

THE ADVANTAGES



Reduced programming time:

Quickly automate most processes without the need for advanced programming skills.



Easy to install and use:

The intuitive interface allows even inexperienced operators to create complex programs in just a few steps.



Versatile and adaptable:

The operator can easily configure the cell elements and define robot instructions according to the specific requirements of the application.



Accessibility without compromise:

The system offers the ease of programming often sought in cobots, without compromising the performance and robustness of industrial robots, as well as the integration of external axes.



Precision and reliability:

Thanks to calibration and collision detection, it ensures accurate and safe paths, improving process quality.



Advanced external axis management:

The software manages robot linear tracks and positioners, including lathes, tilting lathes, and rotary table systems.



100% hardware-independent:

Compatible with different tracking devices and major robot brands.



SHOWROOM & LABORATORY

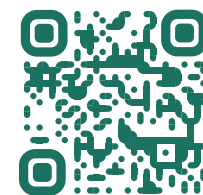
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INDUSTRIAL ROBOTICS GROUP

Want to learn more about Marvin?
Watch our free online tutorial

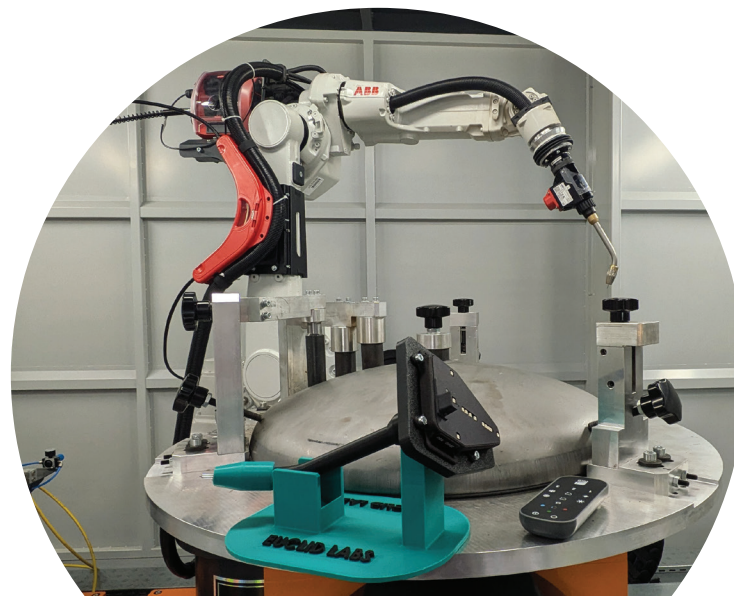


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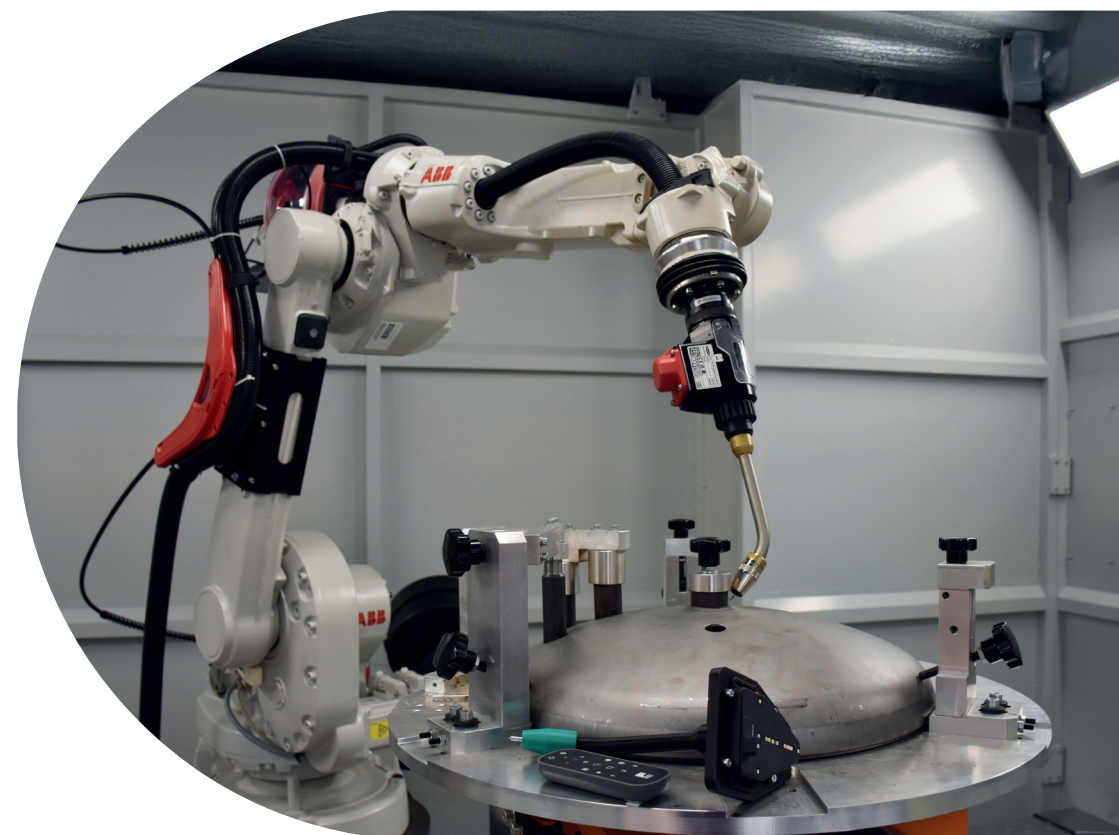
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SOFTWARE FOR FAST ROBOT PROGRAMMING



WHAT IS MARVIN

Marvin is the fastest and most efficient way to program industrial robots without writing code.

Marvin is an **offline software solution designed for the rapid programming of industrial robots**. It is intended for manufacturing professionals, such as welders, polishers, painters, and skilled operators, who perform production tasks but do not have advanced knowledge of robot programming.

With Marvin, operators can manually teach a trajectory and **generate a robot program in just a few minutes**. The software allows the acquisition of individual points, ideal for welding applications, or continuous trajectories, including the execution speed required for processes such as painting, polishing, and dispensing.

Marvin generates programs **compatible with all major robot brands**, including ABB, FANUC, KUKA, Yaskawa Motoman, Epson, Kawasaki, Hyundai, OTC, Cloos, and many others.

The software also supports the management of external axes, which can be controlled either through direct acquisition during the teaching phase, with asynchronous motion safely managed by a PLC, or by configuring and editing each point directly within the software, assigning specific values to every position.

Marvin supports a wide range of **external axes**, including robot linear tracks and positioners such as **lathes, tilting lathes, and rotary table systems**. This enables one station to be loaded or unloaded while the other remains in operation, maximizing productivity and optimizing the overall production cycle.

WHAT CAN I DO WITH MARVIN

Marvin can be used in a wide range of applications:



