

**Mold  
Masters®**

**E-Multi®**



**THE MOST VERSATILE, ALL ELECTRIC  
SERVO DRIVEN, AUXILIARY INJECTION UNIT**

CONSUMER GOODS



MEDICAL



ELECTRONICS



PERSONAL CARE



CAPS & CLOSURES



THIN WALL PACKAGING



PET (DRINK BOTTLES/PREFORMS)



AUTOMOTIVE



# OPEN THE DOOR TO PRECISION MULTI-SHOT APPLICATIONS

Easily and economically convert any existing Injection Molding Machine to allow multi-shot capabilities. The successful E-Multi platform offers proven precision, repeatability, versatility and reliability. Compatible with a wide range of thermoplastic and LSR materials, E-Multi is ideal for a wide range of applications across any industry.

## KEY FEATURES

### SERVO DRIVEN

- High precision, fast, repeatable and reliable performance.
- Suitable for high tolerance applications.
- Program up to 10 injection profiles and holding pressures.
- Statistical process and production tracking.

### VERSATILE MOUNTING OPTIONS

- Vertical, horizontal and custom mounting options.
- Can adapt to many requirements.
- Various feeding options available.

### COMPACT DESIGN

- Preserves valuable floor space.
- Save up to 100ft<sup>2</sup> (9.3m<sup>2</sup>) of space compared to alternatives.
- Vertical installations virtually eliminate any footprint.

