

A comprehensive service provider  
of high-end intelligent tightening solutions  
Connecting the world more precisely



# Focused on Screw Fastening Tools



INTELLIGENT  
TIGHTENING SOLUTIONS

Current  
Type

0.02~50N.m

# Intelligent Tightening Tool



**High precision**

Repeatability accuracy can reach  $\pm 5\%$  Precise control algorithm  
CPK test consistently above 1.67



**Multitasking**

Supports 16 types of tightening task management  
Allows switching between different tasks freely  
Uses a multi-step tightening strategy



**traceable**

Supports saving 1 million torque data records  
Supports uploading torque data to MES  
Torque waveforms can be viewed and traced



**Strong error prevention**

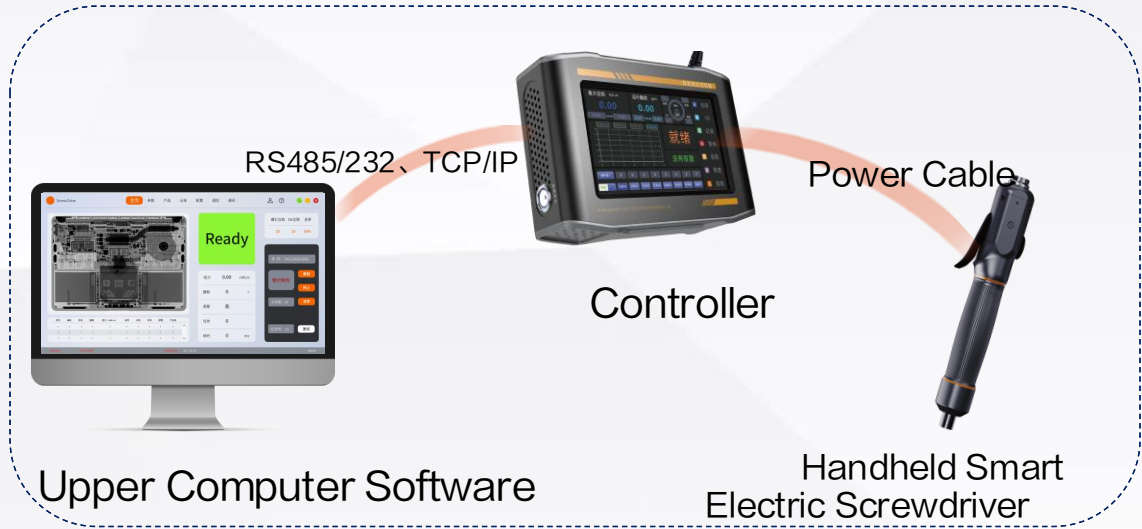
Supports screw floating height and stripped thread detection  
Abnormal monitoring during tightening process  
Effectively prevents leaks, misassembly, and errors



**Non-standard customization**

Can be customized according to different customer needs, use scenarios, and non-standard requirements

## Product Components



## Intelligent Operating System

- A more user-friendly interface with simple and intuitive operations, and real-time lock results
- Supports diverse functional applications, ensures smooth locking processes, and improves yield rates
- The host computer software seamlessly connects with the controller for convenient parameter settings.
- The locked data record shows that the tightening result is traceable
- Customize to your needs

## Dimensions



Upper Computer Software



Touch Program

# HL-series

## Standard

0.2 ~ 7.0 kgf.cm  
0.02 ~ 0.7 N.m



## Functional Characteristics

Patent design of ergonomic grip

Compact and space-saving, lightweight and easy to lock

The lock status light displays and provides voice feedback for clearer visibility.

The high-precision torque control algorithm achieves a repeatability accuracy of  $\pm 5\%$ , ensuring stable and reliable torque output.

## Aircraft Series

0.2 ~ 7.0 kgf.cm  
0.02 ~ 0.7 N.m



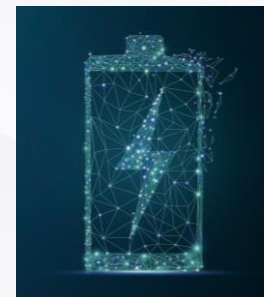
## Application Field



- 3C electronics
- Precision mechanism
- Automotive electronics
- Energy
- Military precision

## HL-Z Series

0.2 ~ 1.5 kgf.cm  
0.02 ~ 0.15 N.m



# HML-series



## Functional Characteristics

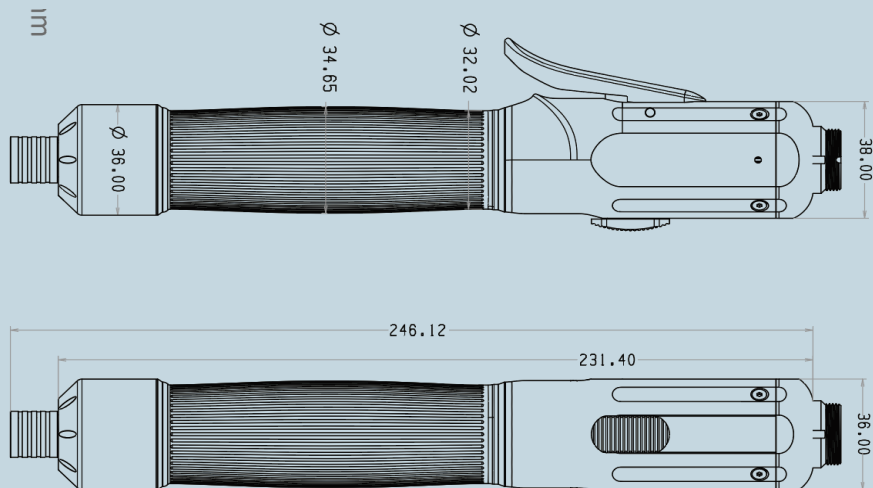
Patent design of ergonomic grip

New UI with real-time lock yield and tightening wave display

The lock status light displays and provides voice feedback for clearer visibility.