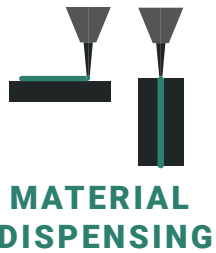
WELDING



DEBURRING



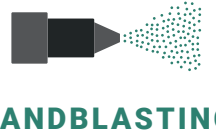
PAINTING



MATERIAL DISPENSING



POLISHING

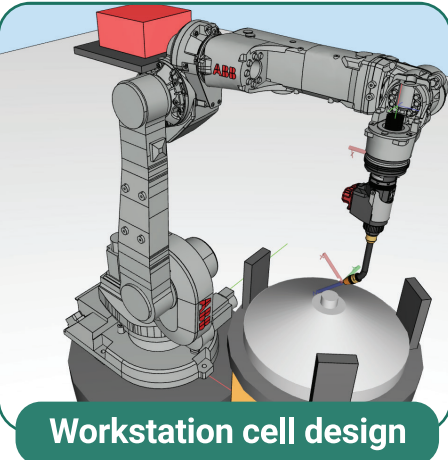


SANDBLASTING

HOW TO PROGRAM WITH MARVIN

Step 1

Prepare the project:
The software interface allows you to recreate and simulate the entire workcell, including the robot, tools, workbench, and external axes, with collision detection available for all cell components.
If CAD models for certain components are not available, Marvin enables you to quickly create simplified geometry directly within the interface, eliminating the need for dedicated CAD software.
For trajectory acquisition, the CAD model of the workpiece is not required, as the teaching process is performed directly on the physical part.
At this stage, you can also define subroutines and routines, such as switching a welding torch on and off, as well as customize specific commands for each customer, tailoring the robot program to their application requirements.



Workstation cell design



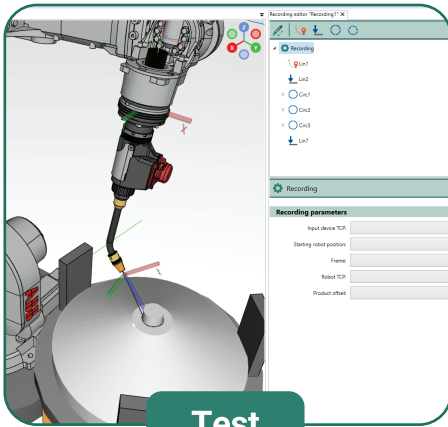
Start

Step 2

Record the process trajectory:
Marvin acquires the position of a physical replica of the process tool in real time. The replica, produced using 3D printing and equipped with a tracking system, accurately reproduces the actual tool used in the manufacturing process.
The same replica is faithfully represented within the software's 3D environment, allowing the operator to visualize the tool's movement and simulate the process inside a virtual workcell.
Trajectory acquisition can be performed either in continuous mode or point-by-point, depending on the application requirements. The hardware package is modular and adaptable to different processes, with the option of being installed directly on the production machine or on a dedicated teaching station.
Once the trajectory has been acquired, it can be visualized, edited, and validated within the 3D environment. The operator can modify recorded points, optimize the path, and adjust both motion and process parameters directly from the software



Record

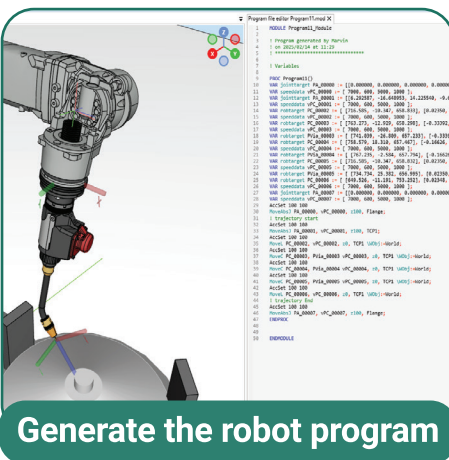


Test

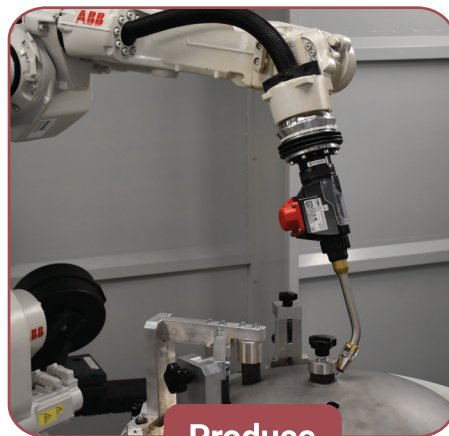
interface before the robot program is generated automatically.

Step 3

Generate the robot program:
Marvin converts the points acquired during the 3D trajectory acquisition into a robot program, ensuring that the path is reachable and free from collisions between the robot, the tool, and the surrounding environment.
The generated program can be transferred directly to the robot (where supported) or loaded manually via USB. Once uploaded, it behaves like any standard robot program and can be edited and verified directly from the robot teach pendant.



Generate the robot program



Produce