# **APPLICATION SOLUTION:** Injection Molding-Hot Runner



Product Family: Electric Product Used: IMA Integrated Motor Actuators Product Type: Standard

Application Requirements: Stroke: Various Speed: Various Thrust: Various

## **Application Description:**

Hot runner injection molding machine.

### **Challenge:**

An injection molding OEM was struggling with long lead times from their existing electric actuator supplier. The OEM needed to replace the existing electric actuators with a configurable solution to fit into their variety of molding machines, yet could still be delivered at quick lead times to meet build and delivery schedules. The OEM considered reverting to hydraulic or pneumatic solutions due to these problems. These fluid power solutions, however, were less efficient, required increased maintenance, and were susceptible to leaks around the mold area.

### **Tolomatic Solution:**

After working with Tolomatic to define application requirements, the IMA platform was chosen as an easily configurable solution which served as a drop in replacement replacing the previous electric actuator design. A key benefit for the OEM was to easily configure Tolomatic solutions at designed stroke length and options they needed for each machine design. Additionally, these configurated actuators were delivered with a quick lead time, enabling them to meet delivery schedules. The integrated design of the IMA allowed for a compact machine design while the planetary roller screw increased actuator life with minimal maintenance. The electric actuation solution provided by Tolomatic ensured that the OEM was not at risk of hydraulic leaks in the mold area.

### **Customer Benefit:**

- · Industry best lead times on roller screw actuators
- Increased reliability of equipment and reduced maintenance
- · Eliminated concerns of hydraulic fluid leaks
- Configurable design and options allowing for flexibility with changing machine designs