CANADIAN PACKAGING

www.canadianpackaging.com

SERVING CANADA'S PACKAGING COMMUNITY SINCE 1947

Rafiq Mustin, Sr. Sales Specialist, **Schneider Electric**

Luc Richard, Business Development Manager, **Schneider Electric**

Felix Elent, VP, Operations, **Maxpark Inc.**

Serge Michaud, Plant Engineer, **Steam Whistle Brewing**

CASE IN POINT



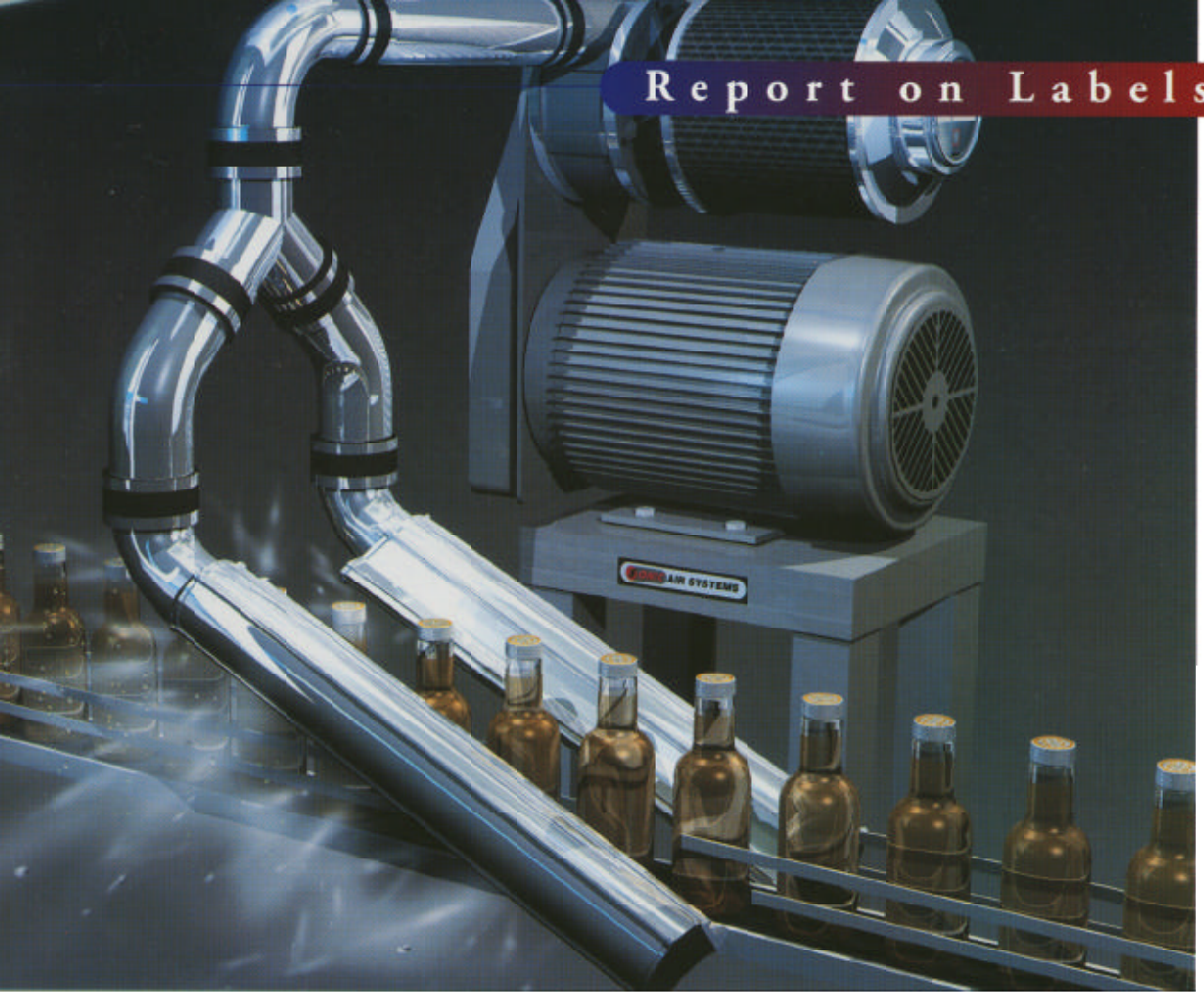
Robotic case-packers help feisty brewer to race full steam ahead with packaging line upgrades