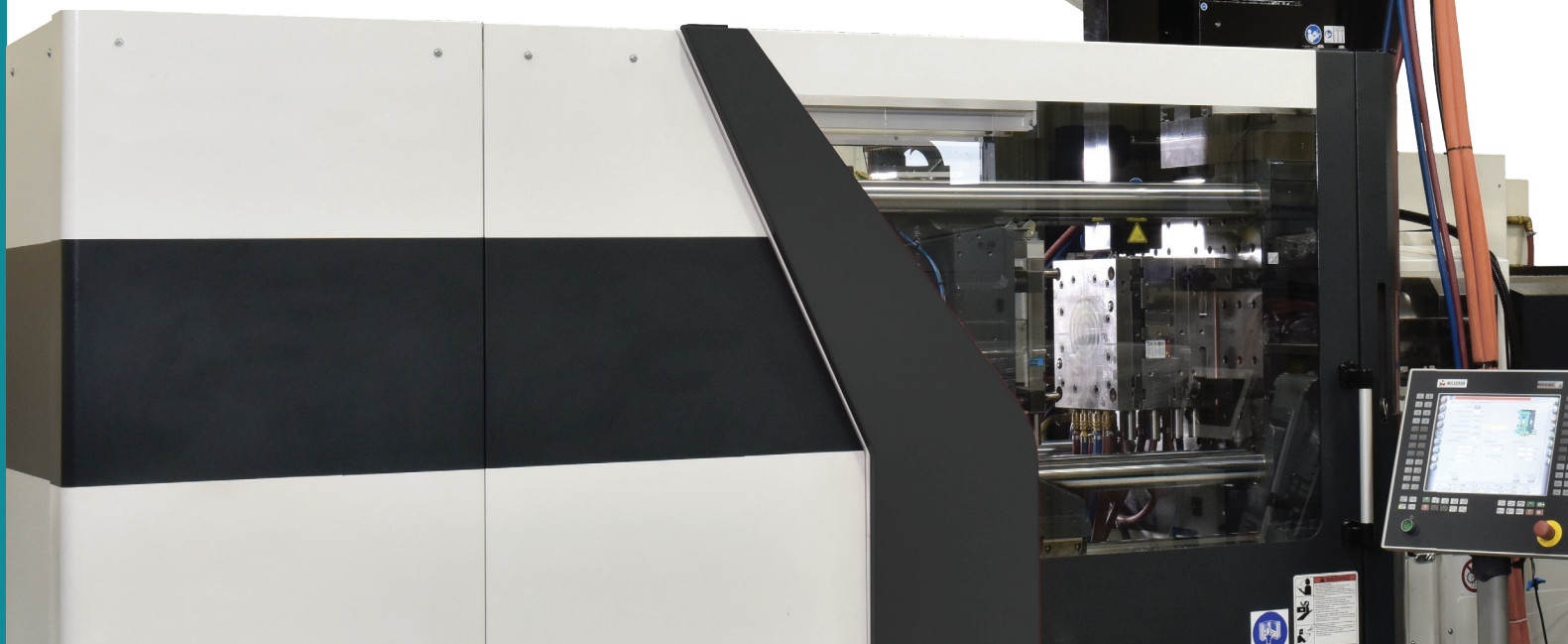
### UNIVERSAL COMPATIBILITY

- Can be installed on ANY Injection Molding Machine.
- Seamless operation via IMM interface.
- Integrate robotic interface.

### ALL ELECTRIC

- Energy efficient.
- Viable for clean room applications.
- Minimal maintenance requirements.

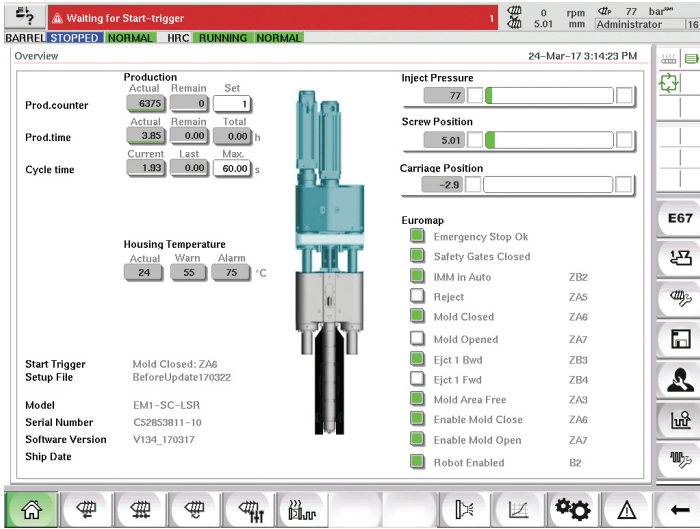
Full range of horizontal or vertical mounting options available



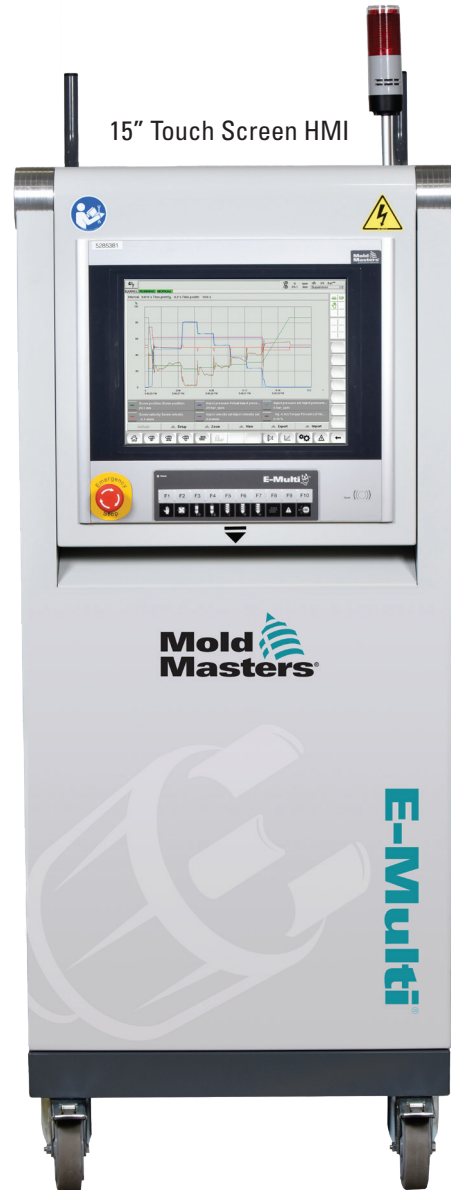
# EXPANDABLE MULTI-FUNCTION CONTROLS

Easily integrate additional functionality into your E-Multi controller. Centralize your molding process, eliminate unnecessary equipment and save valuable floor space.

