MACHINE TABLE MAGNETX

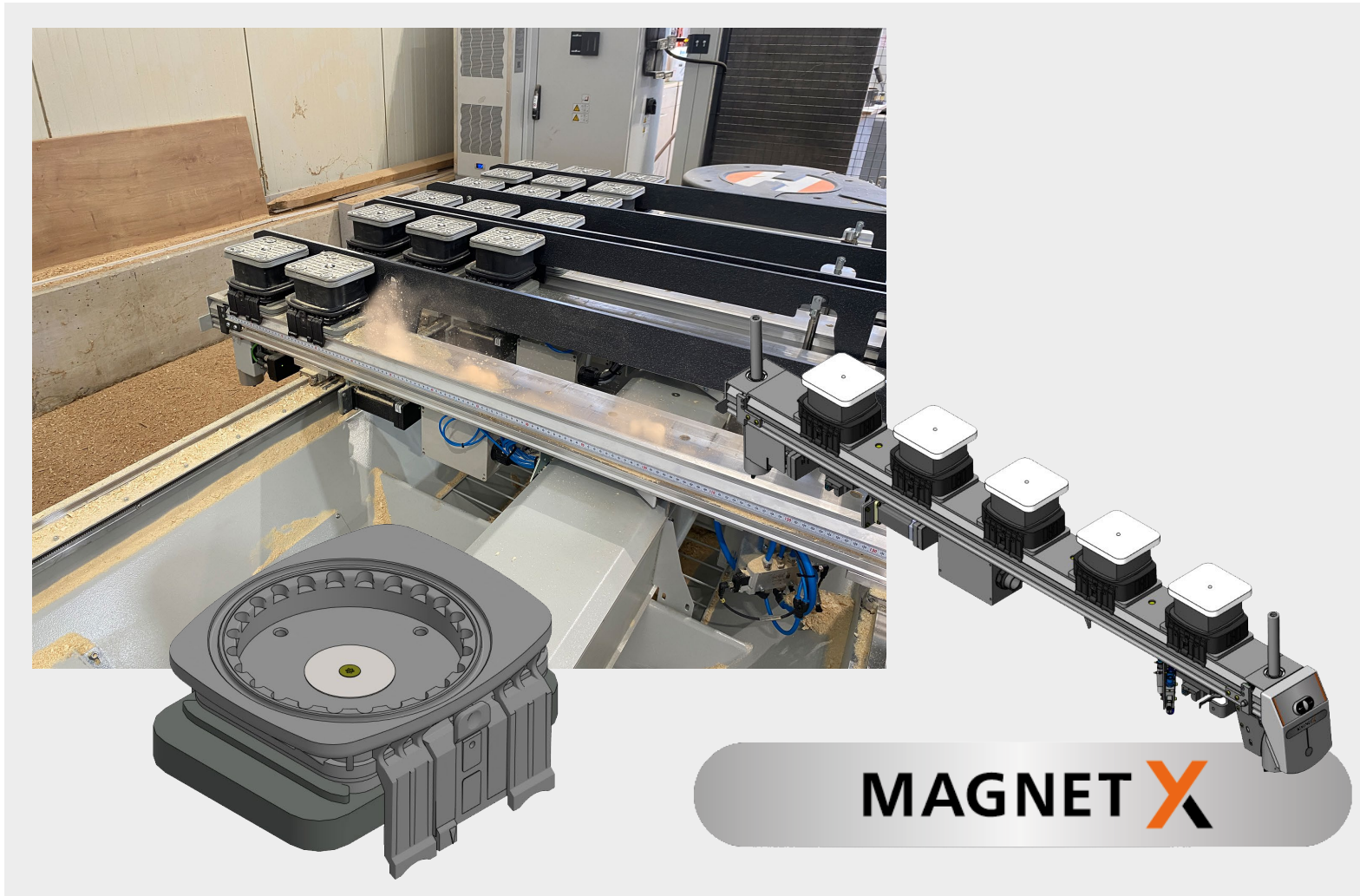
Precise, automatic and highly flexible

With the automatic "MagnetX" machine table, the EPICON 7235 has a flexible table concept for your entire range of applications.

The consoles move synchronously in the X direction, while the suction cups are positioned individually in the Y direction. This intelligent system enables maximum adaptability.
While the vacuum pods are being positioned, the dust is blown off the consoles using compressed air.

The number of suction cups per console is detected and automatically checked by an "IntelliScan„ software moduel. Positioning is precise with a tolerance of ±1 mm.

Depending on requirements, frame clamping elements and standard suction cups can also be placed on the machine table and used in manual mode. This offers maximum flexibility and ease of use in both frame construction and panel processing.