The high-precision algorithm, paired with a high-performance motor, delivers precise torque that shines through the body.

## Product Structure



# HL, HML Series Selection Table



## HL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HL-0215FL	0.2~1.5	4mm	±5%	30~1000	0.25	DC: 48V
JD-HL-0505FL	0.5~5.0	4mm	±5%	30~1500	0.3	DC: 48V
JD-HL-0107FL	1.0~7.0	4mm	±5%	30~1500	0.3	DC: 48V

## HML Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HML-0575FL	0.5~7.5	6.35 1/4	±5%	30~2000	0.55	DC: 72V
JD-HML-0114FL	1.0~14.0	6.35 1/4	±5%	30~2000	0.6	DC: 72V
JD-HML-0220FL	2.0~20.0	6.35 1/4	±5%	30~1300	0.6	DC: 72V
JD-HML-0535FL	5.0~35.0	6.35 1/4	±5%	30~1000	0.65	DC: 72V

# Hold the Classic Series

## HXL Series

3 ~ 60 kgf.cm  
0.3 ~ 6 N.m



## HDXL Series

5 ~ 300 kgf.cm  
0.5 ~ 30 N.m



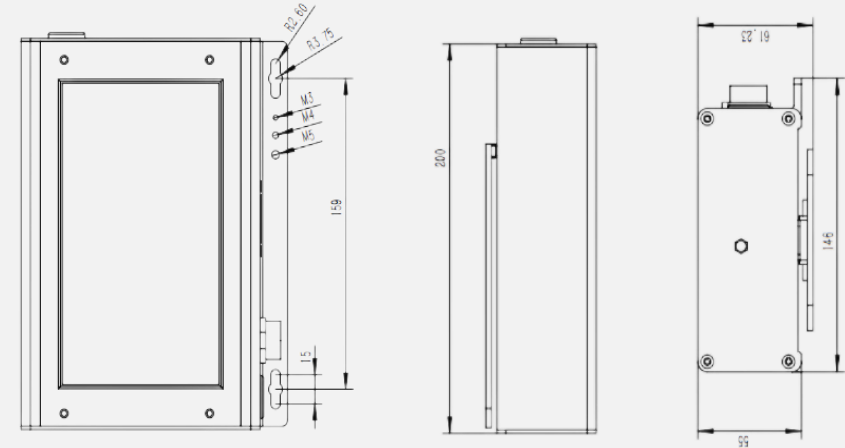
## HTXL Series

10 ~ 500 kgf.cm  
1 ~ 50 N.m

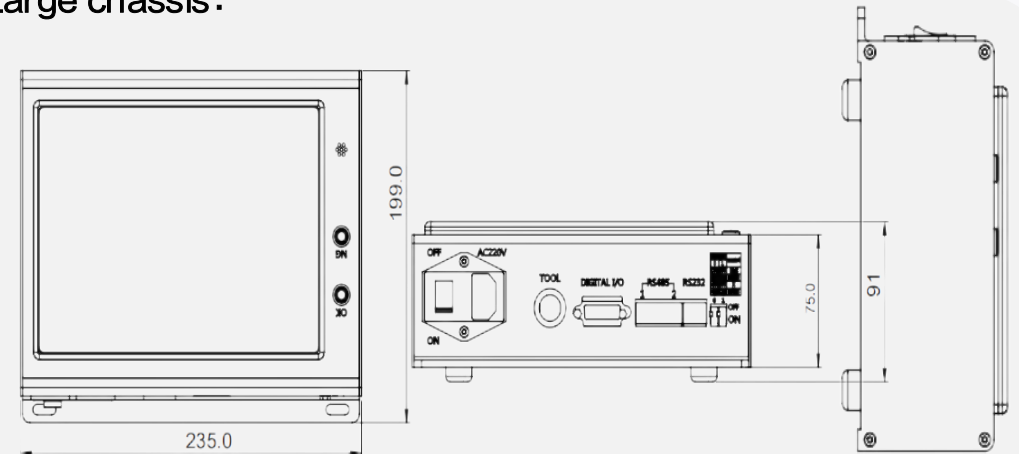


## Controller Size

Mini chassis:



Large chassis:





## Functional Features

- The compact controller takes up little space and is easy to install and move
- Includes USB port ①. Locked data can be directly exported from the USB drive.
- Antistatic design, supports voice announcement, and shows lock status in real time
- The structure and algorithm of the classic model after iteration update make the lock precise and stable
- Based on Modbus RTU, it supports multiple communication protocols including RS485/RS232 and TCP/IP.
- The high-definition touchscreen is responsive and allows you to set up various tasks, including screw counting, task chain management, and uploading MES data.
- Supports Chinese, English, and other international languages, as well as development for less common languages, to meet the needs of different countries and regions.

## Application Scenarios



- 3C electronics
- Precision mechanism
- Automotive electronics
- Energy
- Military precision

①: Large chassis, extended small chassis with USB port

# HXL Series



## HXL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HXL-0317FL	3.0~17.0	6.35 1/4	±5%	30~2000	0.65	DC: 72V
JD-HXL-0735FL	7.0~35.0	6.35 1/4	±5%	30~1000	0.65	DC: 72V
JD-HXL-0535FL	0.5~3.5	4mm	±5%	30~2000	0.5	DC: 72V
JD-HXL-0525FL	5.0~25.0	6.35 1/4	±5%	30~1500	0.65	DC: 72V
JD-HXL-0860FL	8.0~60.0	6.35 1/4	±5%	30~600	0.65	DC: 72V

