INSIZE

www.insize.com

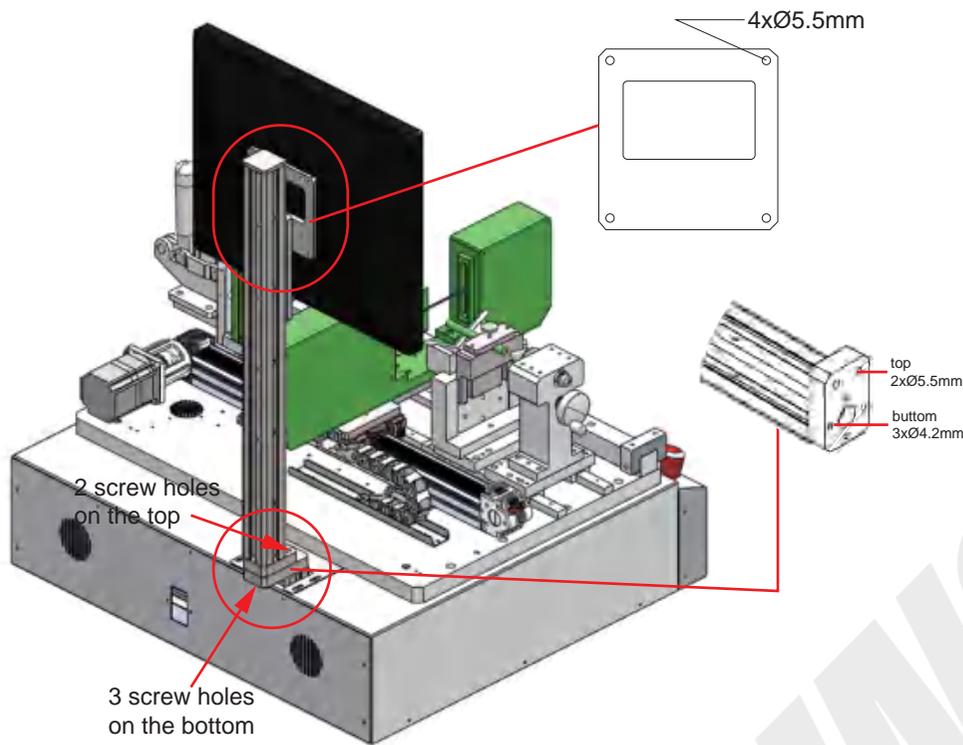# LDM-AT01
AUTOMATIC LASER SCAN MICROMETER
OPERATION MUNUAL

PLEASE SCAN QR CODE TO WATCH THE OPERATION VIDEO OF PRODUCTS.

VIDEO

INSIZE

INSTALLATION

4xØ5.5mm

top
2xØ5.5mm

buttom
3xØ4.2mm

2 screw holes
on the top

3 screw holes
on the bottom

OPERATION

Right power knob to switch on

▲ Turn off the computer and then power off, restart after each power failure requires an interval of 1 minute or more

Open the "Demo" form on your desktop and don't modify the first line, you can edit from the second line.

| A No.	B Position	C Diameter spec	D Diameter upper tolerance	E Diameter lower tolerance	F Roundness	G Runout
1	20	40	0.05	-0.05	0.02	0.01
2	30	40	0.05	-0.05	0.02	0.01
3	40	40	0.05	-0.05	0.02	0.01

First column(A)--How many positions do you need to measure on this workpiece.

Second column(B)--Specific position at the time of measurement, distance from the "HOME" point in mm.

Third column(C)--Diameter of the workpiece at the measuring point in mm.

Fourth column(D)--Measurement upper limit in mm.

Fifth column(E)--Measurement lower limit in mm.

Sixth column(F)--Roundness of the workpiece at the point of measurement in mm.

Seventh column(G)--Runout of the workpiece at the point of measurement in mm.

