

SAGITECH

CYLINDRICAL GRINDING MACHINES

EURO
20
05

PASSION FOR GRINDING



THE SMALL ONE FOR BIG PRODUCTIONS

ID CARD

ERGON 05 is a cylindrical grinding machine for external or internal diameters with moving column, suitable for machining pieces up to 500 mm. in length and a rotating diameter of 250 or 360 mm.

TECHNICAL SPECIFICATIONS

GENERAL DATA

Max. grindable length	500	mm.
Centres height (standard / optional)	130 / 180 *	mm.
Max. rotating diameter	260 / 360 *	mm.
Max. load between centres	50 / 150 *	kg.
Max. load in overhang machining	50 / 70 *	kg.
Machine weight	5500	kg.

WHEEL HEAD – “X” AXIS

Axis travel	350	mm.
Max. axis speed	12	m/min.
Axis resolution	0,0001	mm.
Standard transducer	absolute linear encoder	

MOBILE TABLE – “Z” AXIS

Axis travel	980	mm.
Max. axis speed	12	m/min.
Axis resolution	0,0001	mm.
Standard transducer	absolute linear encoder	

WORHEAD WITH ROTATING CENTER / UNIVERSAL *

Mounting taper	4 / 5 *	Morse
External taper	5	ASA
Max. speed	6000 / 3000 *	rpm
Spindle torque output	70 / 35 *	Nm.
Standard transducer	resolver / encoder *	

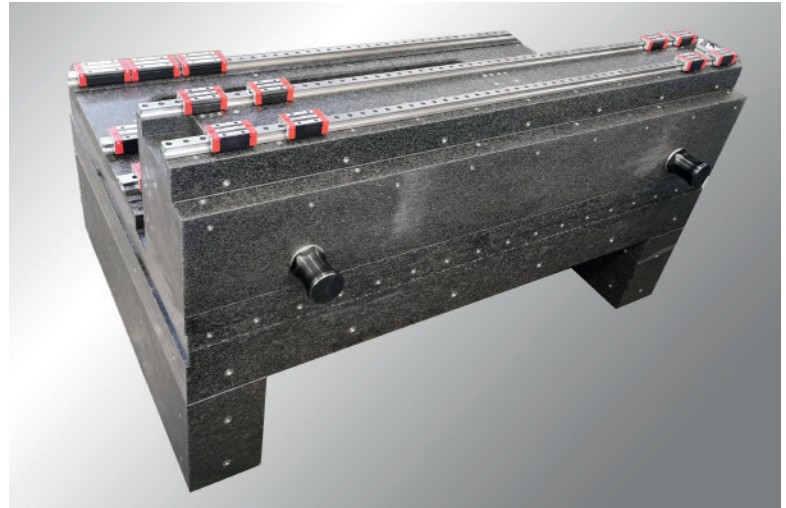
TAILSTOCK

Sleeve diameter	55 / 100 *	mm.
Sleeve stroke	30 / 50 *	mm.
Mounting taper	4 / 5 *	Morse
Max. weight between pointes	50 (spring) / 300 (hydraulic) *	kg.
Cilindricity correction range	+ / - 0,15	mm.

