

Going for variety

By Tara Marion

Plastics molders use different molding techniques, such as injection molding and blow molding, to form a variety of products – from recreational toys to functional parts and accessories.

Liquid plastic is injected into two halves of a mold in the injection-molding process, explained Al McKeown, president of **W-L Molding Co.** in Portage. After a curing time, the plastic solidifies. The mold is opened, and a finished part is ejected.

Blow molding is a process commonly used when parts are hollow in design, according to Ron Leo, research-and-development manager at **Crocker Ltd.** in Three Rivers.

It is similar to injection molding except that the liquid plastic enters the mold vertically in a hollow tube. The mold closes and compressed air blows the liquid plastic, which forces it to conform to the inside shape of the mold.

More to do with equipment than products and materials, the latest technology in injection molding and blow molding is driven by programmable logic controllers, which are automated control hubs.

McKeown said that W-L Molding is replacing its old hydraulic presses with high-tech electric ones. The PLCs control precision and speed for repeatability between press runs.

“On the hydraulic side, it used to take a little longer, and you didn’t always get an exact process like you do now,” he explained. “The electronic is much more exacting.”

Hydraulics are far from obsolete though according to Leo, who said Servo hydraulics are the latest technology in blow molding. Hydraulic—oil—pressure is created by a high-pressure pump.

“The Servo hydraulics direct this pressure to control all of the movements of the machine,” he explained. “The Servo compares actual positions to desired positions through various sensors and makes the corrections as needed.”

Crocker produces a variety of products that are hollow in design, such as containers, fuel-tanks, point-of-purchase display parts and automotive duct work. Founded in 1973, it boasts a number of small customers and a handful of larger ones such as **Atwood Marine** in Lowell, **Camoplast** in Quebec and **DCI** in Milwaukee.

In 1981, Crocker expanded its molding facilities by opening a molding operation in Centreville. Three years later, a machine tool facility was built in Centreville for mold and fixture building, maintenance and repair.

Another molding operation was opened in Coldwater in 1995. Between the tool shop and three plants, Crocker employees approximately 200 to 250 employees.

Though McKeown declined to identify W-L Molding’s customers by name, he did say the company produces a variety of injection-molded products for companies worldwide. It produces copier components for the electronics industry, thermostat covers for the HVAC industry and nylon rollers for the furniture industry, among other items.

W-L Molding employs approximately 150 workers and runs three shifts five days a week, McKeown said. It is privately held and owned by George Laure, who started the company in 1945.

“Plastics were unheard of back in the ‘40s,” McKeown explained. “He was probably one of the first injection molders in southwestern Michigan. I think his closest competition was in Chicago at the time.”