Data Sheet

CYBELEC
INFRANOR GROUP COMPANY

Numerical Control   CybTouch 8 PS for Synchronized Press Brakes

The CybTouch 8 PS is available as a box or panel version, controlling 3 or 4 axes.
Its revolutionary fully touch screen interface makes it as easy to use as a positioner control.
The optional graphical profile drawing and manual sequencing features make the CybTouch 8 PS a powerful, efficient and productive numerical control for your synchronized press-brake.

Ordering information

- **CybTouch 8 PS 3 axes (Y1-Y2-X)**
  In box version, white color   **S-CBT-83PS12/BW**
  In box version, grey color   **S-CBT-83PS12/BG**
  In panel version   **S-CBT-83PS12/P**

- **CybTouch 8 PS 4 axes (Y1-Y2-X-R)**
  In box version, white color   **S-CBT-84PS12/BW**
  In box version, grey color   **S-CBT-84PS12/BG**
  In panel version   **S-CBT-84PS12/P**

Options:
- **Graphic 2D** profile drawing with manual bend sequencing   **S-OFT-CBT8/2D**
- **Earthing kit** only, see below   **S-OPT-EKITCBT8A**
- **RFlink USB key** for PC including CybTouchTools software   **S-OPT-RFLINK**

Wireless *RFlink* USB key for PC.

Earthing kit to easily mount and earth the cable shields.

Advantages

FOR OEM

- Complete set of Wizards for backgauge axes and beam. Machine startup is made very simple and straightforward. Time of setup is significantly reduced and more reliable.

- RFlink wireless radio frequency data communication allows easy and fast backup / restoring of parameters, parts and tools. During startup, the positioning beam curves can immediately be observed and controlled on the PC. All this without any cable connection to the numerical control *.

- Reduced electrical wiring, electrical cabinet size and equipment for lower set-up costs on each press brake.

- Flexible software for axes configuration, inputs-outputs and auxiliary functions according to specific needs.

- Screen content can be simplified to its essential minimum by removing all unused functions, buttons or information.

- New indexing functions reduce the quantity of switches and wiring, while providing more reliable indexing.

- CybTouch 8 PS accepts encoders with or without complementary signals.

- Available as integrated into a box to be mounted on an arm or in panel version.

- Can easily be integrated into existing electrical box diagrams. Ideal for upgrading machines without NC with minimal changes.

FOR END USER

- Very intuitive, no explanations required.

- Operator immediately feels confident and comfortable using this control.
  User intuitively enters the angle, the desired position of the bend and the thickness of the material. No need to erase, memorize or change modes. The depth and back gauges, pressure and crowning are automatically adjusted.

- EasyBend page provides immediate easy use of the machine: a second operator can briefly interrupt production without changing the program when an urgent bend is required.

- Profile drawing and manual sequencing (option) for fast and precise program creation, as well as manual bend sequencing.

- Energy saving thanks to integrated Eco mode function that automatically stops the main pump after a chosen time of inactivity.

- Fully touch screen human machine interface offers the best of modern technology.

- Colors are vivid but not aggressive, providing excellent readability thanks to the large characters and big buttons.

- Recurrent programs for producing complex parts can be created and memorized for easy re-use.

- Pop-up messages for security or external malfunctions.

- RFlink wireless radio frequency data communication allows backup and restoring operations without any cable connection to the numerical control *.

- Many languages available directly in the CybTouch 8 PS.

- Internal backup in a special safe memory allows the user to restore at any time the original parameters; machine is running again in an extremely short time in the event of a memory loss or involuntary parameter modification.

Need RFlink USB key (option)

Axis and bending functions

The below elements are available and can be configured on CybTouch 8 PS by the OEM.
However, some functions depend on the machine construction.

ⓘ **Available features depend on the number of available axes and inputs/outputs.**

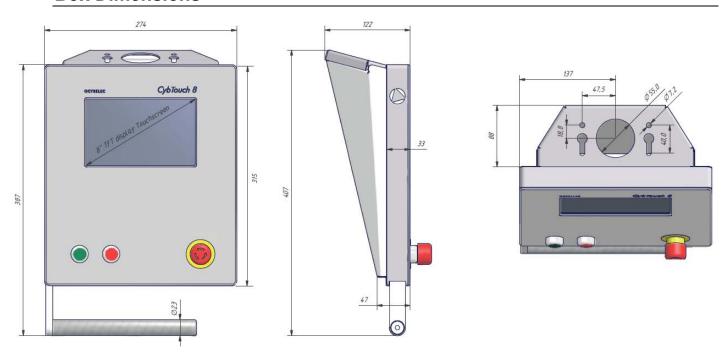| Back gauge axis & bending beam |
|---|
| Wizards and auto-tuning of the axes (including for the bending beam). |
| Oscilloscope for the beam trajectories via RFlink (without cable). |
| Indexing in several modes (including for the bending beam). |
| Encoders with or without complementary signals. |
| Inch / mm. |

Bending features
Program page at start up for quick accessibility.
User friendly tool management.

Automatic calculation of:
• Bend depth.
• Bend pressure.
• Back gauge positioning.
• Crowning:
  ▪ Standard calculation.
  ▪ Automatically calculated if 3 resulting angles are measured.
• Angle correction.
• Bend allowance.
• Manual bend sequencing.
  (according to the programmed material, thickness, bend angle and selected tools).

Pressure management.
Crowning (pressure or mechanical type).
Up to 10 pre-programmable types of materials.
Backgauge clearance during the bending process (yes / no).
Automatic back gauge correction according to the bend and flange length.
Sequence repetition.
Part counter with auto-stop.
Time and stroke counters for oil service.
Eco mode.
Pump start button.

Technical Characteristics

Characteristic	CybTouch 8 PS
Screen	7" color graphic CRT screen, 640 x 800 pixels with LED backlight control.
Work memory	SRAM
System memory	FLASH memory with firmware update via RFlink.
Communication	Cybelec RFlink (radio frequency link). micro USB port (for memory stick only)
X – R Axes	• +/- 10VDC management of AC/DC drives and motors, or • 0-10 VDC frequency converter for AC asynchronous motors.
Units	inch/mm conversion.
Power supplies	• numerical control: stabilized + 24VDC -15% / + 20% 15W • digital inputs/outputs: stabilized + 24VDC -15% / + 20% 24V_I/O
Encoder inputs	5 VDC or 12 VDC* or 24 VDC* (* = external power supply). complementary signals are not necessary, but recommended.
Power supplies for encoders	5 VDC (supplied by CybTouch) max. 250 mA for each encoder.
Digital inputs	8 inputs. optocoupled.
Analog inputs	2 analog inputs 0-10 VDC. short circuit proof.

Digital outputs	12 outputs
	    optocoupled and short circuit proof.
	    24 VDC source mode, max. 0.5 A.
	    possibility to define 2 outputs for doubling the current.

Analog outputs	6 analog outputs -/+10 VDC, Y1-Y2-X-R, pressure and crowning. impedance out < 100 Ω, short circuit proof. load $\geq$ 2 kΩ (max 15 mA).
Reference voltage	10VDC reference. impedance out < 100 Ω, short circuit proof. load $\geq$ 2 kΩ (max 15 mA).
Operating conditions	min. 5° Celsius, max. 40° Celsius. relative humidity 10 to 85% noncondensing.
Dimensions	See diagram below.
EC Directives	IEC61131-2 type 1-3 compliant.

Box Dimensions