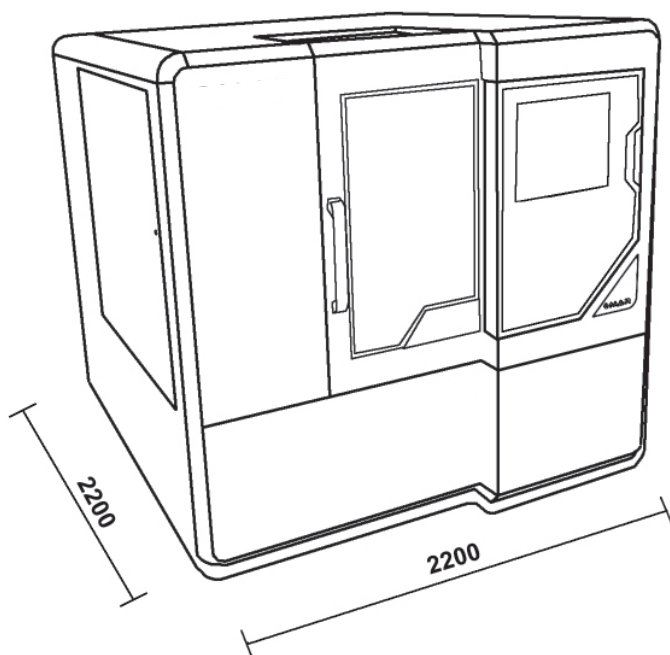
*Option

THE STARTING BLOCK

The natural granite base, in addition to ensuring maximum stability over time, is equipped with only 3 leveling points, to always be perfect on each floor. The granite is worked in Italy with exact precisions like a surface plate and guarantees at the same time a long duration in time.



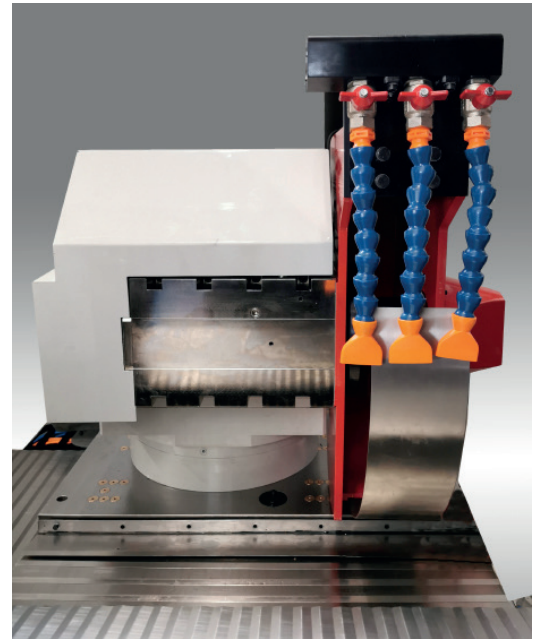
ALL, IN LESS THAN 5 SQUARE METERS



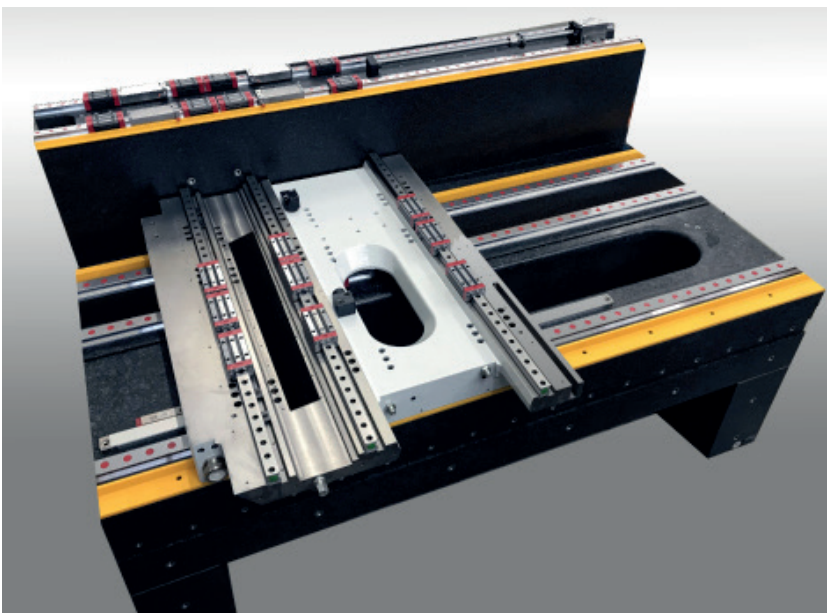
The cross arrangement of the X and Z axes, combined with movement by linear motors, allows the smallest possible footprint on the ground, limiting it to 2,200 x 2,200 mm. This is all the space that **ERGON 05** needs to produce your details.

