

It's All About
Partnership.
And Choices.



KeDrive motors
Energy efficient and cost effective.

KEBA[®]
Automation by innovation.

It's All About Partnership. And Choices.

Automation solutions become a success factor when they give our customers the freedom to make the most of their competitive advantage. A good relationship needs space.

The KEBA Formula

It is this unique mixture of creativity, enthusiasm, determination and enjoyment of working together that makes our employees KEBAans.



Working in agile teams provides an excellent breeding ground for encouraging the development of different talents and personalities. As part of an organisation with flat hierarchies, it is the people who work here that create a very special working atmosphere. Creating an environment in which you can really feel the innovation.



KeDrive servomotors

The perfect servomotor for your application

KeDrive servomotors provide a wide range of solutions for your motion or positioning requirements. They stand out for their high power density and come in NEMA and IEC flange sizes.

In addition to our standard series, we also provide high-dynamic motors with increased torque density.

KeDrive servomotors

- // Flange sizes 40 ... 270 mm
- // Power 50 ... 40,000 W
- // Torque range 0.18 ... 390 Nm
- // DC link voltages 24, 48, 320 and 560 V_{DC}
- // Scalable mass inertia moments 0.03 ... 622 kg cm²

Our motors are perfectly suited to many positioning and motion tasks in general automation, medical engineering, intralogistics, robotics, for machine tools, sheet metal processing, injection molding and wind energy.

KeDrive motors provide optimal interaction with our drive controllers and control systems. KEBA provides a modular system that includes all components you need to automate your machine.



- // Compatibility thanks to variable flange (IEC / NEMA) and shaft sizes
- // Compact installation space thanks to custom connection technology
- // Top power density in a compact design
- // High overload capacity for safe processes
- // Maximum dynamics at efficient costs
- // Electronic rating plate for automated commissioning and service
- // Increased availability with condition monitoring

Standard options

Variable adaptations through modular design

KeDrive servomotors provide many options that can be adapted to the needs of your machine.

Options

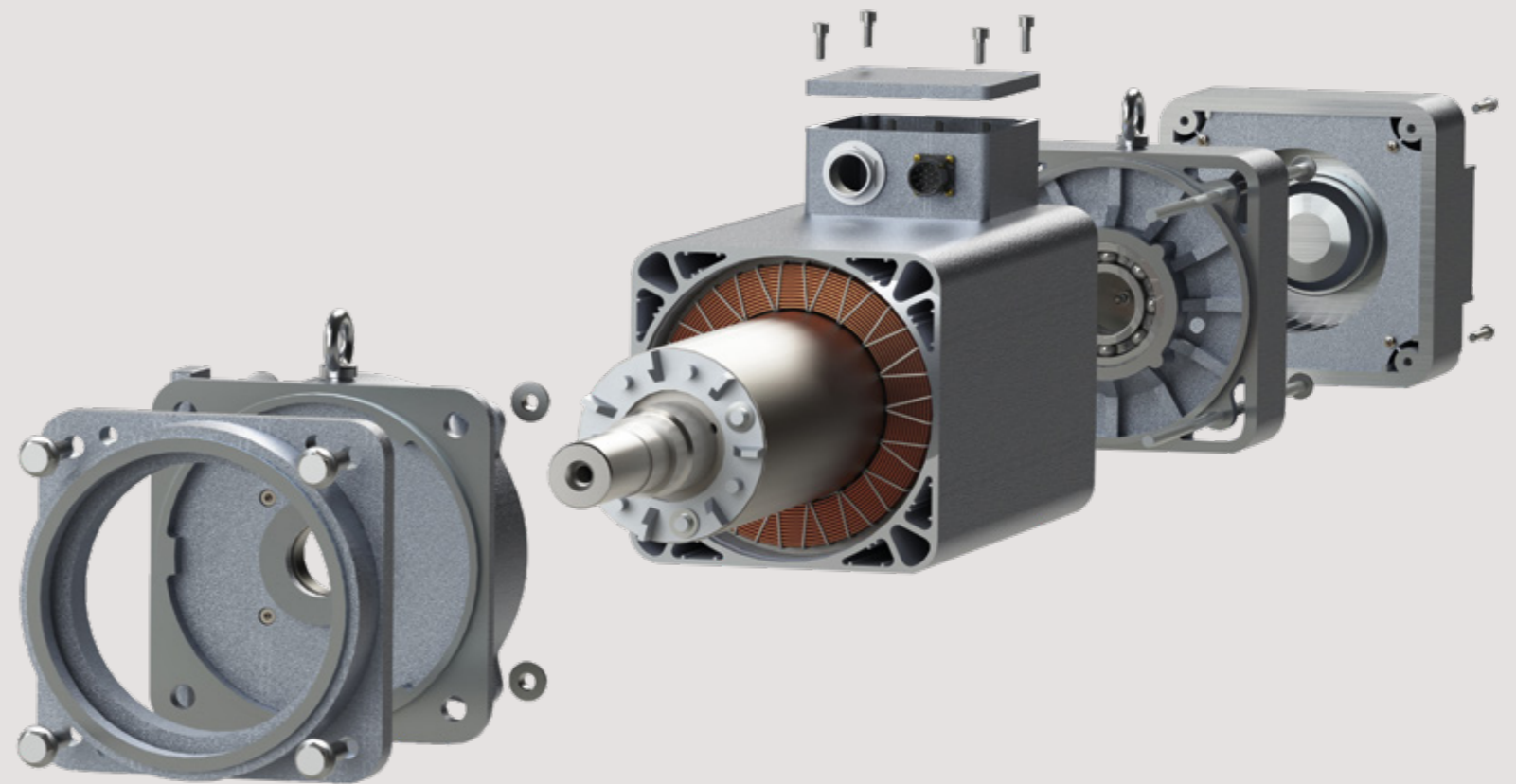
- // Holding brake for safe immobilization of shaft at standstill
- // Smooth shaft end or feather key for friction-locked or form-closed connections
- // Reduced costs thanks to one-cable solution
- // Extra low cogging for very smooth movements
- // Ready made cable ends for efficient machine installation
- // Radial shaft seals for sealing the process up to IP65
- // Direct-mount planetary gearsets for a compact design
- // Axial fans for greater rated power