- TempMaster Hot Runner Temperature Control
- Valve Gate Control
- E-Drive Synchro Plate Control
- Rotary Table Control
- M-Ax Auxiliary Servo Control



Intuitive touch screen process controls



# INTEGRATED COMMUNICATIONS



Injection Molding Machine

\*E12/SPI Adapter Available

Auxiliary



Produce consistent high quality multi-colored and multi-material parts

# SPECIFICATIONS

| Model Number            | EMI-15              | EMI-30      | EMI-30-SR   | EM2-30      | EM3-200     | EM3-250     | EM4-550     | EM5-1400      |
|-------------------------|---------------------|-------------|-------------|-------------|-------------|-------------|-------------|---------------|
| Screw Diameter          | mm 14               | 16          | 18          | 18          | 20          | 20          | 22          | 25            |
|                         | in 0.55             | 0.63        | 0.71        | 0.71        | 0.79        | 0.79        | 0.87        | 0.98          |
| Injection Pressure      | bar 2000            | 1530        | 1210        | 1530        | 810         | 1530        | 1280        | 2510          |
|                         | psi 29,000          | 22,200      | 17,500      | 22,200      | 11,700      | 22,200      | 18,600      | 36,400        |
| Injection Stroke        | mm 50               | 100         | 100         | 100         | 150         | 200         | 29,000      | 22,200        |
|                         | in 2.0              | 3.9         | 3.9         | 3.9         | 5.9         | 7.9         | 11.4        | 8.7           |
| Shot Volume             | cc 7.7              | 10.1        | 12.7        | 20.1        | 26.4        | 36.0        | 31.8        | 30.3          |
|                         | oz PS 0.26          | 0.34        | 0.43        | 0.68        | 0.96        | 1.28        | 1.08        | 1.33          |
| Shot Weight             | lb. 0.02            | 0.02        | 0.03        | 0.04        | 0.05        | 0.08        | 0.07        | 0.08          |
| Max. Screw Speed        | r/min 600           | 600         | 600         | 600         | 600         | 600         | 600         | 600           |
| Max. Screw Torque       | Nm 80               | 80          | 80          | 80          | 80          | 80          | 140         | 200           |
|                         | lbf 20              | 18          | 16          | 24          | 21          | 18          | 23          | 29            |
| Screw Length            | L/D 20              | 18          | 16          | 24          | 21          | 18          | 23          | 29            |
| Max. Injection Velocity | m/min 180 / 380     | 180 / 380   | 180 / 380   | 180 / 380   | 180 / 380   | 180 / 380   | 180 / 380   | 180 / 380     |
|                         | ft/s 7.1 / 14.2     | 7.1 / 14.2  | 7.1 / 14.2  | 7.1 / 14.2  | 5.1 / 10.2  | 5.1 / 10.2  | 5.5 / 14.2  | 7.1 / 14.8    |
| Max. Injection Rate     | cc/s 28 / 55        | 36 / 72     | 46 / 92     | 36 / 72     | 46 / 92     | 57 / 113    | 68 / 137    | 88 / 177      |
|                         | oz PS/s 0.95 / 1.98 | 1.22 / 2.43 | 1.56 / 3.11 | 1.22 / 2.43 | 1.56 / 3.11 | 1.93 / 3.82 | 2.30 / 4.63 | 2.88 / 5.99   |
| Nozzle Touch Force      | lbf 10              | 10          | 10          | 30          | 17          | 25          | 25          | 25            |
|                         | N 4.4               | 4.4         | 4.4         | 13.3        | 7.6         | 11.0        | 11.0        | 11.0          |
| Total Length            | mm 1290             | 1340        | 1440        | 1440        | 1,995       | 2,095       | 2,450       | 3,145 / 3,222 |
|                         | in 50.8             | 52.8        | 56.7        | 56.7        | 78.6        | 80.5        | 96.0        | 124 / 127     |
| Overall Width           | mm 390              | 390         | 390         | 440         | 490         | 490         | 650         | 800           |
|                         | in 15.4             | 15.4        | 15.4        | 17.3        | 19.3        | 19.3        | 26.0        | 31.0          |
| Overall Height          | mm 400              | 400         | 400         | 450         | 510         | 510         | 610         | 695           |
|                         | in 15.7             | 15.7        | 15.7        | 17.7        | 20.1        | 20.1        | 24          | 27            |
| Weight                  | kg 190              | 205         | 205         | 320         | 525 / 555   | 570         | 1,300       | 2100 / 2230   |
|                         | lbs 420             | 450         | 450         | 710         | 1200 / 1225 | 1,300       | 1,880       | 4620 / 4910   |
| Nozzle Stroke           | mm 100              | 100         | 100         | 100         | 100         | 100         | 100         | 300           |