FLEXIBLE UNIT

One of the novelties of the **ERGON 05** is the passage of the various connections, inside the Torque axes and directly into the electrical cabinet, reducing cable lengths, joints and extensions. On the turret we can place up to 2 electrospindles, with variable configurations for external and internal grinding wheels.



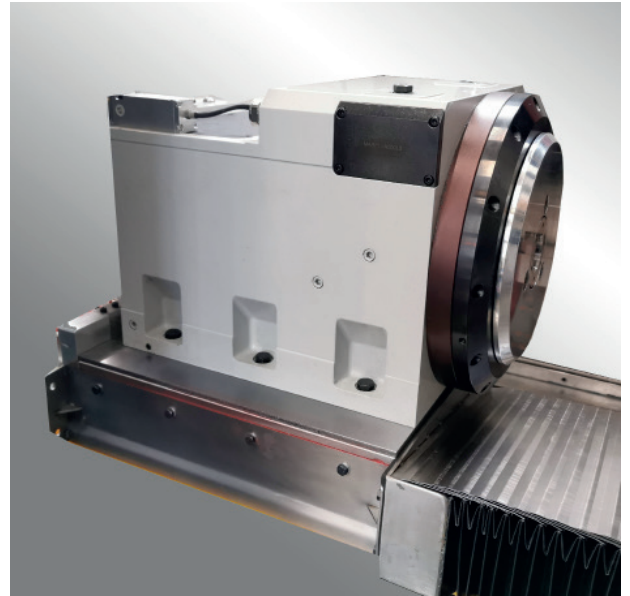
THE MAXIMUM OF MOTION



Both the X and Z axes move on a triple linear guide with recirculating roller units, driven by latest generation linear motors and controlled by absolute optical linear scale pressurized. Despite the size of **ERGON 05**, the stiffness of the movement is record-

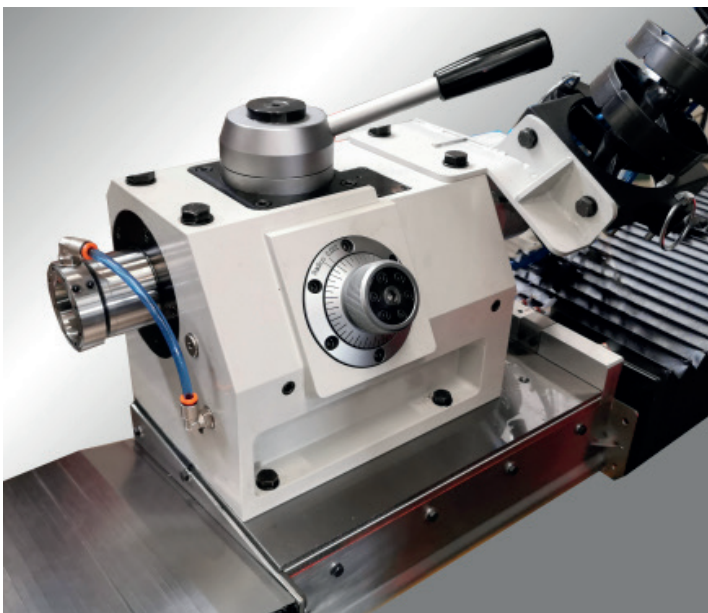
WITH YOUR RIGHT HEAD

Universal workpiece head (C axis), for machining between fixed or rotating centers, with torque motor and Morse 4 / ASA 4 attachment cone (optional MORSE 5 / ASA5). Alternatively it is possible to have a workpiece head with electrospindle for cantilever processing only with speeds up to 6000 rpm and housing for disc diamond. The unit, mounted on linear guides and blocked by electro-pneumatic brakes, can be moved automatically via a recirculating ball screw coupled to a digital brushless motor, with position controlled by an absolute optical scale pressurized.



ALL-IN-ONE TAILSTOCK

Manual lever movement and push with adjustable preload spring, with Morse 3 connection (optional Morse 4). The sleeve, sliding on adjustable bushings, can have a pneumatic opening and closing movement to facilitate the loading and unloading of the pieces. The fine adjustment of the cylindricity, equipped as standard in the tailstock, can be motorized and managed by the NC, to reduce the machine alignment time. Programming is done by directly entering the correction value in a specific CNC mask.

