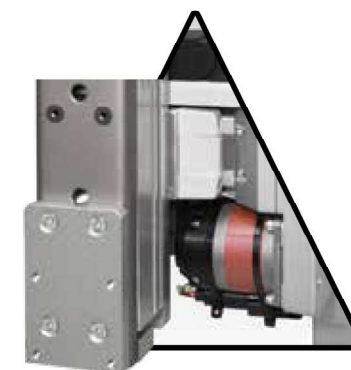# WRa500

3-4 axes system

The stand-alone Cartesian robots are the ideal solution for dispensing, milling, screwing and soldering applications, which must be highly flexible, simple to program and use and require limited investments. The new ALPHA electronics offer groundbreaking functions and performances, which are included even in the standard models.

WRa500 is a Cartesian robot with three and four interpolated axes and work area of 500x500mm; it is extremely flexible and ensures high precision and repeatability of the operations.

The mechanical part consists of screw axes with linear and rugged ball bearing guides and the self-bearing structure is made of aluminium profiles. **WRa500** is controlled by a **groundbreaking motion control system called ALPHA** by Alutec Group, which, combined with the proprietor software ALPHA, guarantees reference performances and new functions, for both stand-alone operation and for the communication of the robot with external systems (CANopen , serial RS232 or with 16 general purpose input/Outputs),

which are available even in the standard version. The robot is programmed from the PC and subsequently controlled via the operator panel ALPHA CP, supplied with it, and can manage up to 100.000 points split-up into 255 work programs. The user-friendly graphic interface, the possibility to import files in .dxf, Gerber or Excel format and the new SUB-PROGRAMS function allow you to fulfil extremely complex operations, very quickly. As for the dispensing applications, the 3D interpolation, the continuous path function, the automatic calibration system and the high mechanical precision guarantee utmost execution quality. **WRa500** is supplied complete with safety guards and EC type-approvals.

Applications
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X/Y/Z {R} Work Area (mm)	500 / 500 / 145
Worktable Load / Tool {R}	10 Kg X / 5 Kg Y , (3 Kg) R
Max. Speed X,Y,Z	400 (mm/sec) MAX with protection
Repeatability	±0.015 mm/axis
Resolution	0.004 mm/axis
Pitch Screw	8 mm
Data Memory	100.000 Points / 255 programs
Drive System	stepper motors
Interpolation	point to point & continuous path
Programming Method	remote mode (self-learning) through PC software
I/O Signals	16 input / 16 output
External Interface	USB / RS232 /Analogue output optional
Power Supply	100-240 VAC, 50/60 Hz 500 Watts
Dimensions (WxDxH) mm	798x835x930
Weight	62 Kg

AXIS Z
AXIS Y
929.20
798

AXIS Z
AXIS R
POLSO OPTIONAL
AXIS X
835