



# AUTOMATED STICKY WAX ASSEMBLY SYSTEM

FOR JOB-SHOP FOUNDRIES

**MPI SA20-12-02** 

MPI model SA20-12 was designed for commercial foundries where there is a low-volume, high-part diversity and those with high-changeover demands. This new adaptable system eliminates the need for a unique hot knife and gripper which allows the robot to dip each part in sticky wax and weld them with the same degree of accuracy, orientation, and precision as our standard APAS.



# **MPI SA20-12-02 Series**

## **AUTOMATED STICKY WAX ASSEMBLY SYSTEM FOR JOB-SHOP FOUNDRIES**

The Model SA20-12 was designed for commercial foundries where there is a low-volume, high-part diversity and those with high changeover demands. Previously, a unique hot knife, gripper, and runner was required for each part making it impractical for lower-volume, high-changeover jobs. This new adaptable system eliminates the need for a special hot knife and gripper allows the robot to dip each part in sticky wax and weld them with the same degree of accuracy, orientation, and precision as our standard APAS. The flexibility of the gripper allows it to pick up many distinct types of parts.

## **SA20-12 ADVANTAGES**

- Smaller profile and footprint than standard APAS
- Precision, high-yield, low scrap
- Fast, versatile, high-changeover solution
- Parts can be changed with a simple programming change
- Priced significantly lower than standard APAS
- Additional tooling requires no additional investment

## AUTOMATE YOUR WAY TO INCREASED PROFITABILITY

Automation has proven time and again that a robotics-based machine outperforms manually created assemblies in accuracy, repeatability and efficiency.



### **OUR AUTOMATION PARTNERS EXPERIENCE:**

- Perfect assemblies 100% of the time
- Cycle times 2-5x faster
- Increase casting yields 10-30%
- Reduced scrap by an average of 50%
- Fragile assemblies are no problem
- Round-the-clock productivity
- Relentless quality and consistency

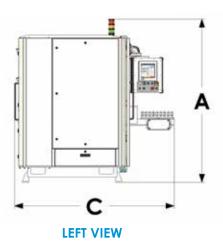
### STICKY WAX WELDING ADVANTANGES

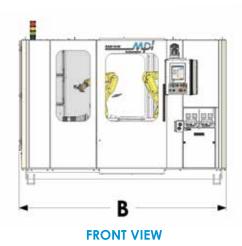
- Fast
- Lower Cost
- Perfect Welds
- Universal Robot Tooling
- Perfect for Commercial Foundries
- No Rework Required



ASK ABOUT OUR FREE WAX-ROOM EVALUATION AND ROI ANALYSIS!









**SINGLE BAR RUNNER** 

	US (60Hz)	METRIC (50Hz)
A. Overall Height	89 in	2250 mm
B. Overall Width	112 in	2846 mm
C. Overall Depth	87 in	2197 mm
Electric Standard	240V, 60Hz, 1ph	220V, 50Hz, 1ph
Air Requirement	6 CFM @ 90 psi	170 1/min @ 6.2 bar
Machine Weight	4500 lb	2042 kg

**Notes:** When reviewing a specific runner assembly, it must meet all of the above specifications to fit into the machine. Optional equipment may alter the machines overall dimensions, weight, and power requirements. Contact MPI sales department for additional information. We reserve the right to change specifications without notice.

## **NEW TRY BEFORE YOU BUY PROGRAM**

We believe in this new machine so much that we are launching our NEW Try Before You Buy Program. This program will allow you to experience the benefits of the Automated Sticky Wax Assembly machine firsthand using your own parts – we will even ship a machine to you to trial at your facility before you place your order. Here is how it works:



- STEP 1: Model Verification Send us your part, runner, and assembly models for expert verification.
- **STEP 2:** Testing Phase Send a quantity of parts for testing or provide a die for injection. Test with your runners or weld parts to MPI runners.
- STEP 3: Visit MPI Systems Witness the efficiency of the Automated Sticky Wax Assembly machine in action at our state-of-the-art facility in the beautiful Hudson Valley of NY.
- STEP 4: Optional Trial at Your Site We'll ship a machine to your site, at your cost, for a 45-day "try before you buy" trial.

Participate in our program to test the machine in your production environment, evaluate its compatibility, efficiency, and impact on your operations. To learn more about the Try Before You Buy Program, contact our sales team today and revolutionize your assembly line!



## EXPERIENCE THE DIFFERENCE

MPI is the worldwide leader in wax-room and ceramic core equipment and the acknowledged leader in wax-room innovations. MPI has developed and introduced more systems and products than all its competitors combined and offers wax-room solutions that can't be found anywhere else.



## WAX INJECTORS

MPI's wax and ceramic injection machines are the most sophisticated in the industry and generate higher casting yields, more patterns per hour, reduced scrap, and increased productivity. They're also the most reliable in the industry, which means higher system availability, lower maintenance costs, and better performance.

## **AUTOMATION**

MPI is at the forefront of automation, having automated some of the most complex processes in the investment casting industry for well over a decade. MPI's automated injection and assembly cells provide the capability to make and assemble wax patterns from the simplest commercial parts to complex patterns required by the medical and aerospace industries, including single crystal turbine blades. MPI can automate a single process or implement full-scale automation for your facility.



## MPI TECHNOLOGY CENTER

MPI is at its best when it can innovate. MPI prides itself at being able to look at problems and then customize solutions that help clients achieve their goals. The MPI Technology Center is a state-of-the-art wax room that allows MPI to do just that. Located at MPI's world headquarters in New York, the Technology Center is a hub of innovation, ingenuity, and problem solving. Customers and suppliers visit this sophisticated facility to discover new ways to solve their unique wax-room challenges and to experience a totally automated facility in full operation.

## **MPI EXCELS**

Most important, return on investment (ROI) is where MPI excels. MPI supports its customers' bottom line with creative, customized products and services that fit their evolving needs. Through collaboration, we innovate, design, build, and integrate solutions that deliver measurable results.