Feedback systems

KeDrive motors are available with single-turn and multi-turn absolute value encoders as well as incremental encoders as standard.

Our feedback systems offer:

- // Resolution up to 24 bits or 1024 SinCos per revolution (single turn) for precise positioning
- // Resolution up to 12 bits for multi-turn
- // Secure mounting of feedback systems for greater safety
 - standard: up to category SIL 2 / PL d
 - customized: up to SIL 3 / PL e



Customizing

Get the most out of your application. Customizing enables you to tailor our KeDrive servomotors to your specific needs.



Customizing

- // Optimized windings for specific operating points
- // Hollow shafts for direct process support
- // Double shaft for bilateral output
- // Spline shafts for transmission of high or discontinuous torques
- // Special shafts for retrofitting existing machines
- // Reinforced bearings for higher loads
- // Adapted housing for optimal integration into installation space
- // Air and liquid cooling systems for power optimization



Direct-mounted gear units for short motor lengths

The modular system allows the combination of different motor and gear unit sizes. This makes it possible to handle special requirements such as high radial loads or different types of machine mounting.



Customer-specific motor design and development

Special motor solutions for non-standard requirements provide the option of developing the optimal motor design for your application. The assemblies we deliver allow for the perfect integration of the motor in your application and also make for highly efficient installation. Custom specifications make it possible to use our solutions in very demanding environments. Delivery options can be tailored to optimally meet your demands.



Planetary gearboxes

Compact design and high efficiency

The planetary gearbox is the nexus between motor and application. It converts torque and speed, it can adjust mass inertia, and it can increase positioning accuracy. In addition to their compact design, planetary gearboxes achieve high energy conversion efficiency.

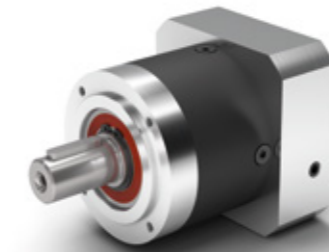
Features

- // Flange sizes 40 ... 190 mm
- // Overall ratio 3 ... 512
- // Efficiency up to 98 %

Planetary gearboxes achieve a very good integration with the mechanical components of your machine. In combination with the servomotor, they are available as stand-alone solutions or mounted directly on our servomotors for compact use in small installation spaces.

