Monoblock Filler/Capper for Liquids, Creams or Powders

The ESS Technologies, Inc. Monoblock Filler/Capper incorporates the latest technology to create a high speed system for filling and capping containers with liquids, creams or powders. Model MB120 offers a servo filling system that fills and closes up to 120 bottles per minute. The servo Model MB60 fills up to 60 bottles per minute. A large, full color touch screen provides an operator interface to adjust the servo controls for the diverging nozzles as well as the pump fill rates. This allows the machine to perform profile filling for irregular shaped bottles.

Mechanical filling systems may be specified for lower filling speeds or systems that require intrinsically safe controls. The mechanical, single pitch MB60M also fills up to 60 bottles per minute. Intrinsically safe controls may be integrated to create a system for filling flammable liquids such as nail polish, fragrance, or any solution that may be combustible. The system can also be ordered to fill powders.

The Monoblock Filler/Capper is ergonomically designed, and may offer cost-effective tubular construction or a true stainless steel balcony design for ease of inspection and maintenance, and quick size changeover. Fill times may be independent of the starwheel to allow for various fluid fill rates, and the starwheel is mechanically driven with a precision zero-backlash indexer. Size changeover is easy and quick, usually less than 15 minutes. The stainless steel exterior and hard-anodized aluminum inner frame allow for ease of cleaning. Standard machine guarding is constructed of aluminum profile with polycarbonate panels to ensure safe operating conditions.

ESS also offers a new compact and cost-effective Mini Monoblock, the model MB25, which fills up to 60 bottles per minute and is available in dual or single pitch. Contact ESS for more information about the MB25 Mini Monoblock.
Technical Specifications

<table>
<thead>
<tr>
<th>Model</th>
<th>MB120</th>
<th>MB60</th>
<th>MB60M</th>
<th>MB60-XP*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Filling Speed</td>
<td>Up to 120 bpm**</td>
<td>Up to 60 bpm**</td>
<td>Up to 60 bpm**</td>
<td>60+ bpm**</td>
</tr>
<tr>
<td>Pitch</td>
<td>Dual</td>
<td>Single</td>
<td>Single</td>
<td>Depends on Speed</td>
</tr>
<tr>
<td>Drive &amp; Fill Systems</td>
<td>Servo</td>
<td>Servo</td>
<td>Mechanical</td>
<td>Mechanical</td>
</tr>
<tr>
<td>System Controls</td>
<td>Touch Screen</td>
<td>Touch Screen</td>
<td>Touch Screen</td>
<td>LED Display</td>
</tr>
<tr>
<td>Product Types</td>
<td>Creams, Powders, Non-flammable Liquids</td>
<td>Creams, Powders, Non-flammable Liquids</td>
<td>Creams, Powders, Non-flammable Liquids</td>
<td>Flammable Liquids Only</td>
</tr>
<tr>
<td>Standard Voltages</td>
<td>208V, 240V, 480V, 3-Phase, 60Hz</td>
<td>208V, 240V, 480V, 3-Phase, 60Hz</td>
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</tr>
</tbody>
</table>

Bottle Size & Fill Range

<table>
<thead>
<tr>
<th>Model</th>
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<th>MB60</th>
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</tr>
</thead>
<tbody>
<tr>
<td>**Round: 1-4” H x 0.25-3” Dia., Irregular Shape: 1-4” H x 0.25-2” L x 0.25-2” W</td>
<td>1-500ml</td>
<td></td>
<td></td>
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</tbody>
</table>

* Model MB60-XP includes intrinsically safe controls for filling flammable liquids.
**Actual filling speed depends on the application. Contact ESS Technologies for more information.

Options

- Liquid or Powder Filling Systems
- Plug/Stopper/Brush Inserter
- Custom Cap or Pump Placement
- Positive Shut Off Nozzles
- Soft Reject System w/ Conveyor
- Batch or Process Filling
- Feedback Loop from Check-weigher for Automated Fill Level Adjustment
- Integrated Nitrogen Purge System

Filling Systems Available

- Volumetric Pumps with Ball Valve
- Volumetric Pumps with Rotary Valve
- Rotary Pumps
- Peristaltic Pumps
- Piston Fillers for Cream Products
- Powder Fillers
- Stainless Steel or Ceramic
- Option for Independent Pump Controls

Typical Layout for Starwheel Fill (Contact ESS for In-Line Fill Layout)

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