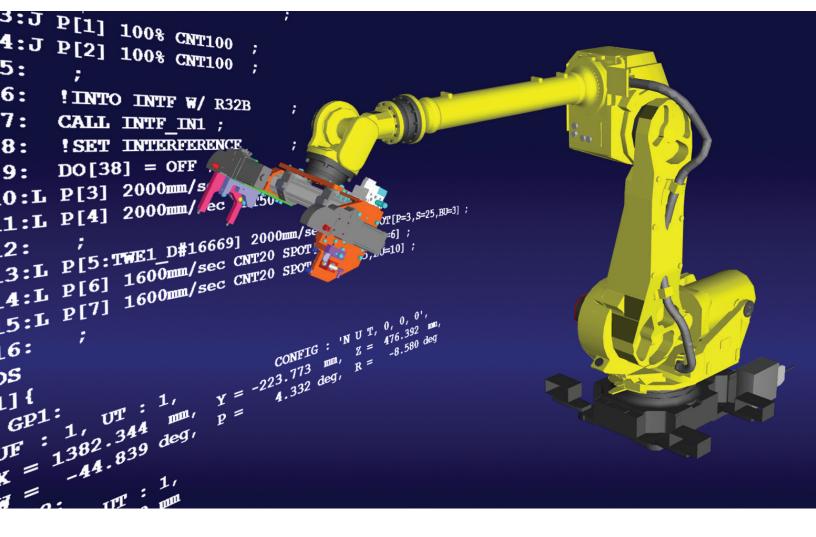
# **ROBOTICS PROGRAMMER**

**3D**EXPERIENCE MANUFACTURING & PRODUCTION ROLE



SIMULATE, IMPORT AND EXPORT ROBOT PROGRAMS Robotics Programmer provides a 3D environment to create, program, simulate and validate an entire robot workcell.

Robotics Programmer provides an intuitive interface to position resources, program and debug motion trajectories, and establish input and output connections between robot controllers and other devices. Production robot programs are able to be imported and exported. For robotic applications that require the highest degree of accuracy in their robot trajectories, advanced workcell calibration capabilities improve the accuracy of the translated program. Advanced robotics applications, such as the use of workpiece positioner axis and fixed tool center point devices, are supported in this comprehensive offline programming solution.

Robot programmers can choose from an extensive library of robot and controller models, from all major industrial robot manufacturers. Auto-placement and workspace envelope tools help them position the robot in a reachable position and benefit from early feasibility studies.

#### Early discovery and resolution of Design for Manufacturing (DFM) issues

Robot task feasibility studies can be performed early in the planning and detailing stages, reducing the cost of rework generated by product and tooling changes.

#### Concurrent robot simulation

Robot programmers can concurrently create and validate individual robot tasks in a single workcell, assembly line, or across an entire factory. As each user completes their work, the robot task details become available to all stakeholders and are incorporated into the parent process so that multiple users concurrently incorporate the collective work into their own work.

## Improved collaboration between robot programmers and designers

Based on the **3D**EXPERIENCE® platform, collaboration is supported throughout the extended enterprise. Powerful lifecycle and change management capabilities streamline the business process and improve the overall quality of work.





Create, program, simulate and validate a robot workcell

## Create, simulate and validate robot tasks in the manufacturing context

Robot programmers can create and validate robot tasks in a variety of manufacturing contexts. This helps in understanding how motion variables will impact task definition.

#### Delivery of validated and fine-tuned robot programs to the shop floor

Programmers can deliver validated programs to the shop floor for execution. They can also upload existing robot production programs from the robot controller to the 3DEXPERIENCE platform for validation and editing.

#### **Role Highlights**

- Groundbreaking **3D**EXPERIENCE platform
- · Rapid station layout
- Intuitive robot teach pendent-like user experience
- Support for advanced logic, and input and output in device programs
- Accurate process cycle time analysis
- Translate programs from 8 robot manufacturers
- · Customizable translators using VB.net
- Calibration tools align virtual and physical workcells

## Our **3D**EXPERIENCE Platform powers our brand applications, serving 12 industries, and provides a rich portfolio of industry solution experiences.

Dassault Systèmes, the 3DEXPERIENCE Company, provides business and people with virtual universes to imagine sustainable innovations. Its world-leading solutions transform the way products are designed, produced, and supported. Dassault Systèmes' collaborative solutions foster social innovation, expanding possibilities for the virtual world to improve the real world. The group brings value to over 190,000 customers of all sizes in all industries in more than 140 countries. For more information, visit www.3ds.com.





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