## HDXL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HDXL-0550FL	5.0~50.0	6.35 1/4	±5%	30~800	0.9	DC: 72V
JD-HDXL-1090FL	10.0~90.0	6.35 1/4	±5%	30~600	0.9	DC: 72V
JD-HDXL-0528FL	5.0~28.0	6.35 1/4	±5%	30~1500	0.9	AC: 220V
JD-HDXL-5030FL	50.0~300.0	9.525 3/8	±5%	15~120	1.5	DC: 68V
JD-HDXL-4018FL	40.0~180.0	6.35 1/4	±5%	15~280	1.2	DC: 68V

## HTXL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HTXL-1080FL	10.0 ~ 80.0	6.35 1/4	±5%	30~800	1.8	DC: 68V
JD-HTXL-2012FL	20.0~ 120.0	6.35 1/4	±5%	30~600	1.8	DC: 68V
JD-HTXL-5022FL	50.0 ~ 220.0	6.35 1/4 9.525 3/8	±5%	30~300	2.0	DC: 68V
JD-HTXL-1050FL	100.0 ~ 500.0	9.525 3/8	±5%	15~150	2.0	DC: 68V
JD-HTXL-3014FL	30.0 ~ 140.0	9.525 3/8	±5%	15~450	2.6	DC: 68V

# Elbow Series

## HL Series

0.5 ~ 5 kgf.cm  
0.05 ~ 0.5 N.m



## HXL Series

3 ~ 48 kgf.cm  
0.3 ~ 4.8 N.m



## HDXL Series

5 ~ 250 kgf.cm  
0.5 ~ 25 N.m



## HTXL Series

100 ~ 450 kgf.cm  
10 ~ 45 N.m



## HFXL Series

150 ~ 2000 kgf.cm  
15 ~ 200 N.m



## Functional Characteristics

Bend design, narrow space, precise locking

Wide torque range, supports 0.05N.m~200N.m full range of solutions

The high precision torque control algorithm can achieve the repeatability accuracy of  $\pm 10\%$ , and the torque output is stable and reliable.

Support screw floating height, thread inspection and judgment, multi-speed precision control



# HL Series



## HL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HL-0505W	0.5~5.0	4mm	±10%	30~1500	0.3	DC: 48V

## HXL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HXL-0313W	3.0~13.0	6.35 1/4	±10%	30~2000	0.95	DC: 72V
JD-HXL-0728W	7.0~28.0	6.35 1/4	±10%	30~1000	0.95	DC: 72V
JD-HXL-0520W	5.0~20.0	6.35 1/4	±10%	30~1500	0.95	DC: 72V
JD-HXL-0848W	8.0~48.0	6.35 1/4	±10%	30~600	0.95	DC: 72V

## HDXL Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HDXL-0540W	5.0~40.0	6.35 1/4	±10%	30~800	1.5	DC: 72V
JD-HDXL-1070W	10.0~70.0	6.35 1/4	±10%	30~600	1.5	DC: 72V
JD-HDXL-0522W	5.0~22.0	6.35 1/4	±10%	30~1500	1.5	AC: 220V
JD-HDXL-5025W	50.0~250.0	6.35 1/4 9.525 3/8	±10%	15~120	2.2	DC: 68V
JD-HDXL-4016W	40.0~160.0	6.35 1/4 9.525 3/8	±10%	15~280	2.2	DC: 68V

# Bend Series Selection Table

## HTXL Bend Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HTXL-1045W	100.0~450.0	12.7 1/2	±10%	15 ~ 120	2.5	DC: 68V

## HFXL Bend Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HFXL-40200W	400.0~2000.0	19.05 3/4	±10%	10 ~ 20	5.8	DC: 68V
JD-HFXL-1565W	150.0~650.0	9.525 3/8	±10%	5 ~ 70	3.1	DC: 68V
JD-HFXL-2090W	200.0~900.0	12.7 1/2	±10%	5 ~ 40	3.4	DC: 68V

# Gun series

## HXL Gun Series

3 ~ 60 kgf.cm  
0.3 ~ 6 N.m



## Functional Characteristics

Grip-style structure for precise locking with various lateral locking requirements

The high-precision torque control algorithm achieves a repeatability accuracy of  $\pm 5\%$ , ensuring stable and reliable torque output.

Ergonomically designed for comfort and reduced fatigue

Support screw floating height, thread inspection and judgment, multi-speed precision control

## HDXL Gun Series

5 ~ 300 kgf.cm  
0.5 ~ 30 N.m



# Gun Series Selection Table

## HXL Gun Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HXL-0317Q	3.0~17.0	6.35 1/4	±5%	30~2000	0.65	DC: 72V
JD-HXL-0735Q	7.0~35.0	6.35 1/4	±5%	30~1000	0.65	DC: 72V
JD-HXL-0525Q	5.0 ~ 25.0	6.35 1/4	±5%	30~1500	0.65	DC: 72V
JD-HXL-0860Q	8.0~60.0	6.35 1/4	±5%	30~600	0.65	DC: 72V

## HDXL Gun Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HDXL-0550Q	5.0~50.0	6.35 1/4	±5%	30~800	1.4	DC: 72V
JD-HDXL-1090Q	10.0~90.0	6.35 1/4	±5%	30~600	1.4	DC: 72V
JD-HDXL-5030Q	50.0~300.0	9.525 3/8	±5%	15~120	1.4	DC: 68V
JD-HDXL-4018Q	40.0~180.0	6.35 1/4	±5%	15~280	1.4	DC: 68V

# Sensor Type

0.3~50N.m

## Smart Tightening Tool



### High Precision

The repeatability is up to  $\pm 3\%$ , the precision control algorithm is stable above 1.67.

### Multitasking

Supports 16 tightening task management options with flexible task switching. High-level tightening strategies are implemented for control.

### Back Traceable

Supports storage of up to 1 million tightening data records and upload to MES. All tightening waveforms are traceable.

### Strong Error-Proofing

Supports screw floating height, thread inspection, and abnormal tightening process monitoring to effectively prevent leaks, errors, and malfunctions.

