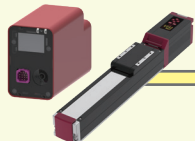


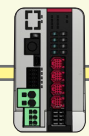
The ELECYLINDER widens the range of applications

ROBO Cylinder and single-axis robot-level features are now available with the ELECYLINDER, including current position monitoring, overload level monitoring, and motion settings.

ROBO Pump®



ELECYLINDER



RCON-GW



PLC



Monitor data output



Status signal output

Available with the optional MF (3-point positioning) feature!!



New Features

Monitor data/Status signal output

The following data can be output to the PLC. *Output is possible only when RCON-GW is connected.

Monitor data output

- | | |
|--|--|
| 1. Current position | 6. Total number of travels |
| 2. Current speed | 7. Current command value |
| 3. Deviation monitor current value | 8. Current active alarm code |
| 4. Overload level monitor | 9. Total travel distance |
| 5. Estimated regenerative discharge energy | 10. Current pressure value (only ROBO Pump®) |



Up to 3 data items can be selected!!

Status signals

1. Ready for operation
2. Missed push operation
3. Zone output
4. Home return complete
5. Minor alarm for failure
6. Communication status with EC

New Features

Setting for push/positioning

Operational conditions (Forward Motion)

Pressing force[%]

20

Operational conditions (Backward Motion)

Pressing force[%]

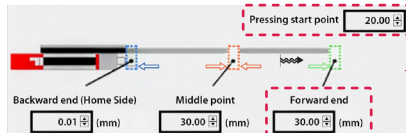
40

Push operation for both ends

Previously, push operation was limited to one stroke end, but it's now possible to configure push operation for both ends.

Push distance

In addition to the push start point, the push distance can be set.



Positioning width setting

Auto switch "LS" signal Detection range adjustment

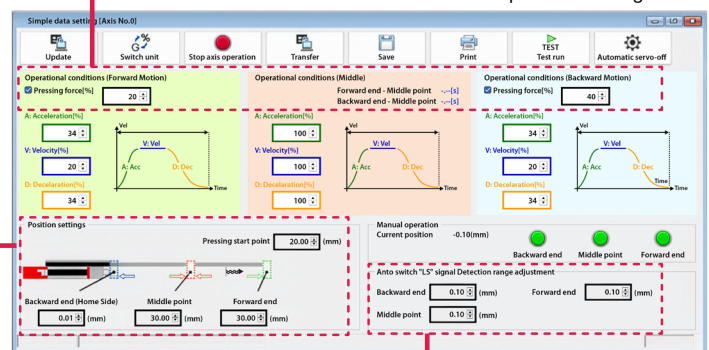
Backward end 0.10 (mm)

Forward end 0.10 (mm)

Middle point 0.10 (mm)

Positioning widths was previously limited to a single parameter setting. It can now be configured individually for the forward end, backward end, and intermediate points.

Simple data setting screen



Instruction manual available!

Refer to the instruction manual for more details.



Proposal for the visualization of equipment by expanded functionality

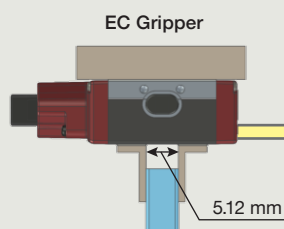
Expanded functionality provides wider range of applications

Visualization of the system status and data enables quantitative management and trend identification, helping to prevent failures and ensure quality.



Quantitative management

It outputs the current position, measures the workpiece size while gripping it, and performs a pass/fail judgment.



Current position output
5.12 mm

PLC



Judgment of Pass / Fail

Current position	Judgement
5.12 mm	Pass
5.11 mm	Pass
6.23 mm	Fail
4.74 mm	Fail
..	..
..	..

Judgment conditions: 5 mm, 2.5%

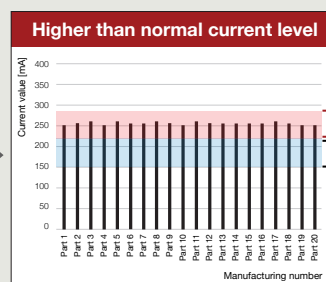
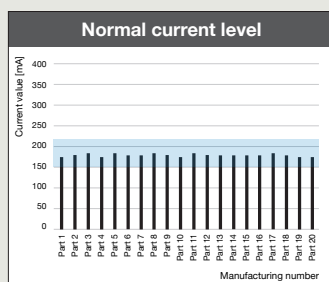
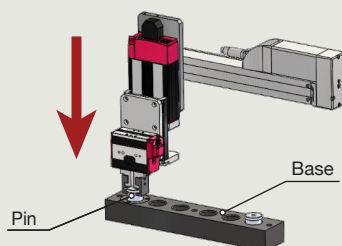
! Performing transfer and inspection simultaneously reduces a process.



Trend management

Current value data is acquired at the time of inserting the pin into the base.

Current value when inserting the pin...



Pin diameter, hole diameter of the base, or inserting position are irregular!

Irregular
Normal range

! Current values are recorded each time to find abnormal status by trend management.



Predictive maintenance

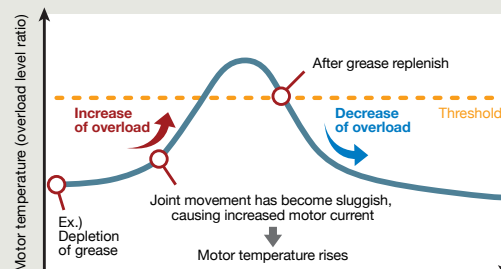
An overload level monitor is used to check the overload trend of the actuator.

When the overload level (%) rises,

- ✓ Increase of external load
- ✓ Depletion of grease



Check the actuator



! An overload level monitor detects signs of changes in the actuator load condition.

DISTRIBUTED BY:



Air-Oil Systems, Inc.

AUTOMATION SOLUTIONS

753 WAMBOLD ROAD SOUDERTON, PA 18964-2715

215.721.9595 800.333.5520 FAX 215.721.7666

www.airoil.com