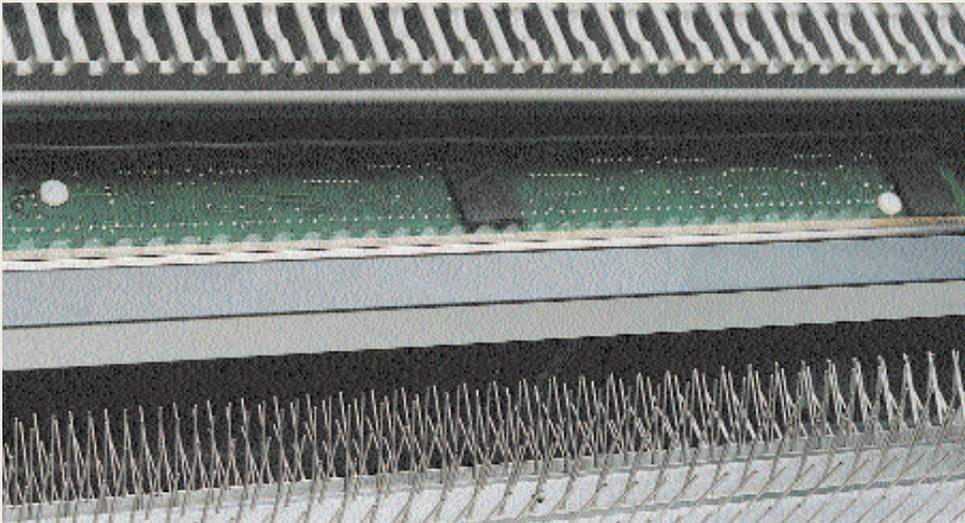
Lakso Slat Fillers Production Rates

Based on 100 Count Aspirin Size Tablet

RF450		
single lane	72 slats	120 bottles per minute
dual lane	72 slats	180 bottles per minute
RF990		
single lane	72 slats	240 bottles per minute
dual lane		400 bottles per minute

Note: Speeds are dependent upon tablet and container shape, size, and uniformity

Accurate High-Speed Container Filling



Lakso Micro-Scan® detection system ▲

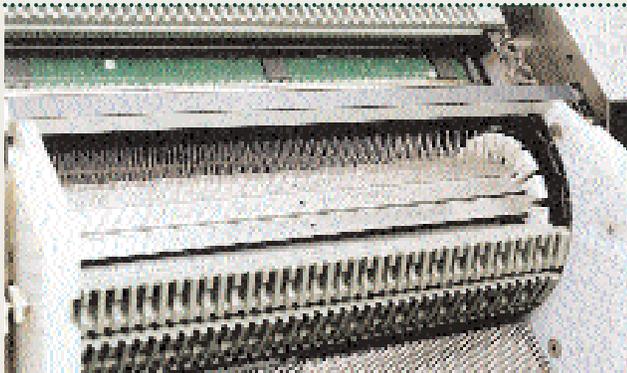
Lakso Micro-Scan® System

Checks every cavity, every cycle, at any speed.

The Lakso Micro-Scan® empty cavity detection system solves the problem of positive, every cavity inspection – even when operating at high speeds. The system is reliable, using infrared light and advanced solid-state electronics.

How the Micro-Scan® system works:

1. During operation, the Micro-Scan® monitors data from both heads and the timing signals. It processes and stores the data, and generates a signal to the reject system if necessary.
2. On signal from the Micro-Scan® control, light from an infrared LED source is beamed through a bottom hole of the mating slat.
3. If product is present, infrared light is blocked. No signal goes to the receiver head.
4. If the cavity is empty, infrared light passes through, is picked up by the receiver head, and recorded by the Micro-Scan® control.
5. When an empty cavity is detected, the bottle with a short-count is tracked and rejected by the machine.



Positive purging of all product . . .