CONSOLE EQUIPMENT

High-precision positioning

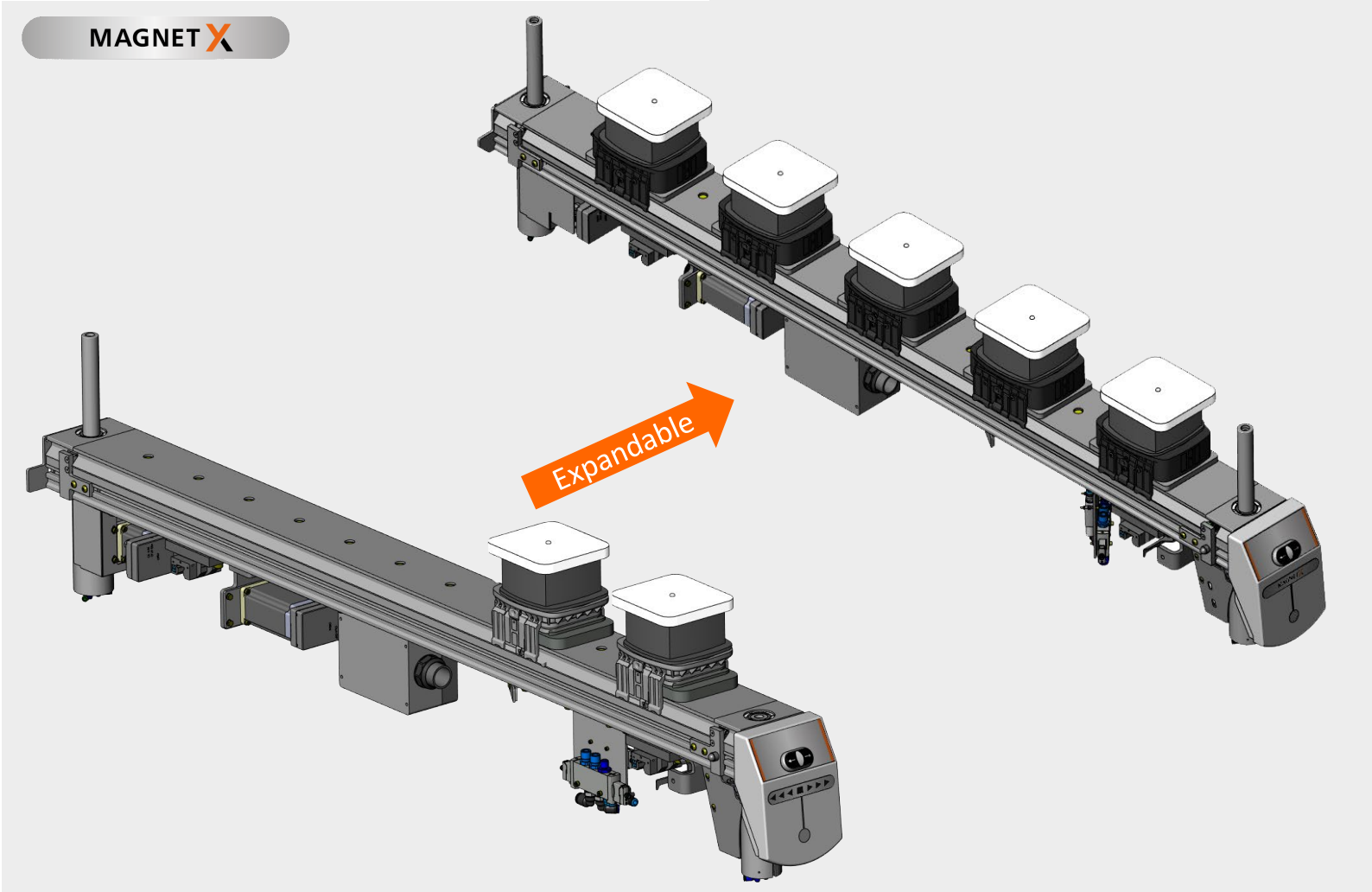
Each console includes two base bodies and two standard suction cups.

The consoles in solid gantry design are guided on covered linear guides, which ensures low-maintenance operation. Driven by servomotors, the consoles are positioned with high precision in the X-direction.

Basic equipment for every console:

- 2x vacuum base body
- 2x vacuum suction cups 140 x 130 mm

The number of suction cups per console can be easily increased! Additional base bodies and suction cups are available in various designs. This means that up to eight suction cups can fit on one console.



