

OIKOS XL+

The new cnc machining centre from SCM for Timber construction

SCM continues to invest in the development of advanced technologies for timber construction. In recent years, the range of cnc machining centres has expanded rapidly and now it includes specific solutions for different applications, which fully meet the demands of every company in the sector.

On the strength of this continuous research and development activity and a highly specialised team, SCM is therefore a technological partner capable of responding to the competitive challenges of a market, that of 'green building', which is constantly evolving.

The most recent product of this high-tech itinerary is the **OIKOS XL+, the new cnc machining centre for the production of structural columns with a max. cross-section of 1250x610 mm.** This new solution has been conceived starting from the characteristics of OIKOS XL, a machining centre chosen by leading industry customers both in Europe and North America. OIKOS XL+ has not only inherited all its advantages but amplifies them, thanks to the implementation of **a second independent machining unit with a 1150 mm diameter sawblade.**

OIKOS XL+ is PLUS PERFORMANCE!

In line with the increased expansion of multi-storey wooden buildings globally, the new cnc machining centre has been designed to overcome even the most complex production challenges. The robust and adequately sized structure of the machine means **very heavy elements of up to 4 tons** can be processed, as well as very hard materials.

Flexibility is another key point, in fact any operation on any side of the work piece can be performed with no need of repositioning, thanks to the innovative 6-axis architecture of the main machining unit.

Productivity and precision are other primary requirements that are the basis of this model. The second 5-axis sawblade unit allows to execute **notches for hardware with a maximum depth of 400 mm.** Furthermore, the use of a sawblade rather than a chain tool means to work faster and achieve a better quality.

Another advantage is the ability to execute **cuts from bars with a maximum thickness of 610 mm.** Decisive is the machining strategy behind the OIKOS XL+, which combines the second sawblade unit with the main machining unit that mounts a 740 mm diameter sawblade.

As with all SCM cnc machining centres for timber construction, OIKOS XL+ has **Maestro beam&wall**, the proprietary software compatible with the most popular design CADs in the industry.

Programming freedom is guaranteed, as Maestro beam&wall allows programming both in the office using a PC and directly on the machine from the upgraded **eye-M top plus** operator console, complete with **Maestro active beam&wall**, the new human-machine interface offering a simpler, more intuitive control and optimisation of the production flow.

OIKOS XS: MAXIMUM PRODUCTION SPEED FOR WOODEN STRUCTURAL ELEMENTS

Among the latest solutions developed by SCM is the OIKOS XS, a cnc machining centre presented at Ligna 2023, characterized by speed of execution and high configurability and dedicated to the production of straight beams, prefabricated walls, trusses, roofs and blockhouses.

OIKOS XS is the most versatile model in the Oikos range, it was designed to process structural elements requiring very simple operations such as cutting but also, elements characterized by more complex operations such as drilling, routing, wood-to-wood joints and hardware slots, on work pieces that can have a maximum length of 16 meters, a maximum width of 450 mm and a maximum thickness of 240 mm.

The **speed of execution** is one of the main advantages because the work piece feed rates can increase up to 187 m/min. **Combined movements of the machining units** cut down unproductive time due to axis repositioning. Furthermore, the use of SCM's **Maestro beam&wall** software allows to achieve the maximum programming flow efficiency.

OIKOS XS enables the **coverage of the 6 faces of the work piece**. Several machining units strategically positioned within the work area, resulting in a high degree of configurability to meet every specific customer need.

Another plus is the **innovative 4+1 axes revolver unit with differentiated speeds for each tool** and equipped with a marking device that in combination with the one positioned on the saw blade unit allows marking on the four work piece longitudinal faces.

OIKOS XS also stands out for its **machining precision** thanks to extremely stiff clamping system for work piece feeding, horizontal and vertical pressure rollers placed close to the work area and the dynamic work piece support system active during processing.