

FOCUS ON FILAMATIC®

Solutions FOR THE LIQUID PACKAGING INDUSTRY



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LOOKING TO GET YOUR FILL AT INTERPHEX?



See a Demo of Our Diverse Line of FILAMATIC® Pharma Packaging Machinery Solutions at Booth #357 in New York, March 16-18

We welcome you to visit us at Booth #357 to see a presentation of our multiple pharmaceutical packaging solutions. Our FILAMATIC Bench-Top Filling Systems, including piston pumps and nozzles, will be exhibited. These systems provide an ideal solution for your pharmaceutical, biopharmaceutical, and diagnostic small production needs. Additionally, through an interactive multimedia presentation, we will demonstrate the industry's first automated fill/finish packaging system for pre-capped/pre-sterilized microtubes. Other customized Monobloc Packaging Systems performing a variety of functions will be shown as well! Stop in to speak with our consultants regarding your IQ/OQ validation requirements.



NIC's line of FILAMATIC Bench-Top/Semi-Automatic Filling Systems handle a wide variety of product/fluid types and viscosities in fill sizes ranging from less than 1 ml. to 1.1 liters per dispensing cycle at filling accuracies to $\pm 0.5\%$.

Our Pharmaceutical Monobloc Systems offer functionality such as filling, fitment/plug insertion, stopper insertion, and aluminum overcap crimping. A variety of liquid metering systems are available to accommodate a wide range of product viscosities and to provide a fill volume range of 0.1 ml. to 500 ml. per dispensing cycle at filling accuracies to $\pm 0.5\%$. All FILAMATIC monoblocs are digitally controlled with menu-driven programs that electronically adjust operating parameters for quick and easy tool-less changeovers.

FILAMATIC microtube handling monoblocs are designed to sort and feed the containers using a vibratory or centrifugal feeder, label or code each container, and dispense a volume of liquid ranging from 0.01 ml. to 3 ml. into each one using a

Schedule of Packaging Industry Events for 2004



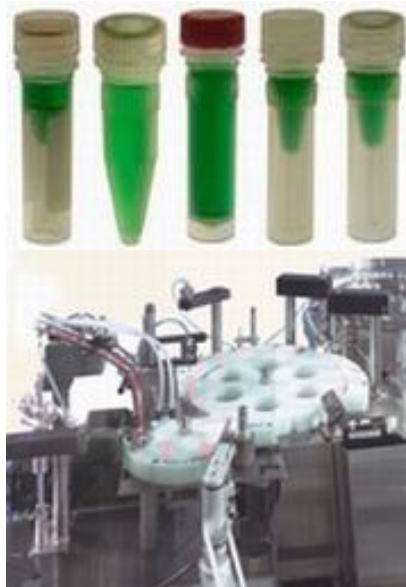
March 16-18
Jacob K. Javits Convention Center
New York, NY
www.interphex.reedexpo.com

Stop by Booth #357 to see our presentation of FILAMATIC packaging machinery solutions



September 20-24
PDA/FDA Joint Regulatory Conference/Exhibition
(Exhibition dates: Sept. 20-21)
Omni Shoreham Hotel
Washington, DC
www.pda.org

servo-driven pump. They then sort, feed and apply a screw cap, and discharge each completed microtube directly into an accumulation bin or onto a horizontal accumulation track assembly. After consulting with several leading companies in the biotechnology industry, we made some key modifications to the basic monobloc to develop a system that offers the first completely automated production system for handling pre-capped and pre-sterilized microtubes. Each unit has a compact footprint, includes a HEPA filtration system, and incorporates a unique GMP design that uses a two-position operating station to minimize the possibility of product contamination.



For more information, or to schedule an appointment at INTERPHEX with one of our systems consultants, contact:

Mary Burchard
Phone: (800) 526-1301 ext. 229
E-mail: info@filamatic.com

New Flexible Service Agreements Reduce Cost Overruns And Increase Productivity

Through the years, whether they're performing pre-shipment factory acceptance trials, post-installation set-up and training, or emergency service calls, our technical service department has always received high marks from customers. So to help our customers contain costs, while still providing the level of talent and responsiveness they have come to expect, NIC now offers flexible, yet comprehensive service agreements.

A NIC service agreement typically includes:

- A specified term length -- allowing you to lock-in certain operating expenses for a specified time period.
- Multiple service trips to your facility -- allowing you to control trip-related travel and living costs.
- Discounts on recommended replacement parts -- allowing you to maintain you FILAMATIC system(s) in peak operating condition.