Types

- // Standard or precision gear unit for accurate positioning
- // Output flange or output shaft for optimal connection
- // Coaxial or right-angle planetary gearbox for optimal power flow
- // Direct mounting of pinions for greater feed force in rack-and-pinion gears



Planetary gearbox



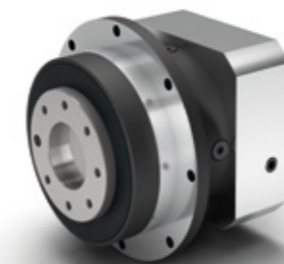
Motor with planetary gearbox



Right-angle planetary gearbox



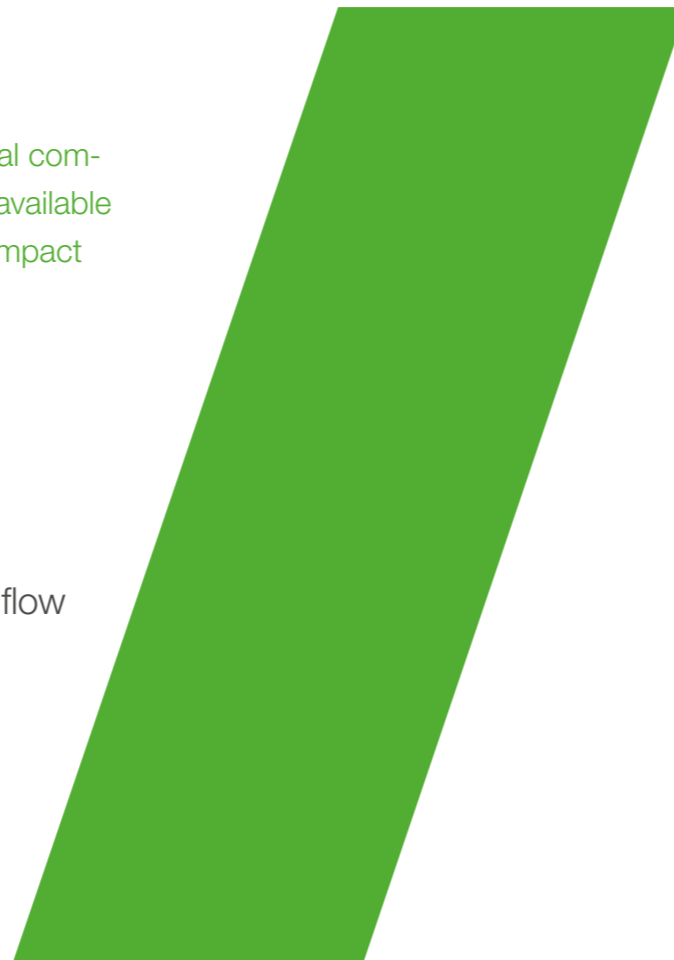
Motor with right-angle planetary gearbox



