

By Jackie Schultz Board converters could spend decades debating the term high-end graphics. Is it defined by the number of colors, the intricacy of the image, or the ability to print solid colors cleanly? For Jim Johnson Jr., Vice President of Progress Container & Display in Winder, Ga., it's all of the above.

"There are three things that affect your graphics printing productivity. One is how well something stacks. You can only run as fast as you can stack. The other is how much scrap you have. If you have a lot of scrap you have to run a little slower. The third and No. 1 issue for probably everybody running graphics on corrugated is dirty plates. If they're dirty you run with bad quality or you stop the machine, and when you're stopped you're not making anything."

When it comes to higher-end graphics printing, Progress Container is no novice. About 40% of the sheet plant's product mix is high-end

graphics with an emphasis on delivering a finished product free of hickies, spots and imperfections.

To run the jobs clean with little downtime, the sheet plant retrofitted its eight-color Ward15000 66- x 113-inch rotary diecutter with a KleenPlate™ continuous automatic hickey removal system. JB Machinery launched KleenPlate in January after five years of development. Progress Container is the first installation.

JIM JOHNSON JR. AND SR.



PROGRESS'S PASSION FOR QUALITY PRINTING



INTENT ON DELIVERING CUSTOMERS THE HIGHEST QUALITY, PROGRESS CONTAINER BECAME THE FIRST INSTALLATION OF THE KLEENPLATE HICKEY REMOVAL SYSTEM, JB MACHINERY'S NEWEST INNOVATION.

IN 2000, PROGRESS CONTAINER RELOCATED TO A CUSTOM BUILT 170,000-SQ-FT FACILITY IN WINDER, GA.

"We've always been trying to find a way to run cleaner. We talked to Warren Bird (of JB Machinery) about it for probably two years and then we decided to be the first installation of the KleenPlate system," Johnson says. "We made the investment to enhance the productivity and the quality."

Designed specifically for flexographic printing applications, KleenPlate can be installed on virtually any rotary diecutter or flexo folder-gluer. Standard systems are available for machines ranging from 60 to 126 inches wide.

The system automatically traverses across the printing plate in synchronization with machine speed. During each pass, the lint-free cloth removes a precise laminar

film of ink from the plate after the ink has been transferred to the sheet. Ultimately, it increases production time and enhances quality, even while printing just one or two colors.

Immediate Results

Right from the start, Progress Container had a positive experience with KleenPlate. "We turned the machine on and ran a whole order (12,000) of solid red on mottled white. We had run it before and had to stop the machine quite a bit to clean the plates," Johnson says.

The plant had a similar experience on a four-color job which was notorious for hickeys and imperfections. "We ran for close to two hours without stopping, which was unheard of before, and then went to break," Johnson says. "Previously, we would come back from break, open the press, clean all the

plates completely, put the machine back together and start running. We came back from break, turned on the machine and started running. Then the operators took a 30-minute lunch, came back and turned on the machine and started running.

"If you take a five-hour span, that probably eliminated at least five washups and each one of those washups would have been 25 to 30 minutes long. It's a big issue," he added.

The press operators can set up, control and monitor the system through a user-friendly touch screen control. There are three cleaning modes:

- Continuous Wipe, the most common mode of operation. It continuously wipes the plate's surface using the slightest 'kiss' pressure.
- Interrupt Spot focuses on a specific area of the plate determined by the operator.
- Pressure Spot is used for the most persistent hickeys.

BELOW: THE EIGHT-COLOR ROTARY DIECUTTER WAS PURCHASED IN 1979 AND HAS BEEN UPGRADED EXTENSIVELY BY SUN AUTOMATION GROUP WITH ITS RAINBOWGRAPHICS AND SUNTRAC VACUUM TRANSFER SYSTEMS.



TOP: THE LINT-FREE CLOTH REMOVES A PRECISE LAMINAR FILM OF INK FROM THE PLATE AFTER THE INK HAS BEEN TRANSFERRED TO THE SHEET. ABOVE: THE PRESS OPERATORS CAN SET UP, CONTROL AND MONITOR THE SYSTEM THROUGH A USER-FRIENDLY TOUCH SCREEN CONTROL.



Progress Container

"If the operator sees that he has a problem spot, he can punch in that dimension and the head will sit there and wipe the plate harder," Johnson says. "Previously, we would have stopped the whole machine, opened up the print section and gone in and taken that hickey out."

Johnson admits that he was skeptical at first because the cloth touches the plate. "Everybody thinks it's got to pull the color off." But he consulted with McLean Packaging Corp. in Moorestown, N.J., which was a beta site for the system, and became convinced of its effectiveness.

The system does not affect machine speed. "We're running faster because the operators know the machine is going to keep running. They get in a rhythm," he says. "The crew gets the mentality, 'I'm not going to have to stop.' The mentality before was, 'Why turn this machine up top speed when I know in 20 or 30 minutes I'm going to have to turn it off?'"