Double-click the desktop shortcut
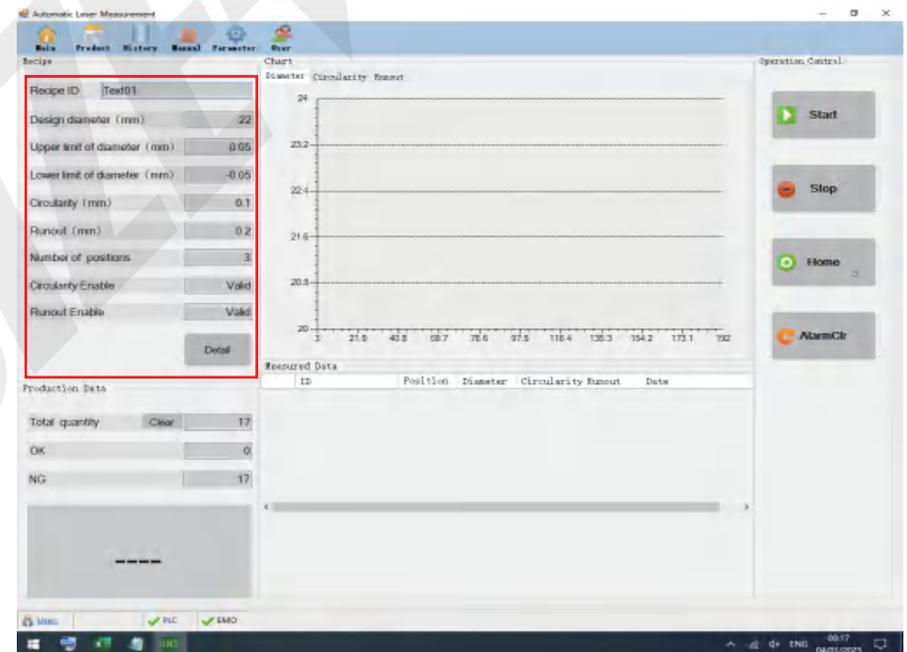
Double click "Recipe ID", select your edited excel, mounting the workpiece, then click the "HOME" button, finally click on "START" to start the test artefact. After finishing the test the data is displayed in the "Meeasured Data". At the "Production Data", it'll display NG/OK.
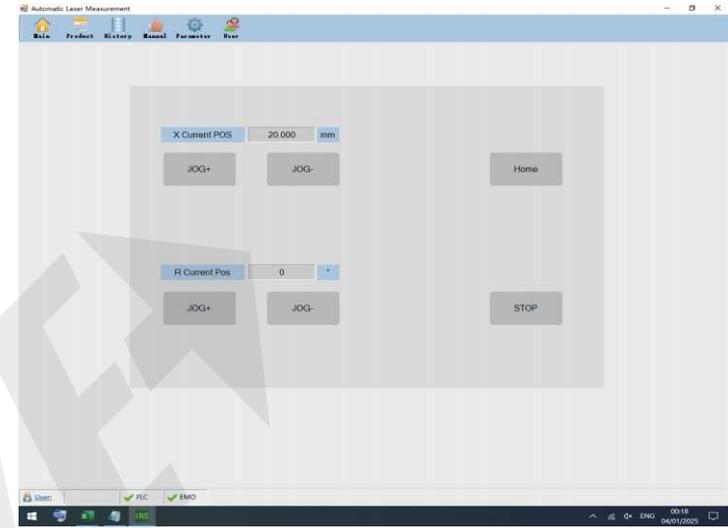
"HOME"--each time you open the software, you need to click the "HOME"