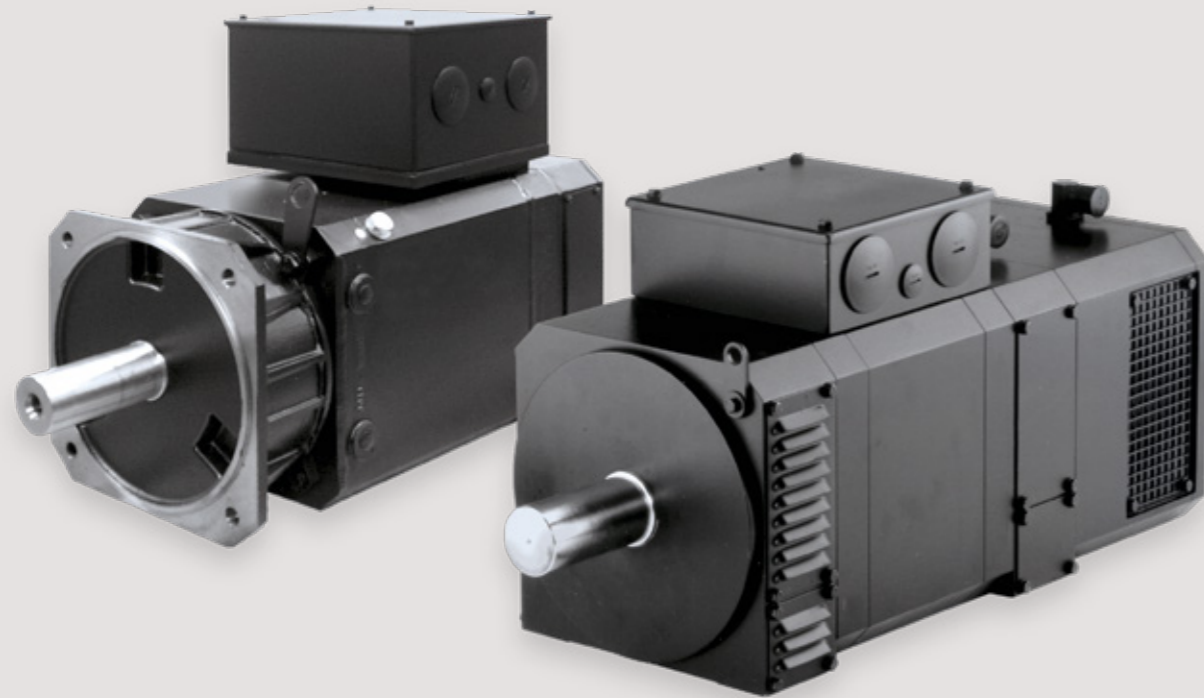
Planetary gearbox with
flange output shaft



Geared motor with
flange output shaft



- High power density
- Compact design
- High overload capacity



KeDrive main motors

Motor expertise for machine manufacturing

KeDrive main motors round out the power range of the tried-and-tested KeDrive servomotors at the top and allow the realization of powerful drive axles.

Synchronous servo main drive

The synchronous servomotor comes with high power density and has been optimized for inverter operation.

- // 4 axle heights 100 ... 200 mm
- // Power 5 ... 300 kW
- // Torque ranges 48 ... 1,340 Nm
- // Peak torque 120 ... 2,190 Nm
- // Speeds up to 3,000 min⁻¹

Asynchronous servo main drive

Our compact asynchronous servomotor product range with high power density is perfect for complex applications in machine manufacturing. Various cooling methods and many winding types allow for optimal adaptation to the servo controller.

- // 6 axle heights 100 ... 280 mm
- // Power up to 3 ... 400 kW
- // Torque range 25 ... 3,262 Nm
- // Peak torque 66 ... 5,200 Nm
- // Speeds up to 3,000 min⁻¹

Main drives come with high overload capacity and are suitable for flange or foot mounting. The available cooling options include axial and radial fans or water cooling.

KeDrive System cables

For all KeDrive motors and drive controllers, certified connecting cables are available. They permit fault-free operation and optimal EMC behavior. DESINA color coding keeps your control cabinet neat and tidy.

- // Hybrid cables for one-cable solutions 0.5 ... 10 mm²
- // Power cables 0.5 ... 120 mm²
- // Encoder cables for Resolver, EnDat, Hiperface, Hiperface DSL, SSI and BiSS-C

KeDrive encoder cables are offered in a broad range of design types, for example with straight or angled encoder plugs for connecting to the drive controller and with M23 or smaller I17 plugs for connecting to the motor.

Our encoder cables are ready made for all types. We also offer special designs with particular characteristics.

- // Torsion resistance, e.g. for use in robotics
- // Free from paint-wetting impairment substances (PWIS), e.g. for use in coating or painting facilities
- // Oil resistance, e.g. for use near injection molding machines or machine tools



Your benefits at a glance

- // Many years of experience in the engineering and assembly of cables
- // 100 % certified quality through piece inspection for greater reliability
- // Absolute flexibility in terms of length
- // Excellent value for money

KeDrive system cables are tested in the drive system and approved for safety and functional applications.

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