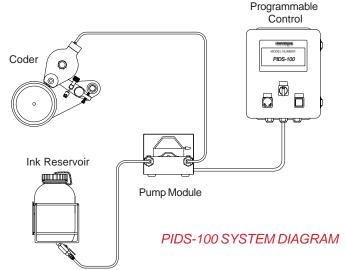


PIDS Programmable Ink Delivery System





Universal's Programmable Ink Delivery Systems were developed as an advanced method of supplying ink "ondemand" to all types of contact roll coding equipment. The PIDS systems combine the simplicity of electronic programming and the accuracy of peristaltic metering pumps to automatically deliver precise amounts of ink to the coders at prescribed intervals. This unique method of ink delivery greatly reduces inking system maintenance and ensures consistent high quality code printing. PIDS systems are available in one, two, three and four head models and can be electrically interfaced with parent equipment to further automate control of the ink delivery process.

The positive displacement peristaltic pump heads used in the PIDS systems move ink through progressive waves of contraction and relaxation of a resilient pump tube. Since ink never touches any of the pumps component parts, maintenance on the system is limited to replacing the pump tube after approximately 1,000 hours of operation. The unique design of the pump head and Universal's quick disconnect replacement pump tube assembly, facilitates pump tube changes in less than 10 seconds. There are no seals to leak, no valves to clog or wear and only one moving part - simplicity of design at its best!

The Coder Connection

The final challenge in the development of the PIDS System was to mate the ink delivery system with Universal's Non-Porous Coders. Again, targeting design simplicity, our project team discarded all previous design concepts in an effort to dramatically improve the level of existing technology.

The result of this effort is a unique wiper adapter for our top mounted, Non-Porous Coders. Ink from the PIDS System is injected through a miniature duck bill check valve between two very thin plastic membrane wipers which rest against the face of the ink roll. The wipers transform the ink into a very thin film which is then evenly spread across the entire face of the roll. This design provides instantaneous coder response, ensures uniform print density over the full print width of the coder and accomplishes all this with no moving parts!

In many cases, the purchase decision for a PIDS system can be justified on the basis of ink costs alone. Substantial savings can be achieved through the purchase of bulk ink and this can result in a return on investment in as little as 3 months in many applications.

Manufactured By

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