

# Minster Gap Presses Take on Heavy Stamping Jobs at Ariens Company

With complete confidence based on ten years experience with Minster presses, Ariens Company, Brillion, Wisc., selected Minster Series G2 Gap Presses for the increased capacity needed to blank or form mower parts from 22 down to 7 gauge steel.

Because the parts are extremely bulky, Ariens needed the advantage of greater accessibility to the dies that gap presses have over straight side presses. The solution was a 250 ton capacity Minster Gap Press with twin main-drive at both ends of the crankshaft to eliminate torsional deflection found in presses driven from only one end.

Other features of the press include helical gears, 7-1/2" main bearings and 11-1/4" connecting bearings. The bed and slide area are 84" x 42", with a 16" stroke and 30" shutheight. For this application, the press is equipped with two 19 ton die cushions. Press speed is 28 SPM.

Ariens bought this G2-250, adding to their line already including 150 ton and 100 ton Minster G2 presses to meet the trend toward bigger riding mowers—and bigger parts. At the same time, the Company has revised its policy of stamping smaller parts and welding them to-

gether and is now producing larger—and fewer—parts in an effort to reduce unit costs.

Elmer Carpenter, Vice President of Manufacturing, credits Minster presses for much of the manufacturing efficiencies the Company has achieved. "Minsters allow us to take full advantage of our tool design and engineering skills in producing a complicated part in the most economical manner on the press," he explains. "We design the part to the very maximum specifications of the press."

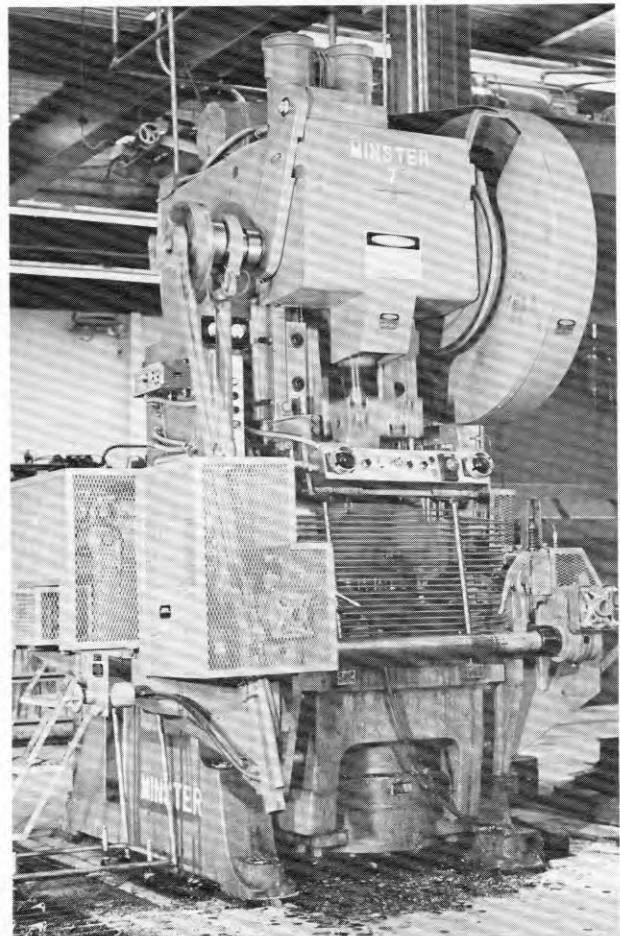
"In addition," continued Mr. Carpenter, "we make dies that will do a number of operations simultaneously instead of in separate operations. These may be progressive or multiple dies—or even compound die work. Out of this has come a growth of our company around Minster."

Ariens began using Minster presses ten years ago and consider them to be the very best available. They have had other presses and have experienced a first hand comparison.

When asked why he preferred Minsters, Kenneth Schneider, Supervisor of Tool Engineering, replied, "Be-



Minster G2-250 gap press is driven from both ends of the crankshaft to eliminate torsional deflection found in presses driven only from one end.



