



GONE *to* PRINT

New end-of-line systems write a perfect script for the commercial printing giant

While the unforgiving competitive nature of global economy may not be every Canadian company's cup of tea, it's a safe bet that commercial printing heavyweight **Quebecor World Inc.** would be a proverbial fish-out-of-water without the rush and excitement of head-to-head global competition, and all the high-level corporate drama that it entails.

Started up in Montreal back 1954 as a one-press print-shop, the ambitious former upstart has grown in epic-sized leaps and bound over the years through a series of mergers and strategic investments—today ranking as one of the world's largest commercial printing groups, boasting leading market positions in most of North and South America, Asia and Europe.

With a 29,000-strong global workforce and annual sales over \$6 billion, the company's global reach and a vast production base of over 120 printing plants around the world have enabled it to position itself as the global leader in catalog production, printing and mailing, turning out more than six billion catalogs per year in North America alone.

Located in Toronto's west end, the company's **Quebecor World Islington** plant plays an important role in helping maintain that excellence in catalog production and distribution, contributing about \$80 million in yearly sales to clients across Canada and the U.S.

An imposing-looking behemoth of a plant, the 645,000-square-foot facility has undergone three major expansions over the years—in 1969, 1974 and 2006—to grow to its massive proportions and production capabilities, both a far cry from its 1954 origins as a photo-engraving and electroplating shop.

In addition to producing catalogs, the 400-plus-employee plant also specializes in retail flyer inserts, with an on-site bindery offering a full suite of binding, saddle stitching, polybagging and inkjetting services, as well as a 116,000-square-foot basement warehouse for paper storage.

"Out plant prints over 48,000 metric tonnes of paper and manufactures close to 100 million bound books per year," says general manager Dan Meloche.

"In fact, at full production, we usually produce in excess of 40 finished skids an hour."

"We print and finish catalogs and retail flyers for Canadian Tire, Sears Canada and Wal-Mart, and we handle the binding and distribution for the telephone directory books of Yellow Book USA, which is the oldest and largest yellow pages publisher in the U.S.," states Meloche.

According to Meloche, Quebecor World Islington is one of the company's more unique operations anywhere, thanks to its long-enduring commitment to the high-quality rotogravure printing process requires



A state-of-the-art PRTA-2200 conveyorized rotary-arm automatic stretchwrapping machine makes quick work of securing a load of catalogs at the end-of-the-line packaging area of the Quebecor World Islington plant in west-end Toronto.



Applying 12,000 pounds of hydraulic compression force to a palletized load of printed materials, the CTS 602-10 strapping machine secures a pair of plastic straps to the load before turning it 90 degrees for cross-strapping.

a fairly involved and time-consuming engraving of an image onto a copper cylinder—making it economically feasible mostly for the sort of long-run print jobs done at this plant.

"As the Quebecor World Islington facility is the only commercial gravure printer in Canada, we have an edge over offset when it comes to quality," notes Meloche, revealing that the plant operates two 90- and two 70-inch-wide-web presses manufactured by **Motter Printing Press Company**, now a part of the German-based **KBA** group, to deliver outstanding reproduction quality. "A large part of our



Dan Meloche, General Manager, Quebecor World Islington.

success here in Islington has been our focus on quality and continuous improvement," explains Meloche.

This focus extends into all aspects of operations outside of the printing process itself, Meloche adds, citing a major investment last year in the plant's end-of-line packaging area.

"We bought a pair of palletizers, a strapping machine and a stretchwrapper," Meloche told **Canadian Packaging** on a recent visit to the plant, "and all these pieces have really made our job a lot easier."

The two floor-level model **FL510** palletizers from **Columbia Machine, Inc.** do a great job of forming tight, square and stable loads at high-speed rates, according to Meloche.

They're also equally adept at handling both the wood pallets—used for outbound shipments—and the plastic ones used for conducting internal operations.