### Customization

Customizable for different customer needs and usage scenarios

# sensor-series

## HXL SE Series

3 ~ 55 kgf.cm  
0.3 ~ 5.5 N.m



## HXL SE Aircraft Model

3 ~ 55 kgf.cm  
0.3 ~ 5.5 N.m



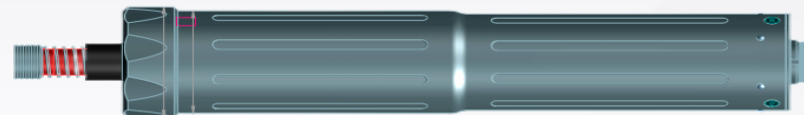
## HTXL SE Series

20 ~ 500 kgf.cm  
2.0 ~ 50.0 N.m



## HTXL SE Aircraft Model

20 ~ 500 kgf.cm  
2.0 ~ 50.0 N.m



## Functional Characteristics

With a high-precision torque sensor, the repeatability accuracy reaches  $\pm 3\%$ .

The process capability index is high, with stable torque output and a consistent CPK above 1.67.

It can realize multi-stage torque control from tooth entry to fitting and tightening to ensure the tightening quality

The shell is made of alloy material, with rich layers and high texture.



# Sensor Series Selection Table

## Handheld Sensor Model

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HXL-0317-SE	3.0~17.0	6.35 1/4	±3%	30~600	1.02	DC: 72V
JD-HXL-0735-SE	7.0~35.0	6.35 1/4	±3%	30~600	1.02	DC: 72V
JD-HXL-0855-SE	8.0~55.0	6.35 1/4	±3%	30~500	1.02	DC: 72V
JD-HTXL-2012-SE	20.0~ 120.0	6.35 1/4	±3%	30~600	1.95	DC: 68V
JD-HTXL-5022-SE	50.0 ~ 220.0	6.35 1/4 9.525 3/8	±3%	30~300	2.0	DC: 68V
JD-HTXL-1050-SE	100.0 ~ 500.0	9.525 3/8	±3%	15~150	2.16	DC: 68V

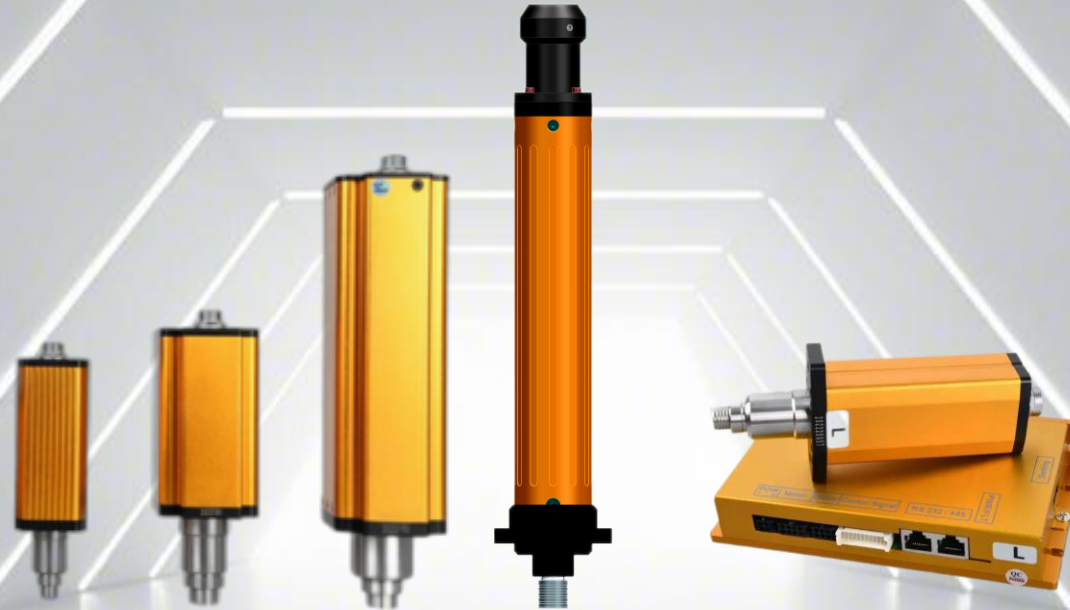
## Machine Sensor Model

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HXL-A0317-SE	3.0~17.0	6.35 1/4	±3%	30~600	1.02	DC: 72V
JD-HXL-A0735-SE	7.0~35.0	6.35 1/4	±3%	30~600	1.02	DC: 72V
JD-HXL-A0855-SE	8.0~55.0	6.35 1/4	±3%	30~500	1.02	DC: 72V
JD-HTXL-A2012-SE	20.0 ~ 120.0	6.35 1/4	±3%	30~600	1.95	DC: 68V
JD-HTXL-A5022-SE	50.0~ 220.0	6.35 1/4 9.525 3/8	±3%	30~300	2.0	DC: 68V
JD-HTXL-A1050-SE	100.0 ~ 500.0	9.525 3/8	±3%	15~150	2.16	DC: 68V

Aeronautical  
Type

0.01~100N.m

# Smart Tightening Tool



## High Precision

The repeatability is up to  $\pm 5\%$ , the precision control algorithm is stable above 1.67.

## multitasking

Supports 16 tightening task management options with flexible task switching. Uses multi-step tightening strategy.

## Backtraceable

Supports storage of up to 1 million tightening data records and MES upload. All tightening waveforms are traceable.

## strong error-proofing

Supports screw floating height and thread inspection, monitors abnormal tightening processes, provides real-time IO output, and allows easy monitoring of locking results.