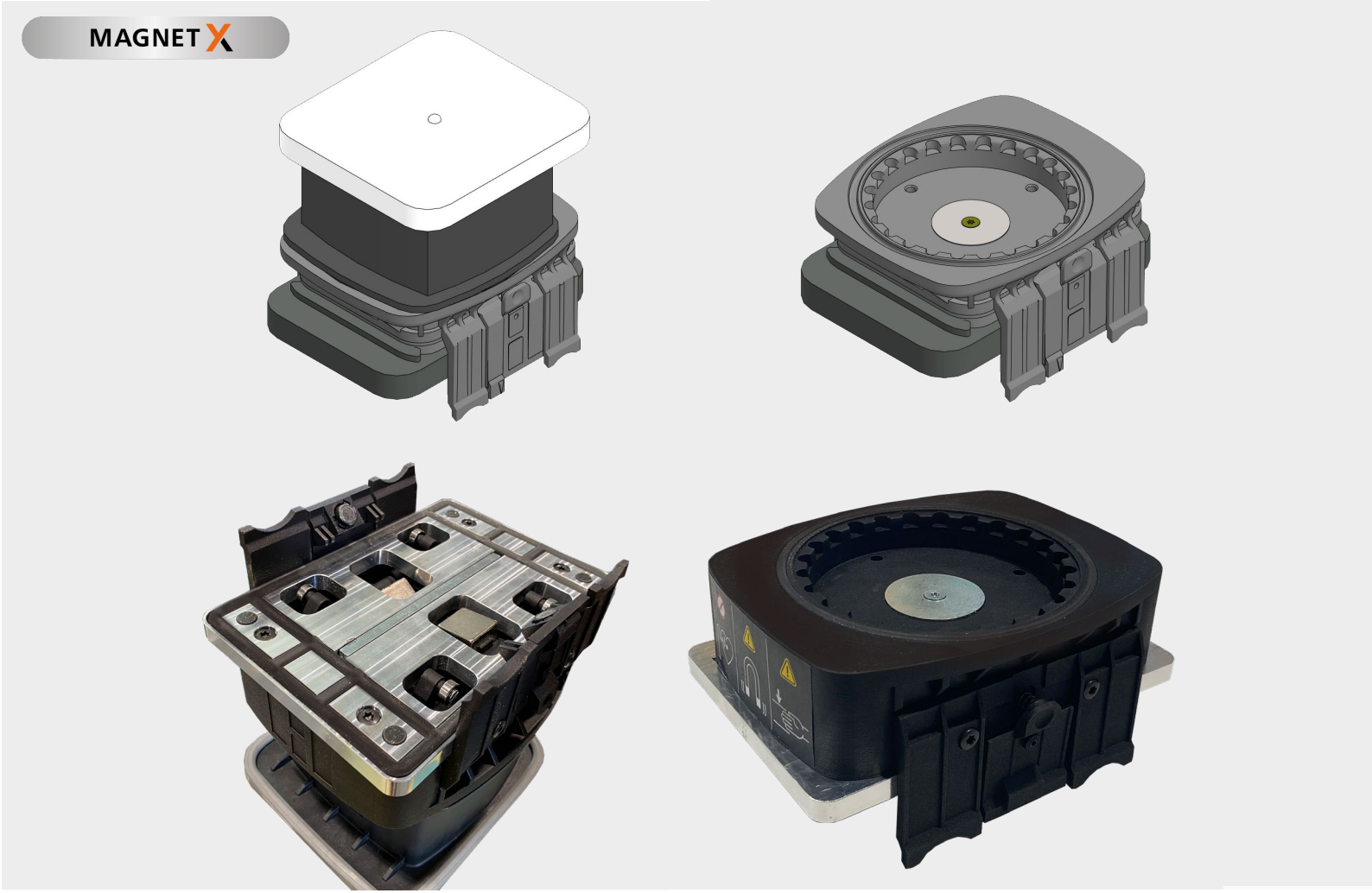
BASE BODY

Innovative technology

The base bodies of the MagnetX series provide a basis for a wide range of vacuum cup variants. The suction cups can be positioned in 15° increments in the base body to enable rotation.

The technology required for positioning is also built into the base body. Magnets are used to activate the integrated chassis, which lifts the suction cups during positioning. The magnetic force of attraction places them in the programmed position with millimeter precision.

The symmetrical design of the base bodies further simplifies positioning.



VACUUM CUPS

Flexible rotation

The MagnetX machine table can be fitted with various vacuum cups. The suction cups are simply plugged on; the special shape of the fitting ring ensures that the suction cups sit firmly and are held securely by the vacuum.