Different products have different requirements, Meloche explains, meaning many variations in how they must be polybagged, bundled, strapped, skidded, etc., to form tight bundles that are ready to be shrink-wrapped and, eventually, stretchwrapped.

"The palletizers are very good at taking bundles of catalogs or flyers from the line and stacking them on a skid," says Meloche, praising their operational versatility, "and we really liked how Columbia was very thorough in testing the machine for our specifications—even taking the time to ship our product to their West Coast plant to ensure the product would run flawlessly."

The palletized loads travel along an automatic packaging line conveyor system to the new **CTS 602-10** strapper—supplied by the Whitby, Ont.-based **EAM-**



One of two Columbia Machine FL510 floor-level palletizers takes bundles of printed materials and neatly stacks them on a pallet.

Mosca (Canada) Ltd.—headquartered in Whitby, Ont.—which was specifically designed for applications in high-volume commercial printing environments.

“In our industry, the name Mosca is well-known for providing a very reliable and tough piece of equipment,” states Meloche.

Operated by a cool-running 20-hp (horsepower) motor with a 50-gallon tank, the *CTS* has 12,000 pounds of hydraulic compression force that makes a quick job of ensuring a very stable load, as well reliable operation of the platen and internal turntable.

The dual-column, heavy-duty steel frame’s top-mounted compression platen uses a pair of all-electric **KSR** strapping heads on a 24-inch center to create fast-feeding, high-strap tensioning, with the system’s standard automatic load-height memory used to prevent uneven compression during cross-strapping.

The bundled loads ultimately make their way to one of the two stretchwrapping stations: an older *350-A* model installed 11 years ago by **Signode Packaging Systems**, used primarily for retail products; or along the main line to the brand new model *PRTA-2200* stretchwrapper that is currently used for wrapping countless loads of directories and **Sears** product catalogs.

“Wrapping is the last process before shipping,” mentions Meloche. “Whatever goes out our doors is wrapped—anything from product going to the client or for shipping it to another Quebecor shop for finishing.

“We stretchwrap it to maintain the integrity of the product during transportation.”

Manufactured by St. Laurent, Que.-based machine-builder **Phoenix-Innotech Inc.**—and installed by Toronto-based **Universal Packaging**, an equipment distributor of **CAPS (Can Am Packaging Systems)**—the *PRTA-2200* is a top-of-the-line, conveyORIZED rotary-arm automatic stretchwrap machine that was in fact specifically fine-tuned and adjusted for working in complete harmony with Mosca’s *CTS* strapper, Meloche reveals.



A Siemens Simatic OP7 programmable logic controller ensures optimal control and efficiency on the Mosca strapping machine.

Designed for stand-alone operation or as part of an inline production system, the *PRTA-2200* can easily handle between 60 and 80 loads per hour with standard rotation speeds up to 25-rpm (revolutions per minute), and boasts unique design features such as the heavy-duty ring-bearing arm support system—built on the same principles used for building army tanks, construction cranes and foundry equipment.

“I must say that the Mosca and Phoenix machines are pieces of equipment that started up without any trouble and just ran with it,” states Meloche.

“Since we bought them, we have not experienced a single negative issue with either one of them.

“They both possess the ease-of-operation that truly puts all of our operators at ease,” says Meloche, complimenting the Mississauga, Ont.-based system integrators **Wecon Services Ltd.** for ensuring seamless and trouble-free interoperability between the strapper and

the new stretchwrapper.

“Commercial printing is a very competitive business today,” Meloche sums up, “but with far fewer larger printers around now than 10 years ago, it’s nice to know we are the ones who got some of the most state-of-the-art equipment to help us get the job done on-time, and to ensure that we can get it to the client safely.” □

For more information on:

Columbia Machine, Inc.	460
EAM-Mosca (Canada) Ltd.	461
Signode Packaging Systems	462
Phoenix-Innotech Inc.	463
Wecon Services Ltd.	464
Siemens Canada Limited	465
CAPS (Can Am Packaging Systems)	466
Universal Packaging	467