GIZELIS
BOSCHERT GIZELIS

ROBOBEND

Robobend option is a flexible system which enables the Press Brake to work as a Robotic cell or as an ordinary press brake with an operator.

RoboBending or Manual Bending
all in one

G-TURBOBEND +ROBOBEND
Option

About

The ROBOBEND® feature by Gizelis SA is a versatile system that allows a press brake to function either as a fully automated robotic bending cell or as a conventional manual press brake, providing flexibility in metal forming operations.

HYBRID OPERATION: ROBOBEND® can be integrated into any of Gizelis's hydraulic press brakes, enabling seamless switching between robotic and manual bending modes.

COMPACT DESIGN: The system features a linear track installed directly on the press brake, allowing the robot to move along the entire working length and park when not in use, ensuring unobstructed space for manual operations.

INTEGRATED SAFETY SYSTEMS: Safety mechanisms are incorporated for both robotic and manual operations, complying with EU regulations to ensure operator safety.

OFFLINE PROGRAMMING SOFTWARE: The system includes software for offline programming of both the robot and the press brake, facilitating efficient preparation without the need to manage multiple numerical controls.

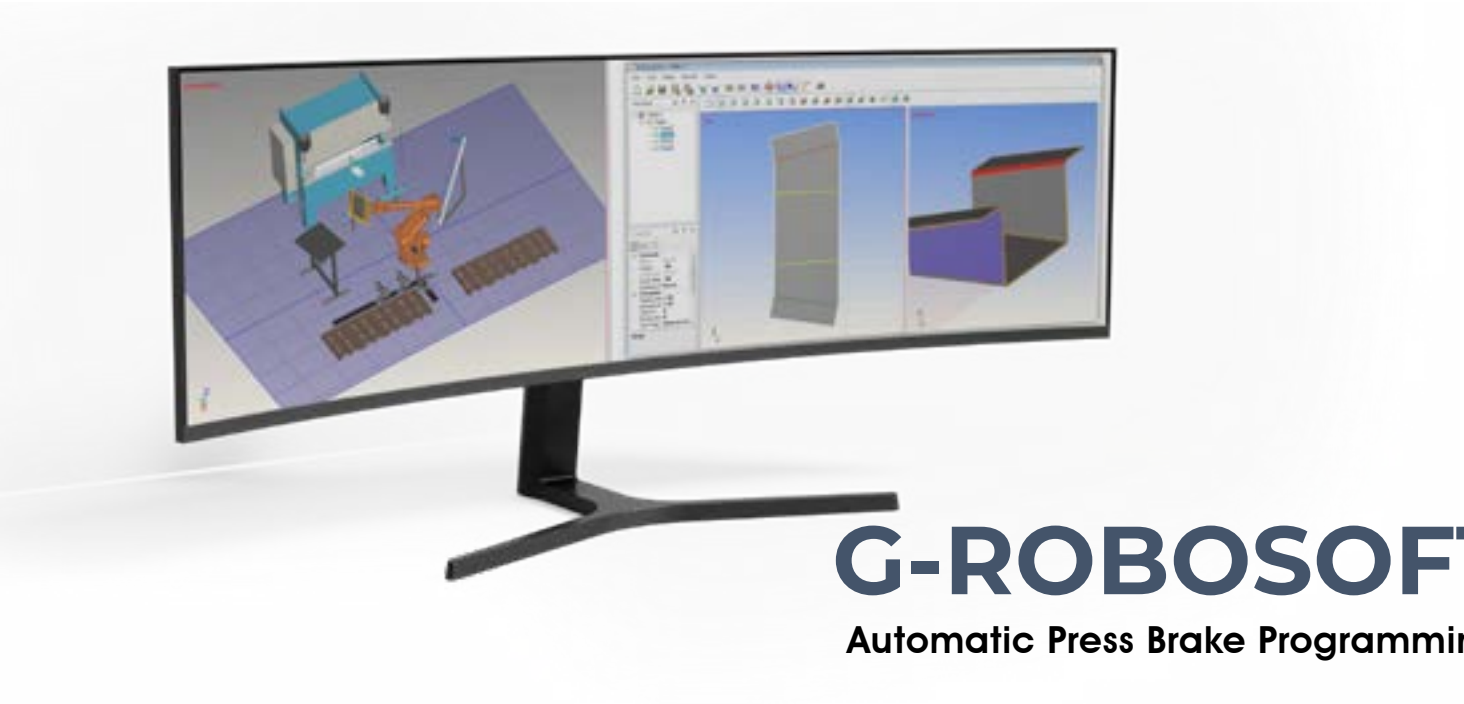
G-BEND PLUS 2080 +ROBOBEND
Option

Operational Modes:

ROBOTIC BENDING: Ideal for large production runs, the press brake operates as a fully automated robotic cell, capable of working multiple shifts without an operator, achieving maximum working speed beyond standard CE regulations.