Depending on the plan you choose, the services our technicians provide during a visit to your facility may include any of the following:



November 7-11
McCormick Place
Chicago, IL
www.packexpo.com

Stop by Booth #S-2325 to see our presentation of FILAMATIC packaging machinery solutions

- Periodic system operation/maintenance audits that will help you identify new ways to optimize operation and production output. Now you can get an edge on your competition with immediate access to our most recent system design and engineering refinements. These regular updates can help you streamline set-up for new lines and cut changeover times dramatically.
- Periodic training sessions for your operators and maintenance, set-up or changeover personnel. This service includes a thorough review of system functionality and training in problem identification, troubleshooting, and system set-up. Now you have a proactive way to deal with the problems associated with employee turnover.
- Preventative maintenance programs that include periodic system overhauls to help you minimize downtime.

To find out all the ways a FILAMATIC service agreement can help improve productivity and reduce cost overruns, contact our agreement coordinator, Wayne Beatty, for a no-obligation quote on a service contract tailored to your needs. Call (800) 526-1301 extension 262, or contact by e-mail by clicking here.

www.filamatic.com **Website Update**

Don't forget to check out our multimedia, interactive, www.filamatic.com website. Navigation tools, including pull-down menus and key word searching, allow visitors to readily access company and product line information organized by equipment/machinery type and customer industry. The website is continually updated with new information regarding our diversified line of FILAMATIC packaging machinery, and visitors are encouraged to return to see newly posted information. The most recent additions to the website include streaming video showing the operation of a microtube monobloc system and a Spanish language version of our semi-automatic liquid filling systems literature ("Maquinas Llenadoras Portatiles Semi-Automaticas").

Other recent additions include:

- [Filling Unit Application Guide](#)
- [FUS/FKS Filling Units Overview](#)

Molten Product Filling Systems

The efficient way to produce deodorants, lipsticks, pomades, and other wax/petroleum-based products

National Instrument Company is one of the nation's premier manufacturers of filling equipment for stick deodorants and antiperspirants. FILAMATIC Molten Product Filling Systems can handle liquids or liquefied solids at temperatures ranging from ambient to 200°F. These systems can reach production rates of up to 300 containers per minute with filling accuracies of $\pm 0.5\%$ or better.



- [Demo and Used equipment available for immediate sale](#)
- [DIGIFIL® Dockable Filling System Video](#)
- [In-case Filling/Capping System Overview](#)
- [Modular Monobloc Packaging System Video](#)

Two additional webpages, "[Press Releases](#)" and "[Newsletters](#)", are noteworthy. The former provides a listing of and access to all press releases, typically new product information, issued by NIC after October 2002. The latter allows a website visitor to access all previous editions of NIC's "FOCUS on FILAMATIC" eNewsletter.

The product contact parts, including the filling units, holding tank/ manifold, intake/discharge tubing, and nozzles are enclosed in a temperature-controlled transparent chamber. During operation, the nozzles descend through openings in the heated chamber and discharge the fluid. They then retract when the fill cycle is complete.

Our systems are designed with a variety of standard features to improve fill accuracy, reduce maintenance, and increase safety, while keeping changeover time to an absolute minimum. If you have special production demands, a number of optional subsystems can provide additional functions to streamline even the most complex filling processes.

FILAMATIC molten product filling systems use positive displacement piston filling units to handle fill volumes ranging from 1 ml. to 1100 ml. The filling units are typically equipped with air-operated valves, mounted to specifically prevent product build-up and air entrapment, and designed to provide for quick disassembly for cleaning.

Control system PLCs and operator interfaces simplify set-up and changeover. You can adjust the fill volume quickly and troubleshoot the entire system in just moments. If you need control systems that are compatible with hazardous materials or locations, we can deliver proven, molten product fillers engineered for the most demanding production environments.

The transparent heat chamber adds an extra degree of safety by enclosing the system's moving parts. Our design team has included supplemental guarding in the area where the nozzles cycle in and out of the chamber. All controls, such as pushbuttons and interface touch screens, are positioned outside of the heat/safety chamber.

If your production process requires a high level of temperature uniformity and product homogeneity, our optional recirculation system may be added to keep the product in constant motion during the production run. This provides for fast system recovery after an interruption in the filling process. So when lunch breaks, shift changeovers, or an upstream or downstream packaging machine break down interrupts production, you can be up and running again in no time. You can also add an integral mixing system that provides for the combining of a scent/color additive with a base/generic product at the point of fill, thereby minimizing both product waste and changeover time.

FILAMATIC [Molten Product Filling Systems](#) can be easily integrated with upstream and downstream equipment such as conveyors, unscramblers, puck loading/unloading systems, cappers, and labelers. We can also engineer customized filling system enhancements to meet the most unique specifications. Click [here](#) to learn more about our line of Molten Product Filling Systems.

