

FLATCom® L

Large travel gantry machine

- large table clamping surface; up to 5.85 m²
- large working area; up to 2.5 x 1.7 m
- high gantry clearance, up to 470 mm
- fixed table, movable gantry



Fig. FlatCom® L 250
equipped with control panel
iOP-19

FLATCOM® L | Large travel gantry machine

The FlatCom® L is ideally suited for panel processing for various materials such as aluminum, non-ferrous metals, wood, and plastics. With a maximum travel range of 2500 x 1700 mm, the FlatCom® L is the largest serial CNC machine by isel. The structure of the machine is a typical structure for the FlatCom series. A moving portal, a fixed table and a gantry drive make the machine stable and dynamic. The mechanical basis is formed by stable, low-vibration components made of aluminum-steel connections.

The ball screw drives without clearance used in the linear axes ensure high accuracy levels. A special feature of the FlatCom® L is the option of a double Z axis permitting the execution of parallel machining. The FlatCom® L is available in various designs or handling systems from the isel robotics area.

Features

- various portal passages with an extended Z-axis
- powerful isel control with maintenance-free servomotors
- reliable LES units with steel ball screws installed as drives
- easy to use thanks to the height-adjustable CNC panel
- network-compatible control PC with WINDOWS
- sliding/folding door
- clamping of the workpieces by means of a T-slot plate

Options

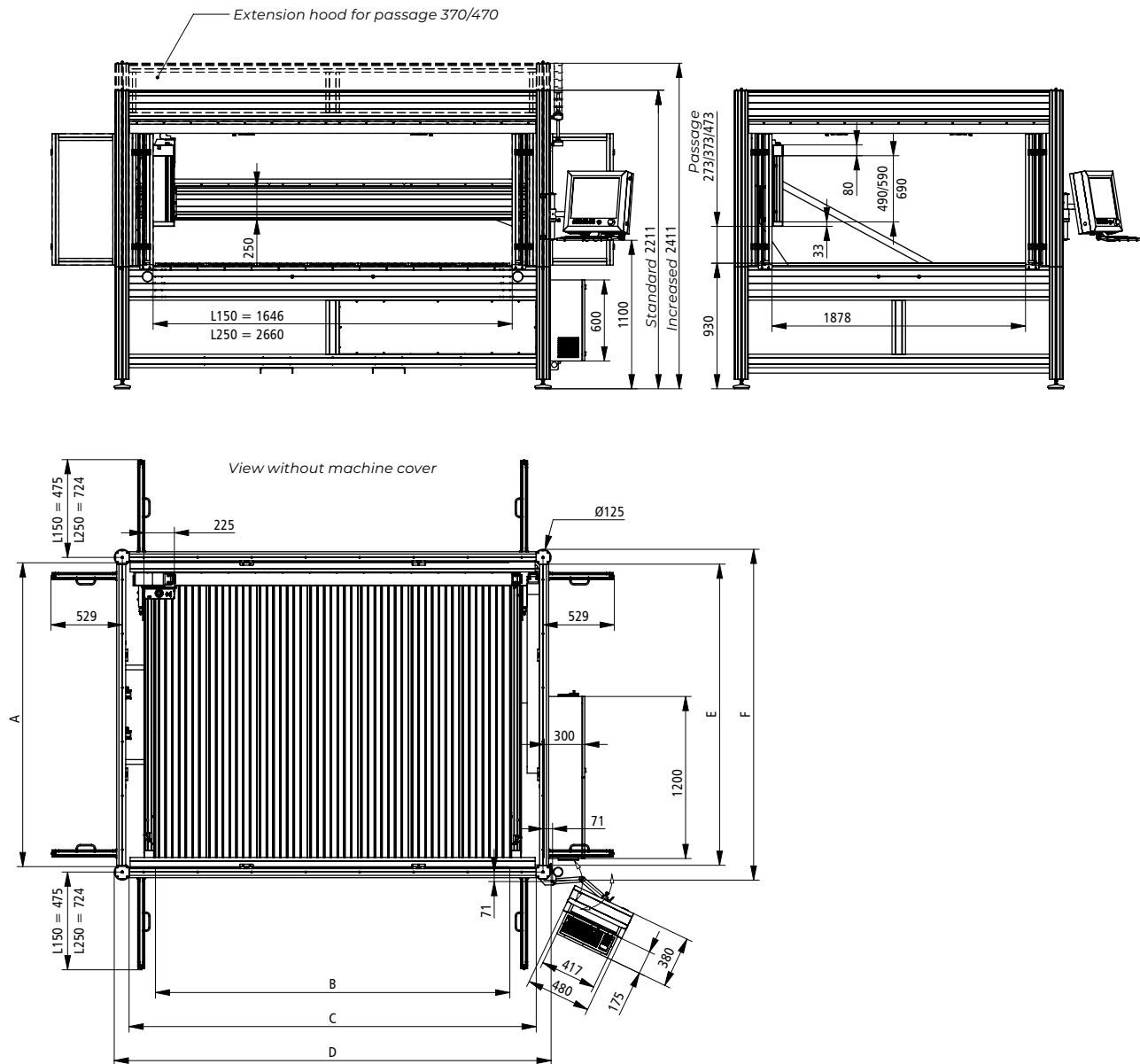
- iSA milling spindles and water-cooled HF milling spindles
- round and linear tool changing stations
- cooling spray device
- cold air cooling Cool-Min
- automatic tool length measurement
- mill breakage control
- electronic handwheel
- pneumatic sliding door
- rotation units
- max. 6 interpolating axes + 6 handling axes
- safety light curtain
- closed and/or light-tight hood for laser applications
- hood attachment with increased portal passage
- workpiece clamping systems (vacuum tables, etc.)
- extraction systems
- LED engine room lighting
- PC control panel with free PCI slots (for the use of external PCI hardware)
- interface adjustments
- CAD/CAM software