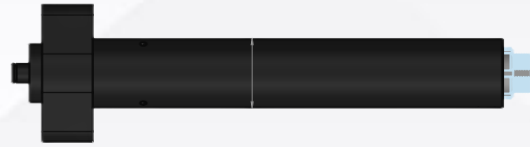
## Customization

Customizable for different customer needs and usage scenarios

# Machine Series

## HL Series

0.2 ~ 7 kgf.cm  
0.02 ~ 0.7 N.m



## HML Series

0.5 ~ 35 kgf.cm  
0.05 ~ 3.5 N.m



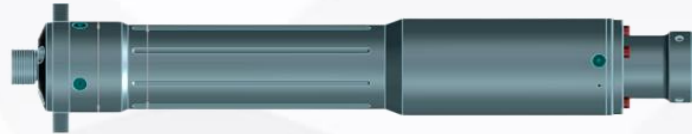
## HXL Series

3 ~ 60 kgf.cm  
0.3 ~ 6 N.m



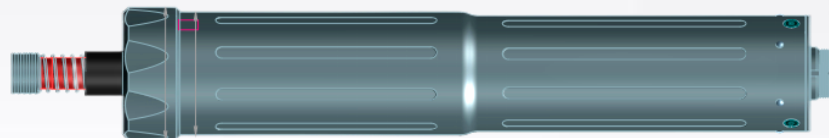
## HDXL Series

5 ~ 300 kgf.cm  
0.5 ~ 30 N.m



## HTXL Series

20 ~ 500 kgf.cm  
2 ~ 50 N.m



## Functional Characteristics

The circular motor design allows installation in tight spaces with easy setup and precise locking.

The high-definition touchscreen features instant response and customizable tasks, with screw counting and task chain management support.

The repeatability is  $\pm 5\%$  and the sensor type is  $\pm 3\%$ .

Supports screw floating height, thread inspection and judgment, multi-speed, and multi-step precision control



# Machine Series Selection Table

## HL Machine Series

model	torque range (kgf.cm)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-HL-0215-A	0.2~1.5	4mm	±5%	30~1000	0.25	DC: 48V
JD-HL-0505-A	0.5~5.0	4mm	±5%	30~1500	0.3	DC: 48V
JD-HL-0107-A	1.0~7.0	4mm	±5%	30~1500	0.3	DC: 48V

## HML Machine Series

model	torque range (kgf.cm)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-HML-0575-A	0.5~7.5	6.35 1/4	±5%	30~2000	0.55	DC: 72V
JD-HML-0114-A	1.0~14.0	6.35 1/4	±5%	30~2000	0.6	DC: 72V
JD-HML-0220-A	2.0~20.0	6.35 1/4	±5%	30~1300	0.6	DC: 72V

## HXL Machine Series

model	torque range (kgf.cm)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-HXL-0317-A	3.0~17.0	6.35 1/4	±5%	30~2000	0.65	DC: 72V
JD-HXL-0735-A	7.0~35.0	6.35 1/4	±5%	30~1000	0.65	DC: 72V
JD-HXL-0535-A	0.5~3.5	4mm	±5%	30~2000	0.5	DC: 72V
JD-HXL-5025-A	5.0~25.0	6.35 1/4	±5%	30~1500	0.65	DC: 72V
JD-HXL-0860-A	8.0~60.0	6.35 1/4	±5%	30~600	0.65	DC: 72V

# Machine Series Selection Table

## HDXL Machine Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HDXL-0550-A	5.0~50.0	6.35 1/4	±5%	30~800	0.9	DC: 72V
JD-HDXL-1090-A	10.0~90.0	6.35 1/4	±5%	30~600	0.9	DC: 72V
JD-HDXL-0528-A	5.0~28.0	6.35 1/4	±5%	30~1500	0.9	AC: 220V
JD-HDXL-5030-A	50.0~300.0	9.525 3/8	±5%	15~120	1.5	DC: 68V
JD-HDXL-4018-A	40.0~180.0	6.35 1/4	±5%	15~280	1.2	DC: 68V

## HTXL Machine Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-HTXL-2012-A	20.0~ 120.0	6.35 1/4	±5%	30~600	1.8	DC: 68V
JD-HTXL-5022-A	50.0 ~ 220.0	6.35 1/4 9.525 3/8	±5%	30~300	2.0	DC: 68V
JD-HTXL-1050-A	100.0 ~ 500.0	9.525 3/8	±5%	15~150	2.0	DC: 68V
JD-HTXL-3014-A	30.0 ~ 140.0	9.525 3/8	±5%	15~450	2.6	DC: 68V