Story on page 21

DOCTOR FEELGOOD

Page 14

IN THIS ISSUE: PHARMA-PACK *NOW* • METAL DETECTION • AUTOMATE *NOW*





BONE DRY BOTTLE BENEFITS

Sophisticated drying system allows co-packager to achieve desired labeling efficiencies without any aggravations



Special to Canadian Packaging

IF CLOTHES MAKE the man, then a jacket can certainly make the bottle. The full body jacket enclosing the *AriZona Iced Tea* bottle is a case in point. Its vibrant, southwestern colors and graphics wrap up what Fortune magazine called one of the top products of 1993 and what is now the third-largest share brand in supermarkets.

Suiting up this bottle for success was a joint project for *AriZona Iced Tea* and New Wave Beverage of Mississauga, Ont. In addition to *AriZona* products, this co-packager bottles 17 different bottle sizes from 8 oz. to 36 oz.

AriZona Iced Tea and New Wave Beverage were the first North American beverage maker and bottler to go on-line with the unusual sleeve label, and the project posed a unique challenge. "The bottle has to be bone dry or the label will disform itself," says Rick Page, New Wave vice-president of operations. "Even one drop of water will cause a problem," AriZona Iced Tea invested in an electrical monitoring device at New Wave to measure bottle radiuses and thereby detect wrinkling on labels. With the *AriZona Iced Tea* labels, it was working overtime.

"Our rejected bottle rate was running about four percent or 11,500 bottles per day," remembers Page. "Since it would cost more to remove the label and send the bottle back through the system, we discarded those bottles. These are very expensive labels, and wrinkling was costing approximately $566 per day. We needed a way to reduce loss and achieve absolute drying."

The heat shrinkable poly sleeve that slides over the *AriZona Iced Tea* bottle is produced by Fuji, N.A., and it is 100 per cent printed, complete with ink-jet coding. After the bottle is sleeved, it passes through a shrinkwrap tunnel (Intersleave of Denmark) at 250 bottles per minute, and a full wraparound neck label is applied over the cap and bottleneck area.

Prior to the drying process, the 20 fl. oz. (591 mL) glass bottle is filled, pasteurized and washed. As the bottle enters the drying area, the conveyor chain is lubricated. In the past, New Wave Beverage has washed down the chain, but with the need for absolutely dry *AriZona Iced Tea* bottles, it procured a self-lubricating chain manufactured by Delrin.

To resolve the drying dilemma and to meet line speed goals of 450 to 525 bottles per minute, *AriZona Iced Tea* agreed to fund a sophisticated drying system, and New Wave contacted R.E. Morrison Equipment Co. in Mississauga a distributor of Sonic Air Systems drying components.

R.E. Morrison evaluated the level of drying needed in relation to required line speeds. It advised installation of a 7.5 hp Sonic SAS-700 single stage centrifugal air blower and four Sonic XE Airknives. Sonic distributor Ray Ralph consulted with Bob Burgess, New Wave plant manager, regarding placement and adjustment of the airknives for maximum drying efficiency. One 12-in. airknife is used to dry the cap and crown. Two 24-inch airknives are directed to the cap, neck and body of the bottle. A fourth airknife was placed underneath the conveyor to dry the bottom of the bottle, a crucial step for sleeve adherence. The airknife positioning, combined with high-velocity air impact and the rise in air temperature from the centrifugal blower's heat of compression, fulfilled the *AriZona Iced Tea* "bone dry" bottle requirement.

"The Sonic equipment allowed us to put a good package together," remarks Page. "It reduced our loss of these very expensive labels and also reduced the time spent for drying the bottles."

With soaring demand for *AriZona Iced Tea*, New Wave installed a second Sonic Air system at its Mississauga facility last fall. Working together, *AriZona Iced Tea* and New Wave resolved a tricky labeling problem in a timely, innovative fashion geared for maximum production and minimum product shrinkage.

Reprinted with permission from Canadian Packaging©, December 1997. Printed in Canada.