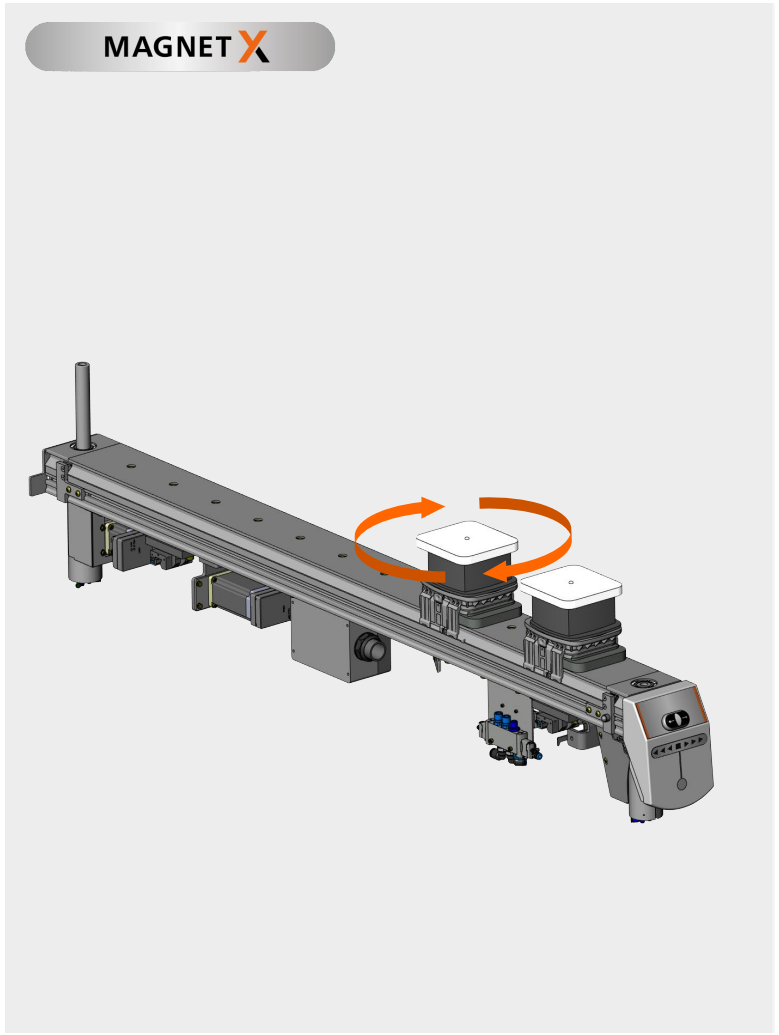
The suction cups can be inserted into the holder in a grid of 15**°**, which ensures a high degree of flexibility for molded parts or cut-outs.

All vacuum cups are equipped with a push-valve for activation.
Suction cups that are not required can therefore remain on the machine table without any loss of vacuum.

Variants: L x W x H (without base body)

Vacuum cups 140 x 130 x 74 mm
Vacuum cups 125 x 75 x 74 mm
Vacuum cups 120 x 50 x 74 mm
Vacuum cups 130 x 30 x 74 mm

In combination with the base body, this results in a **total suction cup height of 125 mm** from the console.
This makes horizontal 5-axis machining even easier.

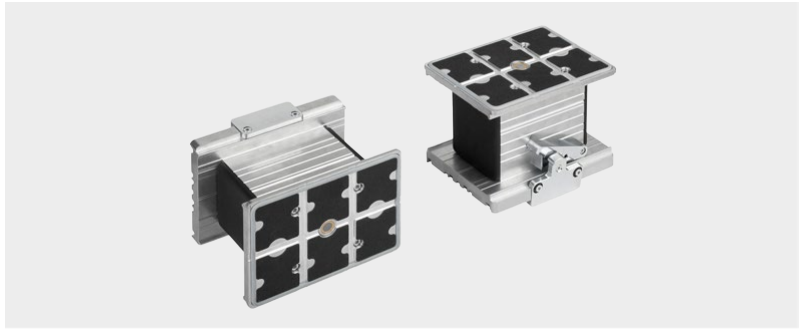


CLAMPING DEVICE

Flexibly expandable

For even more flexibility, the MagnetX table can be combined in manual mode with tried-and-tested standard suction cups and frame clamps by positioning the suction cups or frame clamps manually. This increases the variety of uses and enables the processing of special shapes and frame components.

The consoles continue to operate automatically and software-controlled.