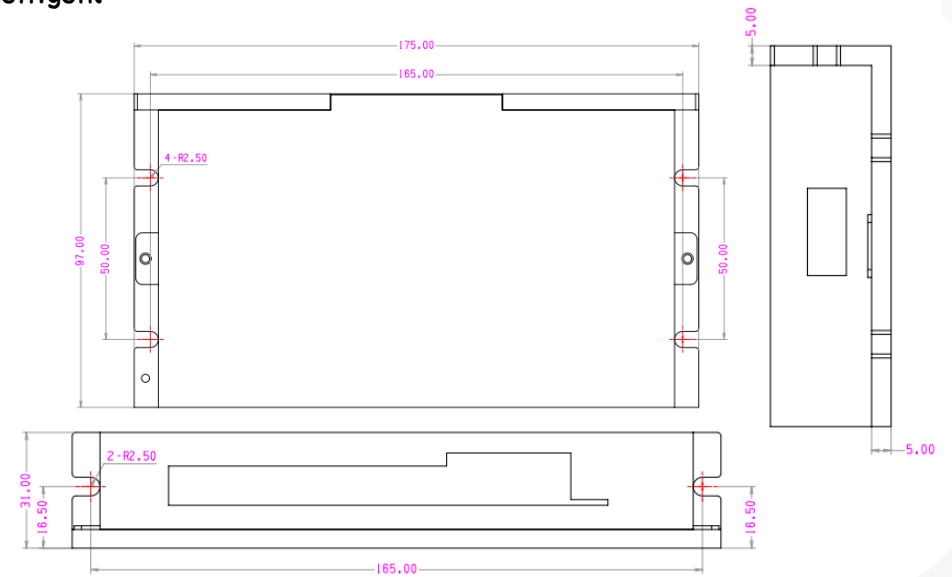
# Machine Intelligence Series

0.1 ~ 1000 kgf.cm  
0.01 ~ 100.0 N.m



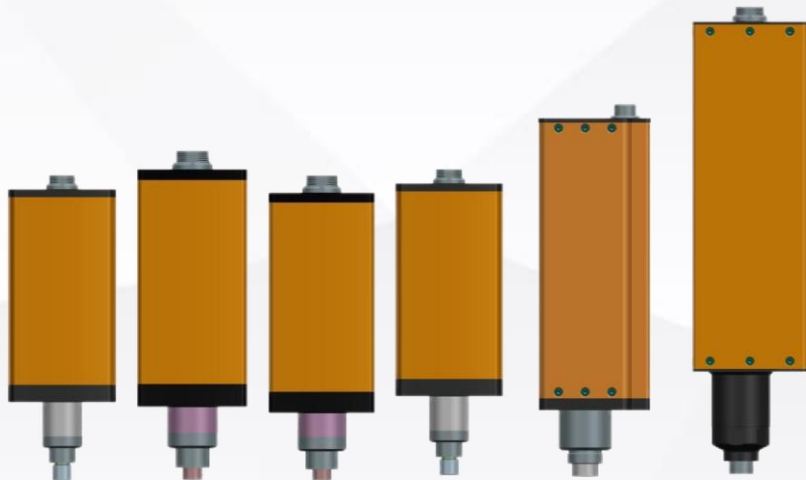
## Controller Dimensions

Machine Intelligent Controller

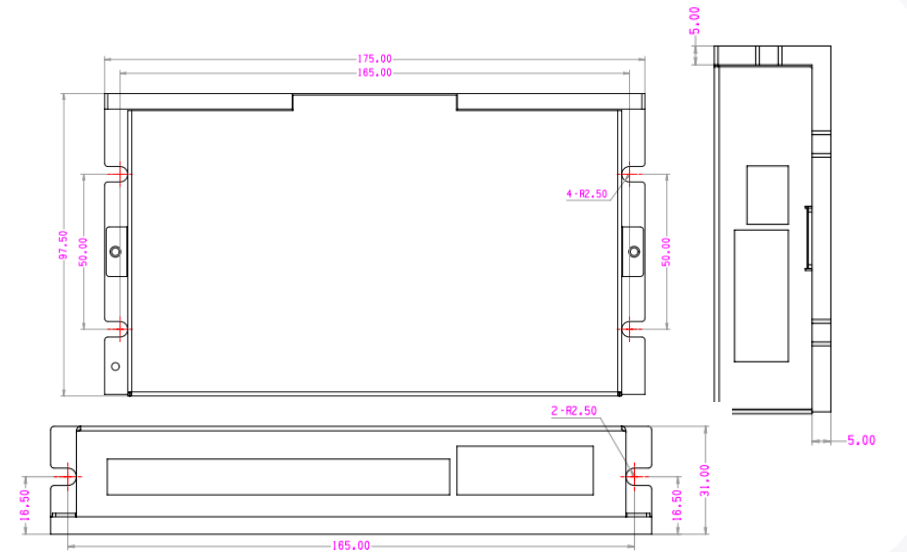


# Machine Intelligent Servo Series

0.5 ~ 400 kgf.cm  
0.05 ~ 40.0 N.m



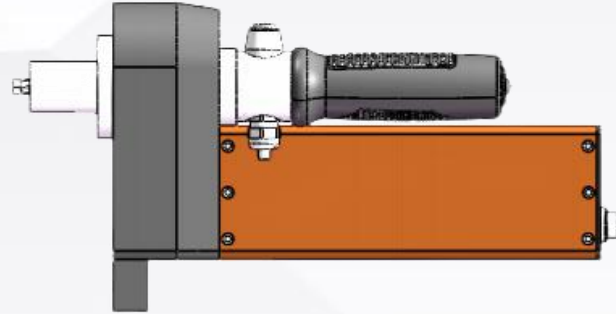
Intelligent Servo Controller



# Z-Axis for Machine Series

## Button FXL-003-Z

250.0 ~ 1000.0 kgf.cm  
25.0 ~ 100.0 N.m



## Functional Characteristics

Z-axis design, narrow space, precise locking

The high precision torque control algorithm can achieve the repeatability accuracy of  $\pm 5\%$ , and the sensor type can achieve the repeatability accuracy of  $\pm 3\%$ .

Supports screw floating height, thread inspection and judgment, multi-speed, and multi-step precision control

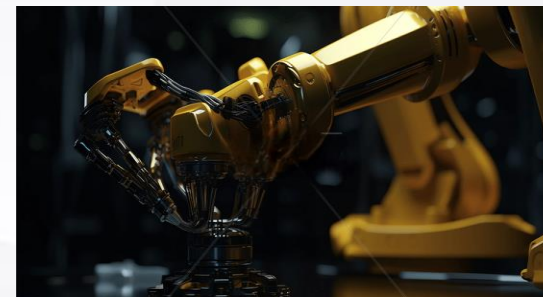
Customizable based on the customer's actual on-site requirements

## JD-0317-SE-Z-A

3.0 ~ 17.0 kgf.cm  
0.3 ~ 1.7 N.m



## Application Scenarios



- 3C electronics
- Precision mechanism
- Automotive electronics
- Energy
- Military precision

## Functional Features

- Automate and smart processes to reduce labor costs and ensure efficiency
- High-quality imported motors are used, ensuring excellent stability and minimal torque loss.
- Supports floating height and sliding thread inspection with intelligent early warning, boosting both production capacity and yield efficiency.
- The compact controller takes up minimal space, features an anti-static design, and is easy to install and move
- Compatible with touchscreens, the software allows quick parameter adjustments and other settings for convenience and practicality.
- It has a wide application range, compatible with various PLCs, multiple board systems, and feeding modules for locking.
- Based on Modbus RTU, it supports multiple communication protocols including RS485/RS232 and TCP/IP.



