

Automated Hinges Assembly Machine

High Efficiency

TURNKEY SOLUTION

Seamless integration with your existing hinges production line to boost your productivity. No need to alter any of your existing equipment. It is a great add-on for your factory floor.

MAXIMUM FLEXIBILITY

Self-contained and designed to work independently. Optional it can be made to seamlessly connect to your existing production line.

QUALITY DESIGN AND DURABILITY

Robust system design with excellent ergonomics. The equipment uses only choicest parts to ensure high quality and long durability.



- Ultra-short Cycle Time to boost your productivity
- Compatible with various screw rod and nut sizes
- Precise torque control and inspection
- Intelligent software
- Camera based inspection to boost yield

In hinges production, the miniature screw nuts are required to be assembled with the screw rod with precise torque control. This machine accepts separate feeding of screw nuts and screw rods and then inserts the nuts into the rod. The exact number of turns used to insert the nuts into the rod is controlled and the torque during the process is monitored in real-time by using a precision probe. The assembled part is further checked by using camera to make sure the screw nut is properly inserted.

Until recently, this assembly process must be completed using very intensive manual labor. And it is not easy to precisely control the torque and/or the number of turns. Manual labor inevitably increases the likelihood of damaging the threads resulting in lower yield, not to mention the lack of torque monitoring. The hinge assembly machine automates this process while adding torque monitoring and camera inspection.

The short cycle time can be achieved by an optimized operation sequence. The system is designed with ease of use and parts can easily be placed inside or removed from the system. The assembled parts are then orderly placed in the output tray without any intervention of an operator. This not only significantly increases the throughput and the yield but at the same time avoid any human errors or any unnecessary risks of damaging the parts.

The automated hinge assembly system is the perfect solution to increase your production throughput while boosting a higher quality of the final product.

Software Features

PROFESSIONAL SOFTWARE

Modular software architecture that supports various types of lenses. Intuitive software interface design for ease of operation.

COST EFFECTIVE

Ultra-high throughput and short cycle time and at the same time a very cost-effective solution to suit your need.

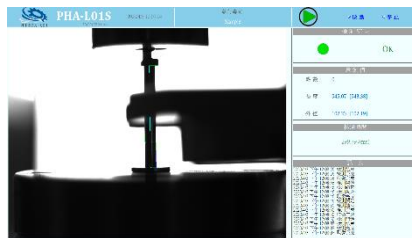
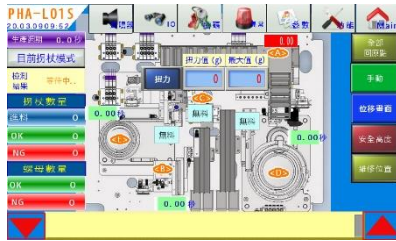
TECHNICAL SUPPORT

From pre-sales technical consultation to post-sales on-site installation and technical support, we provide world class professional support.

To learn more about the product and see it in action, please visit <https://youtu.be/Cuv5FmbdwdE>

For more information on any of our products or services please visit us on the Web at:

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Software GUI

- Support State-of-the-art fly-by visual system inspection of parts to ensure maximum throughput
- Intelligent Algorithm for fast assembly process
- Intuitive software interface
- Open process language for fast and easy process optimization

System Specification

| Model: PHA-L01S-A | |
|-----------------------|---------------------------------|
| Cycle Time Per Sample | Less than 8 seconds |
| Motor System | Servo motor system |
| Supported Screw Size | φ 2.8mm~ φ 15mm |
| Torque Control | 0-5000 gf-cm |
| Power | 3-phase, AC 220V, 50/60Hz |
| Compressed Air | 6 Kg/ cm ² 100L/min |
| Power Consumption | 2.0 KW |
| Dimensions | 650 (L) x 500 (W) x 1700 (H) mm |
| Weight | 200 Kg |

Specification subject to change without notice



Inside Working Chamber



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