





### K-DUCER Transducerized Screwdrivers | Torque range 0.1 – 15 Nm

K-Ducer is the new A-class intelligent transducerized assembly system from Kolver, the electric tool pioneer since 1989.

The system consists of an advanced state-of-the-art controller and a range of handheld and fixtured electric screwdrivers with torque up to 15 Nm (to be extended to 50 Nm soon).

### Finest accuracy and precision

KDS transducerized electric tools cover all assembly line requirements for an accurate, high-quality torque and angle-controlled tightening experience.

A built-in compact transducer provides torque control with excellent repeatability.

### **Excellent ergonomics**

KDS screwdrivers feature unsurpassed ergonomics, soft touch design, status LED, temperature protection combined with full traceability and error-proofing capabilities.

Available in straight, pistol and fixture configuration.

### Connectivity and Industry 4.0

KDS tools are the ideal solution for your Industry 4.0 production line. Built-in LED lights give you immediate feedback on each tightening process, i.e. you'll be able to check at a glance whether the part is correctly tightened or not.

KDS screwdrivers work in combination with KDU control units to gather, analyse and process detailed assembly information.

Their built-in transducer continuously reads torque and position of the screw and sends the gathered data to the KDU controller for analysis.

### **Available Housings**



INLINE (KDS-PL) – Inline versions available in lever start. ESD-safe option available on models KDS-PL /ESD.



PISTOL GRIP – Trigger start, pistol grip available with top connector (KDS-PL P/U) or bottom connector (KDS-PL P). Also available in ESD-safe option (KDS-PL P/ESD and KDS-PL P/U/ESD).



ALUMINIUM BODY (KDS-PL CA) – Specifically designed for automation. Easy to install on any machine or robot.

Version with flange mount available



## Transducerized Screwdrivers / K-DUCER Series

### Inline KDS Screwdrivers

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
175015	KDS-MT1.5	0.1 - 1.5	50 - 850	254 x 52	0.7	Hex 1/4"
135006	KDS-PL6	0.5 - 6	50 - 850	251 x 52	0.7	Hex 1/4"
135010	KDS-PL10	0.8 - 10	50 - 600	251 x 52	0.7	Hex 1/4"
135015	KDS-PL15	0.5 - 15	50 - 320	251 x 52	0.7	Hex 1/4"

### Pistol grip KDS Screwdrivers

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
175016	KDS-MT1.5P	0.1 - 1.5	50 - 850	186 x 172 x 50	0.7	Hex 1/4"
135007	KDS-PL6P	0.5 - 6	50 - 850	186 x 170 x 50	0.7	Hex 1/4"
135011	KDS-PL10P	0.8 - 10	50 - 600	186 x 170 x 50	0.7	Hex 1/4"
135016	KDS-PL15P	0.5 - 15	50 - 320	186 x 170 x 50	0.7	Hex 1/4"

### Inline KDS Screwdrivers in ESD-safe housing

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
175015/ESD	KDS-MT1.5/ESD	0.1 - 1.5	50 - 850	254 x 52	0.7	Hex 1/4"
135006/ESD	KDS-PL6/ESD	0.5 - 6	50 - 850	251 x 52	0.7	Hex 1/4"
135010/ESD	KDS-PL10/ESD	0.8 - 10	50 - 600	251 x 52	0.7	Hex 1/4"
135015/ESD	KDS-PL15/ESD	0.5 - 15	50 - 320	251 x 52	0.7	Hex 1/4"

### Pistol grip KDS Screwdrivers in ESD-safe housing

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
175016/ESD	KDS-MT1.5P/ESD	0.1 - 1.5	50 - 850	186 x 172 x 50	0.7	Hex 1/4"
135007/ESD	KDS-PL6P/ESD	0.5 - 6	50 - 850	186 x 170 x 50	0.7	Hex 1/4"
135011/ESD	KDS-PL10P/ESD	0.8 - 10	50 - 600	186 x 170 x 50	0.7	Hex 1/4"
135016/ESD	KDS-PL15P/ESD	0.5 - 15	50 - 320	186 x 170 x 50	0.7	Hex 1/4"

### Aluminium housing KDS Screwdrivers

Code	Model	Torque Nm	RPM min-max	<b>Dimensions mm</b>	Weight kg	Bit Drive
175115	KDS-MT1.5CA	0.1 - 1.5	50 - 850	237 x 40	0.9	Hex 1/4"
135106	KDS-PL6CA	0.5 - 6	50 - 850	248 x 40	0.9	Hex 1/4"
135110	KDS-PL10CA	0.8 - 10	50 - 600	248 x 40	0.9	Hex 1/4"
135115	KDS-PL15CA	0.5 - 15	50 - 320	248 x 40	0.9	Hex 1/4"