## Application Scenarios



- 3C electronics
- Precision mechanism
- Automotive electronics
- Energy
- Military precision

# Intelligent Servo Selection Table

# Smartphone Selection Table



## Product Parameter

model	torque range (kgf.cm)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-SML-0505	0.5-5.0	4 5mm	±5%	10-4500	0.8	DC: 48V
JD-SXL-0109	1.0-9.0	4 5mm	±5%	10-4500	0.9	DC: 48V
JD-SDXL-0325	3.0-25.0	6.35 1/4	±5%	10-1500	1.6	DC: 48V
JD-SDXL-0433	4.0-33.0	6.35 1/4	±5%	10-1100	1.6	DC: 48V
JD-SDXL-0540	5.0-40	6.35 1/4	±5%	10-890	1.6	DC: 48V
JD-SDXL-0864	8.0-64.0	6.35 1/4	±5%	10-560	1.6	DC: 48V
JD-SXL-0318	3.0-18.0	5mm 1/4	±5%	10-1500	1.45	DC: 48V
JD-SXL-1036	10.0-36.0	5mm 1/4	±5%	10-2400	1.8	DC: 60V
JD-STXL-1511	15.0-110.0	6.35 1/4	±5%	10-800	2.8	DC: 60V
JD-STXL-3013	30.0-130.0	6.35 1/4	±5%	10-600	3.15	DC: 60V
JD-STXL-4016	40.0-160.0	1/4 3/8	±5%	10-480	3.15	DC: 60V
JD-STXL-6028	60.0-280.0	9.525 3/8	±5%	10-300	3.45	DC: 60V
JD-STXL-8040	80.0-400.0	9.525 3/8	±5%	10-200	3.45	DC: 60V

## Product Parameter

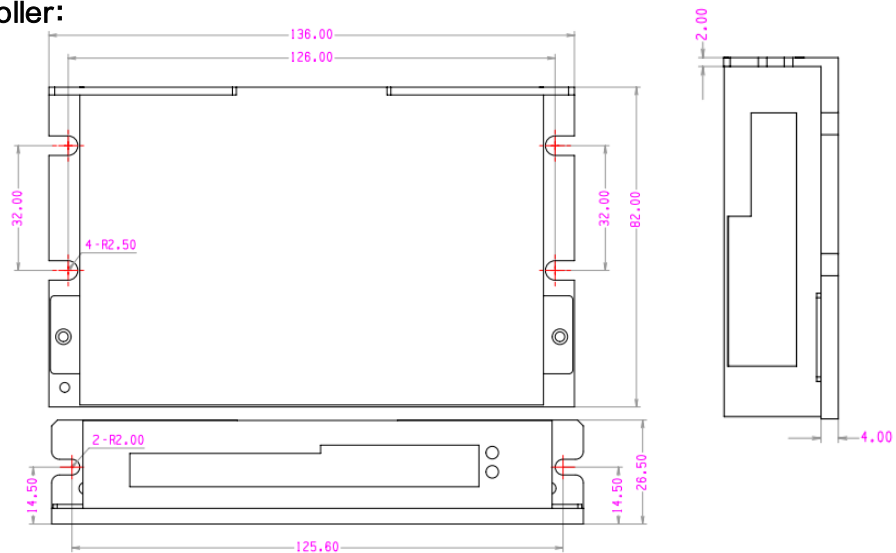
model	torque range (kgf.cm)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-S-0108	0.1-0.8	4mm	±5%	30-1200	0.4	DC: 48V
JD-L-0302	0.3-2.0	4mm	±5%	30-1200	0.47	DC: 48V
JD-ML-0104	1.0-4.0	4mm	±5%	30-1200	0.68	DC: 48V
JD-XL-0258	2.5-8.0	4mm	±5%	30-1200	0.82	DC: 48V
JD-DXL-6023	6.0-23.0	6.35 1/4	±5%	30-1200	1.58	DC: 90V
JD-TXL-2080	20.0-80.0	6.35 1/4	±5%	30-600	2.36	DC: 90V
JD-XL-5015	50.0-150.0	6.35 1/4	±5%	30-300	2.36	DC: 90V
JD-TXL-6018	60.0-180.0	6.35 1/4	±5%	30-300	2.35	DC: 90V
JD-TXL-2060	20.0-60.0	6.35 1/4	±5%	30-900	2.35	DC: 90V
JD-FXL-1040	100.0-400.0	9.525 3/8	±5%	30-150	3.35	DC: 90V
JD-FXL-25100	250.0-1000.0	12.7 1/2	±5%	10-50	3.37	DC: 90V

# Servo Series



## Controller Dimensions

Servo Controller:



## Functional Characteristics

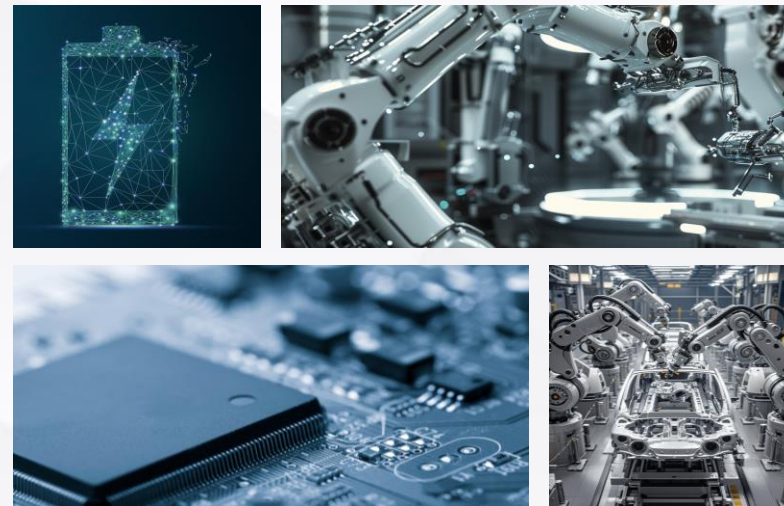
It has a wide application range, compatible with various PLCs, multiple board systems, and feeding modules for locking.