As a result, productivity has increased. "The other day we had both rotary diecutters running at high speed and the whole scrap system shut down, which is unusual for us. What do you do, tell them to slow down? From a scheduling standpoint we might have to start thinking about those things because we don't want to overwhelm our scrap system, but you also don't want to slow your press down," he says.

He anticipates ROI for the system to be about five to nine months. "There are a lot of things you buy that you think are going to make you more

productive and are going to have a payback but you're not sure. This has a payback."

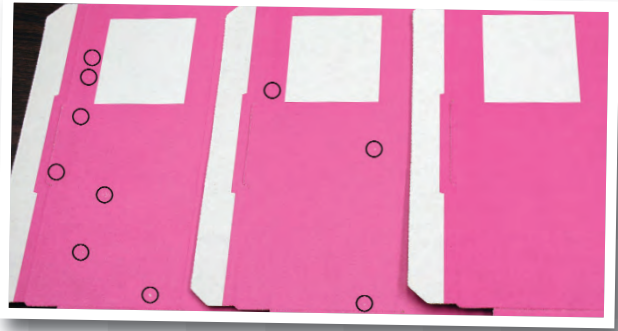
Market Driven

Progress Container's entry into the value-added printing market was gradual and often was prompted by customer need. "Everyone knew when the big box stores came along the demand was going to require the box industry to transform itself and meet their needs. Even before that there was some need for color," Jim Johnson Sr. says. "The biggest thing that drove us [to get into graphics] was to get out of the dog eat dog brown box situation."

Adds the younger Johnson: "We didn't create the graphics market in Georgia, but we wanted to be able to show our customers we could do what they needed to get their products into the retailers. We still want to be a viable brown box solution."

The sheet plant's eight-color Ward rotary diecutter was purchased in 1979 as a one-color machine. It has been upgraded extensively by Sun Automation Group with its RainbowGraphics and SunTrac vacuum transfer systems. The press also has a Sun Automation PrintPrep sheet cleaner.

"This is a very high tech machine. If we



THE KLEENPLATE SYSTEM SUCCESSFULLY REMOVED THE HICKEYS ON THIS PARTICULAR JOB.

need to run solids, that's some of the more difficult printing today and we're running it clean," the elder Johnson says, referencing the KleenPlate system. Each print station also has JB Machinery Interstation Flexo Dryers and a Final Flexo Dryer, which are almost maintenance free.

The press has three Pamarco 280 line screen anilox rolls and four rolls ranging from 500 to 700 line screen. The different line screens allow the plant to run a variety of jobs without changing the rolls.

The plant uses inks from Poteet Printing Systems and a combination of analog and digital printing plates.

In addition to the Ward diecutter, the plant has an HP digital printer; Automatän EM and FMC label laminators; a two-color United rotary diecutter (which is in the process of being upgraded to three-color); a two-color Langston Saturn flexo folder-gluer; a flatbed diecutter purchased last year through the Haire Group; a Post specialty folder-gluer; and a trim handling system from Hawthorne Systems. The company recently



placed an order for a new three-color Ward flexo folder-gluer. For production scheduling the plant uses HRMS computer software.

The company has two graphic designers and one structural designer who use Artios CAD software and a Kongsberg sample table. There are five sales representatives in addition to the vice president of sales.

'The Whole Package'

Jim Johnson Sr., along with several partners, founded Progress Container in 1971 in Lilburn, Ga. Jim Johnson Jr. joined his father in 1987 after working several years outside the corrugated industry as an accountant.

The company employs about 65 people and operates two shifts. Monthly capacity is about 20 million sq ft.

Consistent annual growth necessitated relocating in 2000 to the custom built 170,000-sq-ft facility in Winder. The elder Johnson says he took special care in planning the layout. "I spent six months to a year researching and looking at plant flow. We settled on what we wanted to do by looking at good and bad things people did. That was time well spent."

Bill Hammock, Vice President of Sales, adds that the new facility is an important selling tool. "Things have changed so much in how you sell. We pride ourselves on the presentation that our plant makes."

For many customers, Progress Container is a one-stop shop. In fact, the company's web site highlights the phrase, "The Whole Package," on its home page. The sheet plant not only manufactures the boxes, but it also fills and ships them. For instance, one customer has 15 facilities across the U.S. "We have really become for them a logistics solution because they don't have to worry about how their packaging is going to get to all of their facilities. They just send us the order and we take care of everything," the younger Johnson says.

It is this diversified approach to business that will help the company grow, he says. "It's being able to supply all of the solutions that our customers need, the brown box, the graphics and the logistics and warehousing. That's why we're still investing in our industrial mix and graphics capacity."

Looking back on the company's growth, Jim Johnson Sr. says Progress Container's growth is almost a cliché. "There are so many things that most of us say (about why they're successful), but they're so true. When you're very small the real difficulty that you have is getting quality people that will see some of the vision that you see, so you have a hard time putting a team together, but over time we did. I would say that right now our real strength is our people."