INTELLI SCAN & MULTI-FIELD ASSIGNMENT

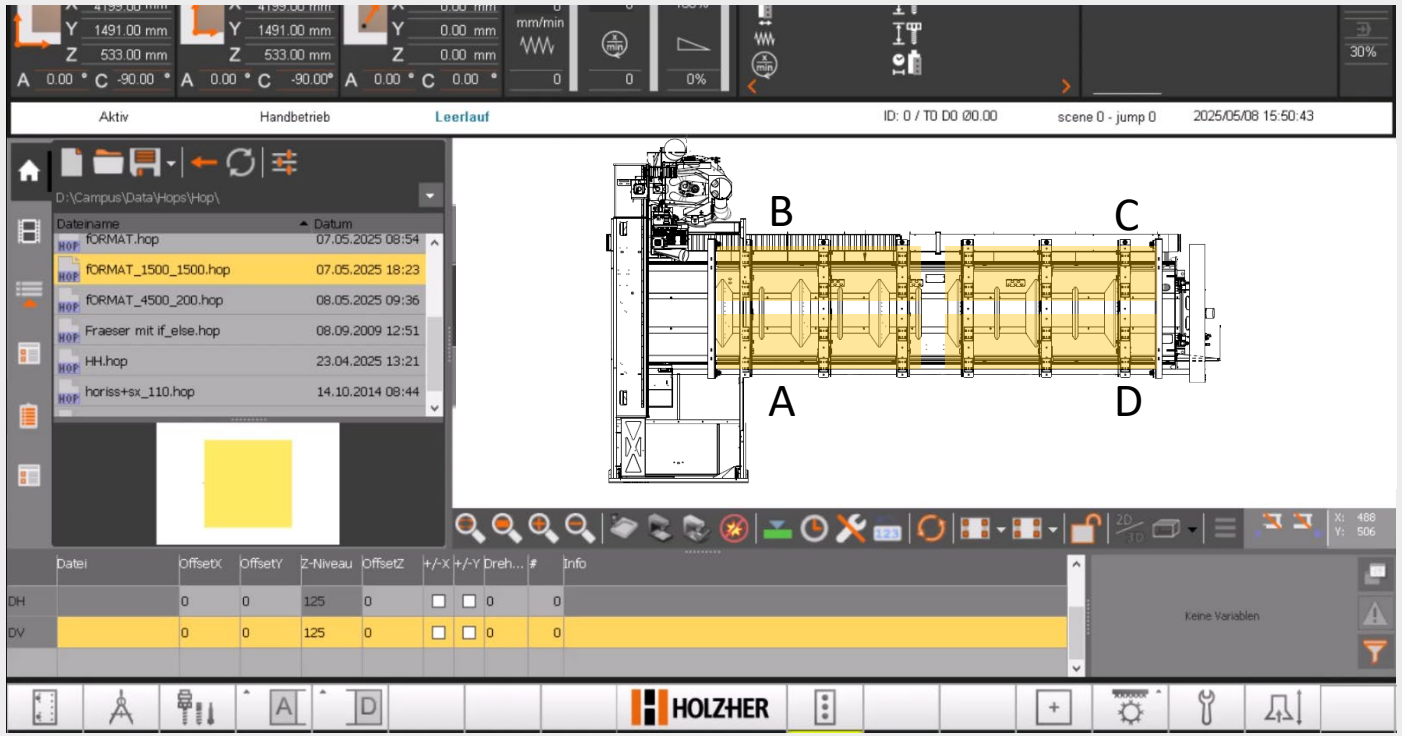
Intelligent software

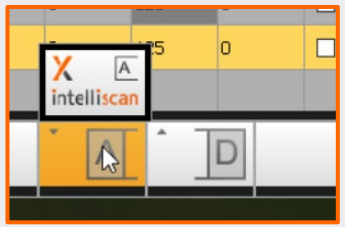
As the number of suction cups per console is flexible, the "IntelliScan" scan cycle is used to check how many suction cups have been fitted.

This also enables manual positioning with subsequent transfer to the virtual placement.

Suction cup suggestions are automatically generated based on the component size and processing. Unused suction cups and consoles are automatically parked.

Thanks to a wide range of stop variants, it is possible to work with up to eight components, from pendulum processing to efficient multi-field assembly.





MAGNETX FUNCTIONALITY

Simply explained

1. A magnet is located on a spindle **in the console**. Its position is continuously monitored. A special mechanism is used to switch the magnet on and off.

2. Additional magnets are integrated into **the base of the suction cup**. When activated, the suction cup lifts from the console and can now be positioned.

3. The **motor-driven spindle** places the coupled suction cup in the programmed position with millimeter precision, ensuring high accuracy.

4. **The magnet** in the console remains in the position it was last in so that it can be repositioned quickly.