Technical data

FlatCom®	L150	L250
Travel ranges X/Y [mm]	1500/1700	2500/1700
Z stroke [mm]*	210 (optional 310; 410)	
Z passage [mm]*	270 (optional 370; 470)	
Table clamping area WxD [mm]	1600 x 2250	2600 x 2250
Dimensions WxDxH [mm]	2241 x 2455 x 2211	3488 x 2455 x 2211
Equipped with control cabinet & open doors	2488 x 3280 x 2211	4173 x 3778 x 2211
Travel speed X/Y/Z	max. 15 m/min.	
Drive motors	Maintenance-free EC/AC servomotors	
Drive elements X/Y/Z	Ball screw drive, set without clearance	
Control	CAN controller iMD equipped with 3 drive controllers which are expandable to 12 axes (max. 6 interpolated & 6 handling axes), PC, I/O module, safety circuit equipped with standstill monitoring, power supply 48 V / 1000 W	
Operation	Control panel iOP-19 touchscreen equipped with keyboard and touchpad	
Software	WinRemote (optional: ProNC, isy-CAM)	
Weight [kg]	approx. 590	approx. 690
Electrical specifications	400V, 16A	
Part No. (Z-stroke: 210 mm)	278030 272443*	278031 272443*

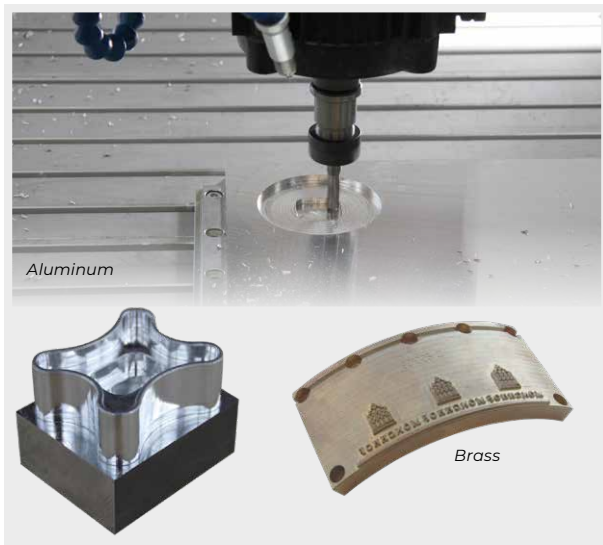
*without installed components on the axes.

FLATCOM® L | Dimensional drawing [dimensions in mm]



FlatCom®L	150	250
A	2250	2250
B	1625	2625
C	2016	3016
D	2216	3216
E	2230	2230
F	2430	2430

FLATCom® L | The all-in-one solution



Typical materials

- light and non-ferrous metals
- foam and milled plastics
- wood
- plexiglass
- and many more

Application areas

- model and mold making
- orthopaedic technology
- measurement and testing procedures
- dispensing applications

