

**Industry:** Automotive Supplier  
**Application:** Broaching  
**Material(s):** Hard Alloy Steel  
**Product(s):** VBU Wringer with Chip-Tote® Conveyor Infeed

## Application Profile

### BorgWarner

#### Situation

- BorgWarner in Muncie, IN produced helical gears for transmissions from a hard alloy steel utilizing high-viscosity (320 SSU) lubricant. They were experiencing heavy oil carryout costs and the resulting high disposal costs from contaminated chips.

#### Mayfran Solution

- Mayfran provided a VBU wringer with a Chip-Tote infeed conveyor, with the output from the wringer collected in a chip bin.

#### Key Features

- The continuous operation of the VBU wringer allowed BorgWarner to recover 40 gallons of oil per shift and process over 6 tons of steel per week.

#### Customer Benefits

- BorgWarner estimated their daily savings at close to \$500 / day due strictly to the reduced cutting oil consumption; additional disposal cost savings were realized.

#### Outcome

- The rapid return on investment (less than a year) encouraged BorgWarner to install a second similar system.