### Aluminium housing KDS Screwdrivers with flange mount

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
175115/FN	KDS-MT1.5CA/FN	0.1 - 1.5	50 - 850	316 x 40	1.1	Sq 3/8"
135106/FN	KDS-PL6CA/FN	0.5 - 6	50 - 850	350 x 40	1.1	Sq 3/8"
135110/FN	KDS-PL10CA/FN	0.8 - 10	50 - 600	350 x 40	1.1	Sq 3/8"
135115/FN	KDS-PL15CA/FN	0.5 - 15	50 - 320	350 x 40	1.1	Sq 3/8"

### Angle head KDS Screwdrivers

Code	Model	Torque Nm	RPM min-max	Dimensions mm	Weight kg	Bit Drive
135006/A	KDS-PL6/ANG	0.5 - 5.5	50 - 850	288 x 52	0.7	Hex 1/4"
135010/A	KDS-PL10/ANG	0.8 - 9	50 - 600	288 x 52	0.7	Hex 1/4"
135015/A/1-4	KDS-PL15/ANG/1-4	0.5 - 12	50 - 320	326 x 52	0.9	Hex 1/4"

2D and 3D drawings available on kolver.it // IMPORTANT: Continuous use over 80% of torque range is not recommended.

KDS Screwdrivers work in combination with KDU series controllers. See page 10 for further information.





### **KDU-1 Controllers** | K-Ducer Power Units

The KDU-1 Series of controllers give you full control of your fastening operation in an industry leading compact size.

### Features

With features like touch screen color display, multiple programs and sequences, intuitive programming interface, torque and angle control and graphs output, the KDU-1 units provide unmatched performance and value.

### Easy to use

Set-up and operation are really an easy task. Units may be programmed either through the touch screen or via a PC software.

### Different models, plenty of options

The power unit comes in two versions depending on the functionality level required.

The KDU-1 basic unit includes serial and USB ports.

In addition to that, KDU-1A advanced controllers feature a Modbus TCP communication port.

Most communication protocols are available with the support of external modules.

KDU controllers will operate all KDS series of tools.

### Connectivity and Industry 4.0

Industry  $4.0^{\circ}$  – The Fourth Industrial Revolution – is driving the evolution of the assembly process. The digitalization of manufacturing and assembly means shifting the way we look at manufacturing in terms of production optimization and automation.

The more informed you are, the better decisions you can make. Having smart tools on your line means that you have specific tightening information fed into the production system – information concerning critical details of your components, materials and tightening process. This provides a valuable opportunity to increase efficiency and results in pro-active problem solving, alongside with considerable energy savings from efficiency improvements.

### KDU control units

Code	Model	Weight kg	Dimensions mm
035001	KDU-1	2.5	190 x 205 x 120
035001/A	KDU-1A	2.5	190 x 205 x 120

### Optional supports

A table stand or wall mount are available for KDU units.

Wall mounts can be easily installed on any vertical surface and allow KDU controllers to tilt up/down and left/right – place your KDU unit anywhere and adjust its position to best suit your needs.

A table stand ensures quick access to cables when placing your KDU unit on a flat surface. It is the best option in case you'd like to keep your KDU controller right at hand.

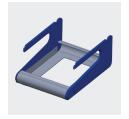




Table Stand

Wall Bracket

### Supports for KDU control units

Code	Model	Description
010400	Table stand	For table use
010401	Wall mount tilting bracket	For wall or column use



# Controllers for Transducerized Screwdrivers / K-DUCER Series

Features	<b>KDU-1</b> Basic	KDU-1A Advanced
5" Touch Screen	•	•
Number of programs	64	64
Sequences	8	8
20 Input NPN	•	•
21 Outputs	•	•
Torque graph	•	•
Bar code reading	•	•
Torque & angle control	•	•
Multiple parameters	•	•
RS 232 (2)	•	•
Mini USB	•	•
USB	•	•
Modbus TCP		•
Devicenet		+
CC-Link		+
Profibus		+
Ethernet / IP		+
Profinet		+
Profinet FO		+
Ethercat		+
CC-Link IE Field		+
Powerlink		+

<sup>+</sup> = Requires separate module to convert Modbus TCP to the desired protocol

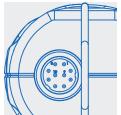






# **Cables** | K-Ducer Screwdrivers and Control Units

Cables are required to complete any K-Ducer system, as they connect KDS screwdrivers to KDU control units. They're made of sturdy materials to guarantee exceptional resistance to wear and tear. Also, they're superquick to connect thanks to their one-click connector. Two different lengths (2.5 m and 5 m) are available to meet any production requirement.







Unit connector (KDU view)

### Cables to connect KDS screwdrivers to KDU units

Code	Model	Description
250064	Cable 2.5 m	M16 10pin 2.5 m
250064/H	Cable 2.5 m, heavy duty	M16 10pin 2.5 m
250564	Cable 5 m	M16 10pin 5 m
250564/H	Cable 5 m, heavy duty	M16 10pin 5 m