"START"--start testing
"STOP"--stop testing
"ALARMCLR"--after the instrument alarm, you need to clear the alarm before you can start clicking the "HOME".
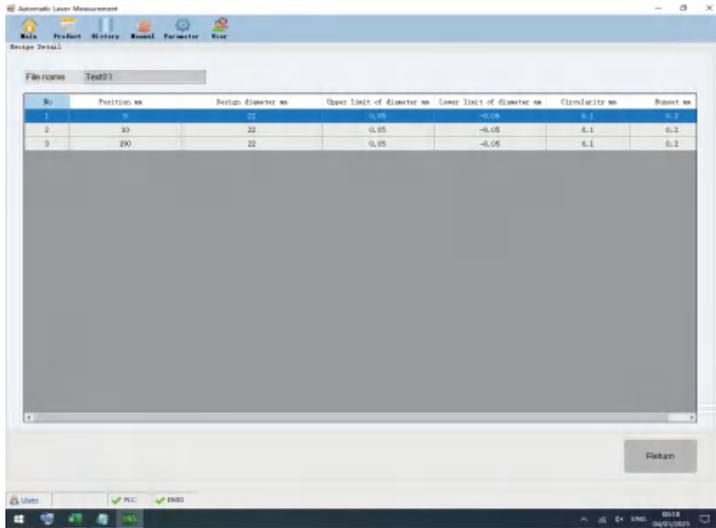
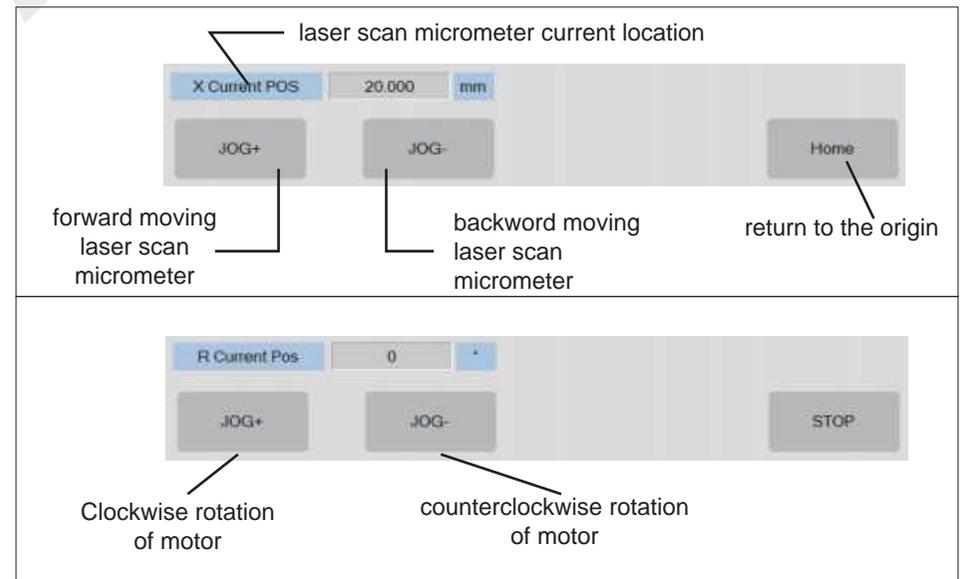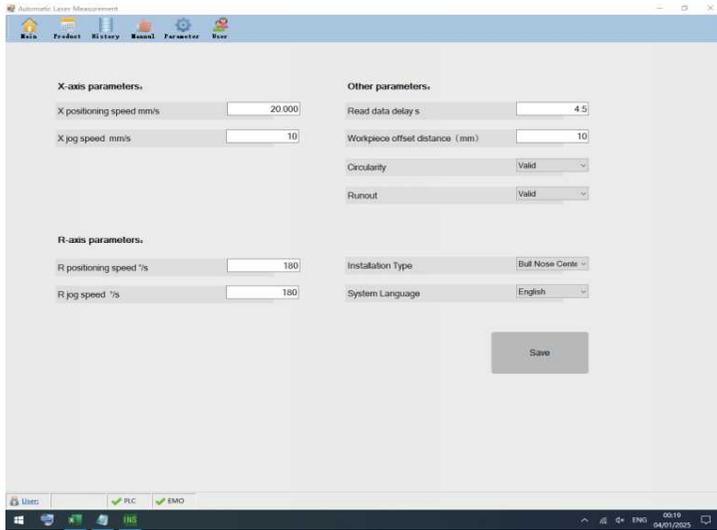In the interface "Product", the edited content of the excel form can be queried.
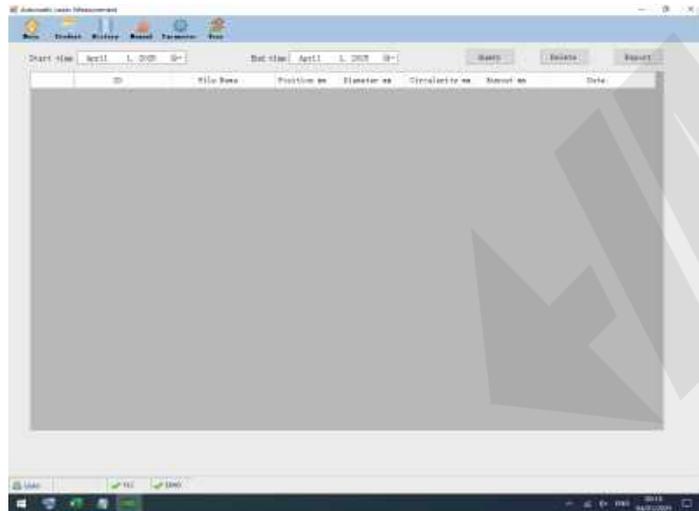
Display of saved measurement data in "History".