Equipped with a high-precision torque control algorithm, the repeatability accuracy can reach  $\pm 5\%$ .

Supports floating height and sliding thread inspection with intelligent early warning, boosting both production capacity and yield efficiency.

Automate and smart processes to reduce labor costs and ensure efficiency

## Application Scenarios



- 3C electronics
- Precision mechanism
- Automotive electronics
- Energy
- Military precision

# Series Selection Table for Servo Systems

## SDL Optical Compilation Series

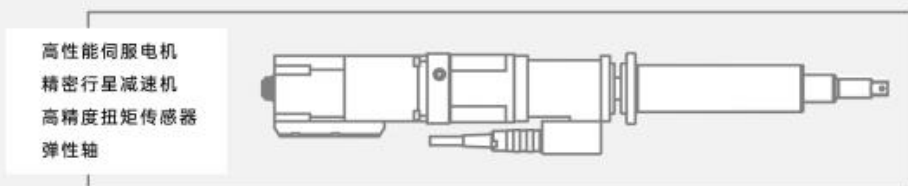
model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-500-VB	0.5-5.0	4mm 5mm	±5%	30-3000	0.4	DC: 48V
JD-900-VB	1.0-9.0	4mm 5mm	±5%	30-3000	0.5	DC: 48V
JD-1800-VB	3.0-18.0	5mm 1/4	±5%	30-2000	0.9	DC: 48V
JD-2500-VB	3.0-25.0	5mm 1/4	±5%	30-2000	1.2	DC: 60V
JD-3600-VB	10.0-36.0	5mm 1/4	±5%	30-2000	1.2	DC: 60V

## SDL Magnetic Compilation Series

model	torque range ( kgf.cm )	output shaft ( mm / in )	repeatability precision	range of speeds ( rpm )	weight ( kg )	Power supply ( V )
JD-500-CB	0.5-5.0	4mm 5mm	±5%	30-3000	0.4	DC: 48V
JD-900-CB	1.0-9.0	4mm 5mm	±5%	30-3000	0.5	DC: 48V
JD-1800-CB	3.0-18.0	5mm 1/4	±5%	30-2000	0.9	DC: 48V
JD-2500-CB	3.0-25.0	5mm 1/4	±5%	30-2000	1.2	DC: 60V
JD-3600-CB	10.0-36.0	5mm 1/4	±5%	30-2000	1.2	DC: 60V

# Servo Tightening Shaft

7 ~ 1200N.m



## Accurate control algorithm

Supports 7~1200N.m maximum torque repeatability accuracy of  $\pm 3\%$  CPK stable above 1.67

## multiple task

Supports 16 task management, multi-channel I/O signals, and multi-speed precise torque control

## Intelligent data processing

Supports storage of up to 1 million tightening data records and upload to MES system. All tightening waveforms are traceable.

## Intelligent data processing

The Modbus RTU supports multiple communication protocols including RS485/RS232 and TCP/IP.





#Application Scenarios

Automobile  
Manufacturing



#Application Scenarios

Energy:  
Wind Power



#Application Scenarios

Aerospace

# Servo tightening shaft selection table

## Sensor Based Tightening Shaft

model	torque range (N.m)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-SE-0735	7.0-35.0	12.7 1/2	±3%	5-500	5.7	DC: 220V
JD-SE-1565	15.0-65.0	12.7 1/2	±3%	5-240	6.4	DC: 220V
JD-SE-5020	50.0-200.0	19.05 3/4	±3%	5-80	11.5	DC: 220V
JD-SE-6030	60.0-300.0	19.05 3/4	±3%	5-50	11.5	DC: 220V
JD-SE-6035	60.0-350.0	19.05 3/4	±3%	5-130	26	DC: 220V
JD-SE-0156	150.0-600.0	25.4 1	±3%	5-70	30.5	DC: 220V
DP-SE-0312	300.0-1200.0	38.1 1 1/2	±3%	5-45	46	DC: 220V

## Current Type Tightening Shaft

model	torque range (N.m)	output shaft (mm / in)	repeatability precision	range of speeds (rpm)	weight (kg)	Power supply (V)
JD-SCH-0735	7.0-35.0	12.7 1/2	±5%	5-500	5.7	DC: 220V
JD-SCH-1565	15.0-65.0	12.7 1/2	±5%	5-240	6.4	DC: 220V
JD-SCH-5020	50.0-200.0	19.05 3/4	±5%	5-80	11.5	DC: 220V
JD-SCH-6030	60.0-300.0	19.05 3/4	±5%	5-50	11.5	DC: 220V
JD-SCH-6035	60.0-350.0	19.05 3/4	±5%	5-130	26	DC: 220V
JD-SCH-0156	150.0-600.0	25.4 1	±5%	5-70	30.5	DC: 220V
JD-SCH-0312	300.0-1200.0	38.1 1 1/2	±5%	5-45	46	DC: 220V

A comprehensive service provider  
of high-end intelligent tightening solutions  
Connecting the world more precisely



## High-end intelligent fastening solution integrated service provider



Connecting the world more precisely



INTELLIGENT  
TIGHTENING SOLUTIONS