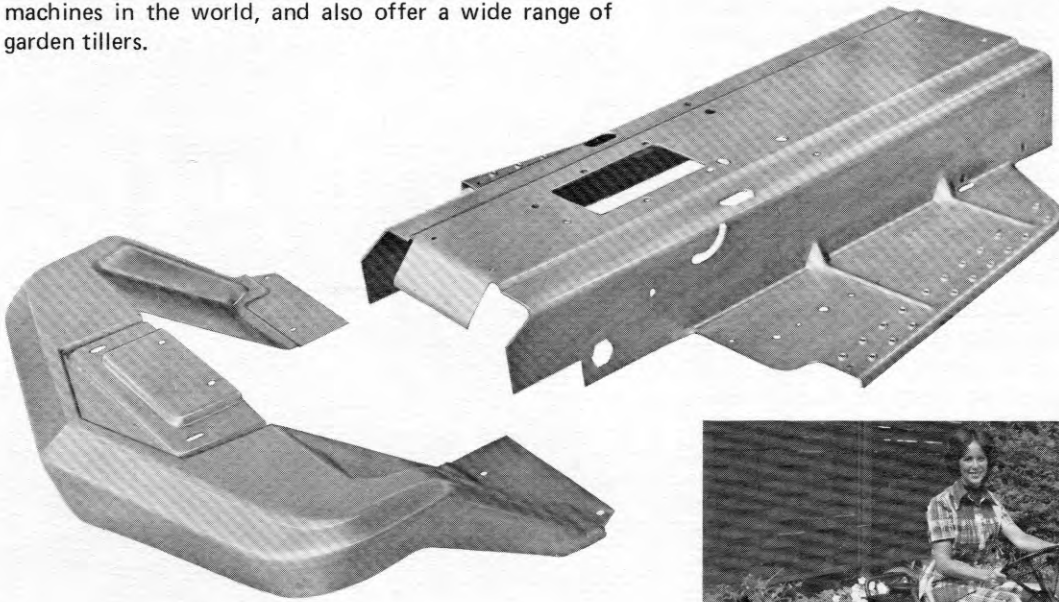
Minster No. 7 O.B.I. press is set up with a double roll feed for automatic production.

cause when you start them up, they're practically maintenance free. You just don't have downtime like you do with other presses. It's as simple as this: downtime on a press means no production. And you can't afford **no production.**"

Ariens is a major manufacturer in the outdoor power equipment industry. Their product line includes two series of riding lawn mowers—the Emperor and the Fairway—and a complete line of lawn and garden tractors. They are probably the largest producer of snow throwing machines in the world, and also offer a wide range of garden tillers.

Almost totally self-contained in forming parts, Ariens buys only such components as the engine, tires and wheel assemblies from outside sources. The largest Minster gap press is used to stamp parts for the basic frame of the riding mowers.

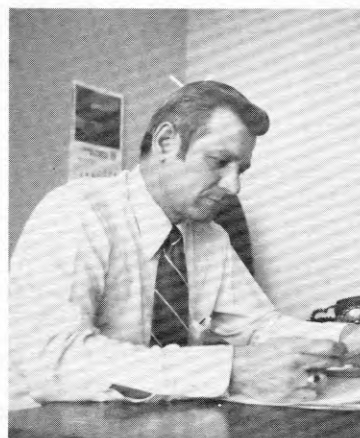
Since installing the first two gap presses, Ariens has bought a third of this type. The company has seven other Minsters, including a No. 7 O.B.I. and a No. 6 Die-Namic, quick die change process, press.



Mower parts are blanked and formed on Minster G2-250.



John Van Lanen (left) of Ariens Tool & Die Department talks over recent part stamping with Kenneth Schneider, Supervisor of Tool Engineering.



Elmer Carpenter, Vice President of Manufacturing at Ariens.