"Manual" interface, operator for manual control of gauge movement and motor rotation

When moving the laser scan micrometer you need to keep left clicking, release the mouse, the product stops moving.

To rotate the workpiece manually, left-click once, to stop the rotation, left-click on 'STOP'.

laser scan micrometer current location

X Current POS   20.000   mm

JOG+   JOG-   Home

forward moving laser scan micrometer   backword moving laser scan micrometer   return to the origin

R Current Pos   0   °

JOG+   JOG-   STOP

Clockwise rotation of motor   counterclockwise rotation of motor

In the "Parameter" interface, you can modify various parameters

This screen is used to modify the movement speed of the laser scan micrometer.

X positioning speed mm/s: automatic control of the speed of the laser scan micrometer. 0~300mm/s adjustable.

X jog speed mm/s: manual control of the speed of the laser scan micrometer. 0~100mm/s adjustable.

This screen is used to modify the rotation speed of the workpiece.

R positioning speed °/s: automatic control of the rotating workpiece speed. 0~360 °/s adjustable.

R jog speed °/s: manual control of the rotating workpiece speed. 0~360 °/s adjustable.
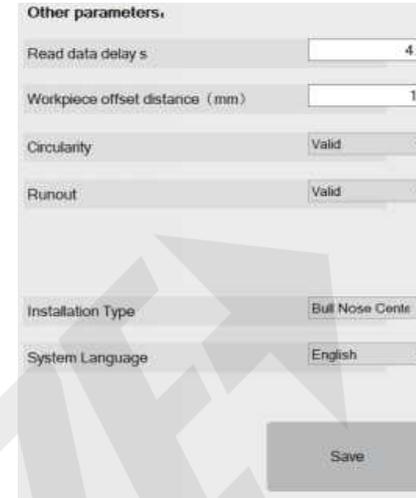
Other parameters:
Read data delay s: time required to measure a point, 1~100 adjustable. Normally set at 4.5s.
Workpiece offset dintance(mm): distance of the top of the workpiece from the origin, 0~100 adjustable.
Circularity: Valid/Invalid, whether to measure roundness.
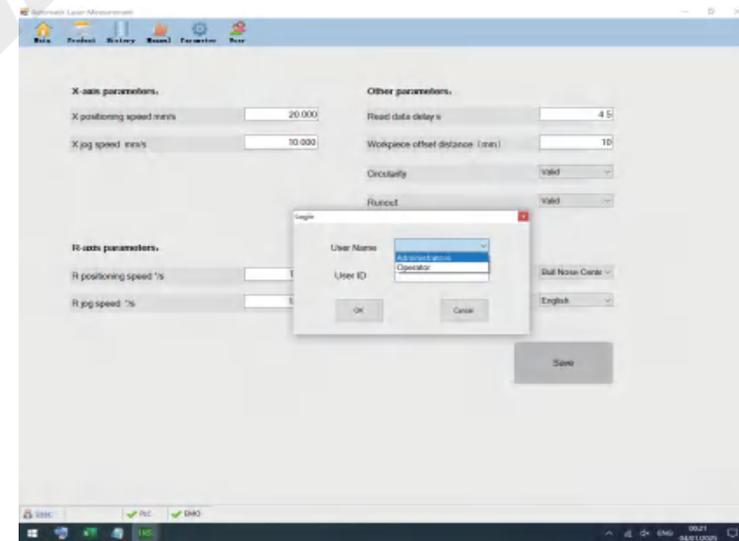Runout: Valid/Invalid, whether to measure runout.
Installation Type: Bull Nose Center/V-Block Select according to the actual clamping.
System Language: English/Chinese

▲

▲ **Roundness and runout cannot be measured when "Read data delay s" time is less than 3s**

You need to save and restart the software after modifying the parameters

"User" interface: our engineers debugging software interface.

Installation See video for more information on changing the clamping method.