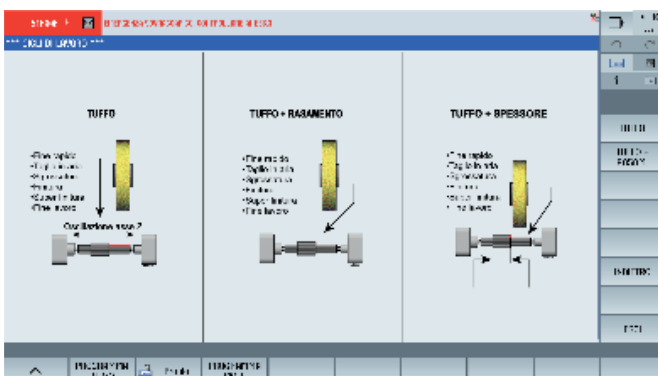


PROCESS CONTROL

The hardware of the CN package can be Fagor or Siemens, and includes motor drives, drives and machine management peripherals. Digital technology always integrates free telediagnosis, so that we can be by your side without making you wait either a second. Industry 4.0 has never been so close!



THE SOFTWARE FOR EVERYONE



We have developed our management software internally, to provide you a simple, complete and reliable user interface. To use **ERGON 05** you do not need high mechanical skills, our software with touch screen interface simplifies the programming of work cycles.

ACCESSORIES FOR EVERY NEED

SAGITECH collaborates with the most important companies in the market to provide you with all the devices that make the difference. Whether it's integrated measurement systems, equipment for workpiece or loading processes, on **ERGON 05** there is space for everything.



CUSTOMER CARE

On **ERGON 05**, attention to the customer goes from different points: a pleasant and simple design, a great machine inspectability and a simple and clear arrangement of all components.

In addition to this we continuously improve the best technologies on the market, with the intent to free the customer from complex and confusing operations.



Thanks to the field buses and the on-board diagnostics we can communicate in real time with the customer to identify and correct every problem of use.

We also offer a scheduled maintenance service to maintain the quality of your machine over time.

HISTORY

SAGITECH was born in Alessandria in 2015 providing technological support in the sector of cylindrical grinding machines. In 2021 it expands with a new operating form and becomes part of a group of companies all operating in the sector of cylindrical grinding machines and special applications. In addition to Sagitech, the group also includes FEF di Concorezzo (www.fefrettificatrici.com) and the holding company MAR (www.mar.sm). As part of group synergies, SAGITECH operates mainly in the sector of cylindrical grinding machines for production with high-speed tools, FEF manufactures customer-specific vertical and tangential grinding machines and MAR covers with its range both internal and external grinding machines with tools conventional. The strategic location of the 3 structures allows a wide territorial coverage that is responsive to market demands.

THE STRATEGY

Democratic precision. Maximize customer satisfaction by providing adjustments designed for ensure high quality and a rapid return on investment, made with excellent skills, with innovation and with attention to design, always supporting the customer, even in the re-engineering of the installed machinery.

THE TEAM

The team is made up of highly specialized expert technicians who deal with design, construction, revision / re-engineering, and technical assistance of cylindrical grinding machines. SAGITECH strongly believes in value of people, and each of our employees is constantly trained by more experienced technicians to create a cohesive and autonomous group in their skills. Each individual employee, with their own acquired experience, allows SAGITECH to operate on each specific sector of machines, both in the mechanical, electronic and software sectors.

HEADQUARTERS

About 1,500 square meters are allocated to the production area, divided into several areas used for specialized assembly and a tool room equipped with the machine tools necessary to carry out the most important and delicate processes. A large automated spare parts warehouse to meet the needs of our customers and an office area modern and functional for designers, commercial and administrative, complete the location.

CIRCULAR ECONOMY
VALUE DURABLE
INNOVATION
EXCEPTIONAL COMPETENCES
PEOPLE, NOT NUMBERS