Notes: 1. Standard Speed / High Speed Option  
 2. Shot Weight & Volume based on Polypropylene  
 3. Recommended utilization can vary between 25% to 75% of the shot volume in this specification, subject to material processed & application review  
 4. E109 ver. 1.1 24 volts DC or E112 or SP/AN-18 Versions 3 in refracting at max of 240°C or 0 volts DC  
 5. Electrical: Incoming power 400/480 Volt, other voltages upon request

Due to continuous improvement, All specifications subject to change without notice  
 Customizable & Specialty Material Solutions Available  
 Other Configurations available

## STANDARD PACKAGE (EM1-EM4)

| INJECTION UNIT   | CONTROLLER  |
|--|---|
| <ul style="list-style-type: none"> <li>General purpose plastizing screw</li> <li>Material feed tube or hopper</li> <li>Oil fill kit</li> <li>Lifting kit</li> </ul>  | <ul style="list-style-type: none"> <li>15" touch screen interface</li> <li>(2) RFID access cards (operator/supervisor)</li> <li>Machine interface cable (E67)</li> <li>4m power cable (3-phase) 400V/460V</li> <li>7m servo drive cable to E-Multi</li> <li>Remote diagnostics package</li> <li>(2) valve gate control</li> </ul> |
| OPTIONS  | OPTIONS   |
| <ul style="list-style-type: none"> <li>Servo carriage (for sprue break)</li> <li>LSR capability</li> <li>Compact horizontal mount stand</li> <li>Specialty screws</li> <li>Nozzle extensions (heated/unheated)</li> <li>Shut-off nozzles</li> <li>Mold mounting plate</li> <li>Material feed vibrate tube</li> </ul> | <ul style="list-style-type: none"> <li>36-zone TempMaster HR control (max)</li> <li>12 valve gate control (max)</li> <li>TempMaster M-Ax auxiliary servo, E-Drive rotary table and index platen controls</li> <li>E67-&gt;SP/E12 robot IMM interface adapter</li> </ul>   |
| ON-SITE START-UP SUPPORT AND TRAINING  |   |

## STANDARD PACKAGE (EM5)

| INJECTION UNIT  | CONTROLLER  |
|---|---|
| <ul style="list-style-type: none"> <li>General purpose plastizing screw</li> <li>Servo carriage (for sprue break)</li> <li>Material feed tube or hopper</li> <li>Oil fill kit</li> <li>Lifting kit</li> </ul> | <ul style="list-style-type: none"> <li>15" touch screen interface</li> <li>(2) RFID access cards (operator/supervisor)</li> <li>Machine interface cable (E67)</li> <li>4m power cable (3-phase) 400V/460V</li> <li>7m servo drive cable to E-Multi</li> <li>Remote diagnostics package</li> <li>(2) valve gate control</li> </ul> |
| OPTIONS   | OPTIONS   |
| <ul style="list-style-type: none"> <li>Robust horizontal mount stand</li> <li>Specialty screws</li> <li>Nozzle extensions (heated/unheated)</li> <li>Shut-off nozzles</li> <li>Mold mounting plate</li> </ul> | <ul style="list-style-type: none"> <li>36-zone TempMaster HR control (max)</li> <li>12 valve gate control (max)</li> <li>TempMaster M-Ax auxiliary servo, E-Drive rotary table and index platen controls</li> <li>E67-&gt;SP/E12 robot IMM interface adapter</li> </ul>   |
| ON-SITE START-UP SUPPORT AND TRAINING   |   |