MANUAL BENDING: For smaller batches or diverse profiles, the robot parks at the side, allowing manual operation with full access to the bending length. Laser safety systems are activated to comply with CE regulations during manual use.

OFFLINE SOFTWARE



G-ROBOSOFT

Automatic Press Brake Programming

Complete Software solution for Bending Cell Simulation & Programming

Defining Cell Components
When defining cell components, G-ROBOSOFT allows you to choose a variety of compulsory and optional elements.

Setting Up the Robotic Bending Cell
G-ROBOSOFT bending cell setup starts by configuring each robotic cell component.

Robotic Bending Solution
G-ROBOSOFT provides a complete robotic bending solution.

Stacking
G-ROBOSOFT offers many options for stacking bent parts on the out-pallet.

Time Estimation
G-ROBOSOFT estimates the production time.

Generating NC
G-ROBOSOFT generates NC code both for the robot and for the press brake.

Calibrating a Bending Cell
G-ROBOSOFT uses a true-to-life representation for bending cell calibration.

Press brake Programming

- 3D and 2D import and unfolding for standard formats
- Automatic and manual tool selection based on part properties and user preferences
- Automatic sequence calculation with collision avoidance and search strategies

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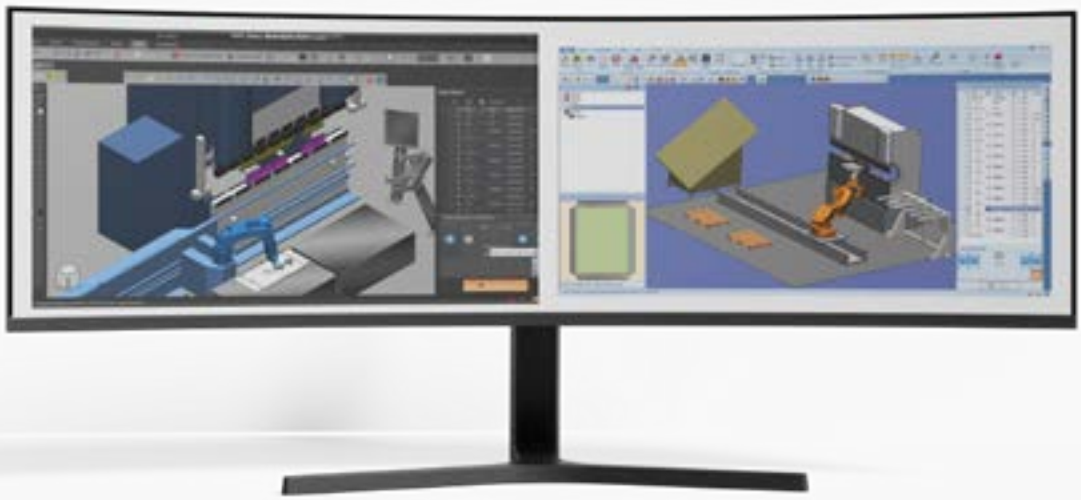
Robot Programming

- Fully automatic gripping and trajectory calculations
- Manual gripping and trajectory adjustments with a graphical user-interface
- Fast and easy patented cell calibration
- Generation of coordinated programs for both brake and robot, guaranteeing synchronized movements
- Press brake programming independent of cell
- Rapid cell programming for small runs
- Can be used to solve very small parts or huge parts with a variety of grippers.

Versatile stacking definitions

- Automatic Part Stacking
- Part placement rotated around any axis
- Definition of Odd-Even layers
- Offsetting layers
- Defining stacking “units” based on several parts



Main advantages for End User

- ✓ Programming at the same time robot and press-brake, without having to learn or manage multiple Numerical Control.
- ✓ Reduced time and no production stops during programming and cell configuration. Increase and maintaining quality and performance standard.
- ✓ Make profitable production of small batches.
- ✓ Optimal Bending Sequence: bend order and press-brake tooling more suitable for robot, minimizing movement and the number of re-grip.
- ✓ The suggested bending process data can be modified and tested using complete 3D simulation, drastically reducing bending-cell downtime.

Contact Us

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