The Lakso purge system ensures that all tablets and capsules are discharged from the cavities of each mating slat during every cycle. This prevents undetected short-count containers (as a result of product hang-up) without utilizing extra inspection personnel. Mechanically actuated stainless steel pins probe each cavity by gently assisting all product into the bottle filling chute as the mating slat reaches the drop point. Pins for an entire slat width are contained on a single bar.

Lakso Purge System

How it works . . .

1. Pin bars ride on a stationary cam positioned behind the drop point that is mechanically synchronized to work as the mating slats pass this point.
2. As the mating slat approaches the drop point, pins enter holes on the bottom of the mating slat. These are the same holes used by the Micro-Scan® system.
3. At the drop point, pins gently probe deep into each cavity, making sure all product is loose and ready to drop.
4. All product drops free on the way to containers.
5. Immediately after the drop point, purge pins retract while mating slats move on for cleaning and refilling.

Lakso Slats and Change Parts

Lakso Machine Advantages

Efficient carriers for tablets and capsules . . .

Tablets and capsules move through Lakso Slat Fillers in matched sets of mating slats. Each slat is made from a single piece of high-density, high-impact plastic. Lakso mating slats are made without external reinforcing members, so operation is cleaner and clean-up is faster and easier. Lakso mating slats are designed for high performance and ease of cleaning. The following is a partial list of attributes that make our slats efficient carriers for tablets and capsules.

- Groove design helps pre-sort tablets and capsules during loading
- Product cavities are clean and open, without undercuts or crevices that can trap dust and contamination
- Integral mating tongue matches groove on next slat for added strength, more efficient cavity filling, and higher machine output potential

- Purge holder provides access for purge pins and complements our Micro-Scan® detection system
- Leading edge of cavity is beveled for smoother product drop
- Mounting hole is nylon-lined for no-wear operation
- Static eliminators are used to reduce the effects of static charges held by tablets and capsules
- Patented radius top design for small tablets
- Lakso slats, in conjunction with Lakso quick-change dividers and custom designed chute assembly, provide count control with high-speed filling performance as well as quick and easy removal for changeover and cleaning

Automated liquid and tablet filling systems, including cottoners, cappers, bottle unscramblers, slat and electronic tablet counters, complete line integrations, and validation services

Product brands include Kalish, King, Lakso, Merrill, and Swiftpack

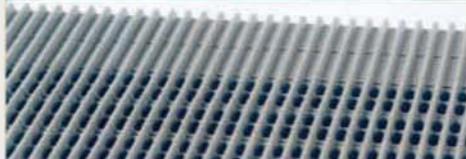
US Facility

Nova Packaging Systems
New Lancaster Road
Leominster, MA 01453-5224
Phone: 978-537-8534
Fax: 978-340-0730
Toll Free: 800-851-1518

International Facility

Swiftpack Automation
a member of Nova Packaging Systems
3 Arden Road
Alcoster, Warwickshire B49 6HN
United Kingdom
Phone: (011-44) 1789-400880
Fax: (011-44) 1789-400780

Sample Lakso Change Parts



▲ Standard type slats



▲ Radius top slats
(Patent Pending)



▲ Pin bar set



▲ Quick-change
divider assembly



▲ Standard chute set



▲ Diving chute set

Partial Customer List

- Glaxo-Wellcome Inc.
- Searle & Co.
- Eli Lilly & Co.
- Parke Davis
- Pharmaceuticals LTD.
- Schering-Plough Products
- Braintree Laboratories
- Merck P.R.
- Aventis
- Wyeth Laboratories
- Wakunaga of America
- Smith Kline Beecham
- Ayerst-Wyeth Pharmaceuticals Inc.
- Bristol Laboratories
- Wyeth Lederle Laboratories

Take the Next Step.

Please contact us today to discuss your application and explore profitable possibilities.



7 New Lancaster Rd. Leominster MA 01453
Tel: 978 537 8534 Fax: 978 840 0730
www.imanova.com