The results of four generations of accomplishments and new technologies - J-ADS

Providing the maximum safety to all of our customers

**AD Strong**
- **Clamping Unit**: Lightweight high rigidity, low vibrations
- **Injection Unit**: Longer mold life, Reduced grease use for cleaner machine, Clamping force feedback, Reduction in mold maintenance costs

**AD Stable**
- **Injection Unit**: New designed energy saving barrel, New proposals for screw technologies, Stabilization of molded parts, JSW original recovery functions, Wide selection of injection unit to customer needs

**AD Smart**
- **Controller**: Function enrichment with simple operation, Simple display of process parameters, Molding condition memo, I/O customized function

**AD Support**
- **Energy-saving/maintenance**: Energy-saving function, Power consumption monitor, Supporting reduction in power consumption, Both predictive and preventive maintenance

*Hydraulic unit is optional*
**AD Strong**

**Clamping Device**
- Lightweight high rigidity, low vibrations
- Longer mold life
- Reduced grease usage for cleaner operation
- Promoting proprietary manufacturing
- Flat press platen Chapter 2

**Friendly to Molds**
- Clamping force monitoring
- Clamping force feedback
- Reduction of mold maintenance costs
- Monitoring both mold open and close, and ejection process

**Mold Protection**
- Simple auto setting
- Adjusts with mold temperature variations
- Molding-open monitoring, ejector monitoring

**Rigid clamping device manufactured utilizing JSW’s expertise in materials technologies. Produced from raw materials, is effective in assuring stable production.**

<table>
<thead>
<tr>
<th>Mold Height Min. – Max.</th>
<th>J220ADS</th>
<th>J280ADS</th>
<th>J350ADS</th>
<th>J450ADS</th>
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</thead>
</table>

<table>
<thead>
<tr>
<th>Tie Bar Distance (H x V)</th>
<th>J220ADS</th>
<th>J280ADS</th>
<th>J350ADS</th>
<th>J450ADS</th>
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</thead>
<tbody>
<tr>
<td>650×590</td>
<td>730×630</td>
<td>810×730</td>
<td>900×810</td>
<td></td>
</tr>
</tbody>
</table>

(Unit: mm)
The high precision measuring control and the screw variation response to every molding

Stabilization of molding component
Original measuring technology

Injection Unit
—JSW proprietary development
New designed energy saving barrel
Reduced running cost, Shorter heat-up time

Stabilization of molding component
Original measuring technology

Wide module selection in response to the needs

<table>
<thead>
<tr>
<th>Injection unit</th>
<th>Screw diameter (mm)</th>
<th>Injection pressure (MPa)</th>
<th>Max. injection speed (mm/s)</th>
<th>Max. injection speed (mm/s)</th>
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</thead>
<tbody>
<tr>
<td>J220ADS</td>
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<td>J450ADS</td>
<td>1400H</td>
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<td></td>
<td>2300H</td>
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<td>92</td>
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</table>
**Enriched advanced function-mounted new controller SYSCOM 5000i**

**Function enrichment by a simple operation**

- Large 15” display utilizing energy savings LED technology
- Improvement for visibility by expanding the setting screen
- Agile multi-touch operation
- Simple operation lever switch
- On screen instruction manual

**Screen layout shows process sequence in each operation on mode.**

**Easy to understand operation process display**

**With further convenient functions**

- Molding condition memo: Together with the molding conditions, the caution memo in molding and setting of the peripheral systems, and the image of molding components are able to be saved.
- Maintenance memo: The history of the molding machine maintenance is able to record on the controller. The periodical inspection items and the execution history can be checked on the controller.
- I/O customized function: I/O signals can be designed on screen.

- **Molding condition memo**
  1. Mold opening completed
  2. Take-out instruction to the ejector
  3. Take-out from the ejector, and receives the completed pulse signal
  4. Clamping start 3-sec. operation of the belt conveyor
Energy-saving performance

Reduction support for power consumption
Assistance for molding condition change to reduce power consumption

Comparison of the power consumption amount
- Hydraulic machine: 100 standards

<table>
<thead>
<tr>
<th>Machine</th>
<th>Status</th>
<th>Cycle</th>
<th>Power</th>
<th>Graph</th>
<th>Action</th>
<th>History</th>
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Guiding the adjustment points
Switches to the relevant setting screen by the Jump button

Support for maintenance

Periodical inspection
The periodical inspection items and the execution history can be checked on the controller.

Prediction maintenance
Condition monitor of ball screws based on the operating load.

Molding support

Molding support function
Molding guide from mounting mold to initial set up of molding conditions to corrective measures

Enriched Hiroshima injection R&D center

Hiroshima injection R&D center
Injection R&D center has newest machines to support customer’s trial test of molds, material, molding process and etc.

Injection school
In preparation for a training lecture by JSW experienced staff. Multiple levels of training are available.