FAQs

Q: Does National Instrument Company offer FDA-approved o-rings?

A: Yes, FDA-approved silicone o-rings are available upon request.

Q: Regarding the screen material located inside the tip of many FILAMATIC nozzles, are different

screen/mesh sizes available?

A: Yes, the screens found in the tips of nozzles can be fabricated with 12x12, 18x18, or 24x24 mesh screen material. While the 12x12 mesh is typically used in the construction of a screen, as the surface tension of the liquid being filled decreases, a denser mesh (i. e. 18x18 or 24x24) may be required to prevent dripping at the tip of the nozzle.

Q: We have misplaced our parts manual and cannot determine the serial number of our FILAMATIC filler. What is the process for identifying and ordering a replacement volume control assembly?

A: The process begins with our forwarding to you a volume control identification chart. The chart shows a generic image of a volume control with a number of dimensions (e.g. mounting hole center distances, length/width of the volume control body) left blank. Once the indicated dimensions have been measured and recorded, and the completed chart has been returned to us, the volume control assembly's part number or the part numbers for any of its components can be determined.

Q: We want to run a new container on our existing FILAMATIC filling system that is equipped with a star wheel indexing mechanism. What information must be supplied to obtain a starwheel configured for the new container?

A: In general, a starwheel can be fabricated once National Instrument Company has been supplied with (1) the serial number and model designation of the existing FILAMATIC filling system, (2) a physical sample or an engineering drawing of the new container, (3) the direction of starwheel rotation in the existing filling system, and (4) the number of containers that are

National Instrument Company Celebrates Golden Anniversary

For more than fifty years, National Instrument Company has been a leader in designing and producing filling systems for the pharmaceutical, personal care, cosmetic, food, and chemical specialty industries.

In the 1970's, NIC pioneered the development of piston-filling systems that could accommodate a wider range of fluid types with greater accuracy and speed than previously possible. In addition to playing an integral role in the advancement of metering technology over the last half century, the company's ability to provide a range of customized solutions -- from tabletop filling systems to fully integrated production packages -- has earned it a reputation for customer service that is second to none.

To celebrate our Golden Anniversary, we will be presenting a series of articles that trace the company's history from its origins in the basement of the founder's home to its position today as one of the most reliable and innovative filling-systems manufacturing organizations in America.

As we look back on the last five decades, we want to thank all our customers, friends and the hundreds of talented engineers, fabricators, salespeople, managers and administrators who have helped make NIC, not simply a great company, but a great family as well.



The Beginning

Many companies talk about customer service, but National Instrument Company was actually founded because Sidney Rosen felt so strongly about it.

While working as a laboratory equipment salesman after World War II, one of the products he carried was a device that would dispense small quantities of water-thin materials at a fairly rapid rate. The devices sold well, but his clients began to complain about some operational deficiencies and asked Sidney if the design could be improved.

When he went back to the device's manufacturer and told them his customers were unhappy and had requested some design improvements, the company's management refused, saying they weren't interested in making any changes.

Sidney Rosen found himself in a tough situation. More and more of his customers kept asking for design improvements that would help the equipment meet their specific needs, but the manufacturer was adamant in its refusal to change the design. He had two choices -- tell his customers he couldn't give them what they needed, or somehow find a way to build the equipment to the specifications they asked for.

Recognizing that a company that didn't respond to its customers' needs

to be indexed after each filling cycle of the existing system.

was on the road to failure, Sidney resigned from his job and went into business for himself. He'd decided that he would never again allow a rigid, status quo supplier to jeopardize his livelihood. He committed himself to building dispensing machines designed to meet his customers' needs exactly.

By day, he made sales calls and deliveries, and handled the administrative details of his new venture. At night, in his mother-in-law's basement surrounded by boxes of custom-machined parts, he would assemble equipment based precisely on his customers' specifications. One of those early units -- a Model AB-5 bench-top filling system -- is still operational and on display in the lobby at NIC's Research and Development facility.

Sidney Rosen's commitment paid off and the business grew. He moved the operations out of his mother-in-law's basement into his own, larger one. But the company wasn't meant to be a basement operation for long. In 1968, Sidney bought property near his home and established National Instrument's headquarters in its present location on Fordleigh Road in the northwest corner of Baltimore City. From the original building, the company has expanded more than fourteen times, including the construction of facilities to house research and development, fabrication, a full machine shop, a warehouse and distribution center, and offices for more than 60 people.

In the Next Edition of FOCUS on FILAMATIC: A New Generation

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Do you have any comments or suggestions regarding this eNewsletter or a specific feature of FOCUS on FILAMATIC? Please forward any comments or suggestions to [Mark Bennett](#), or call 1-800-526-1301 extension 219.

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