

More about Framo® . . .

Worm Gear Sets

Millions in use worldwide. Catalog worm gear sets are available from stock. Custom versions on request.



Gears

On specification External gears / Internal gears, spur gears, helical gears and spherical gears.

LiMax

The slim, strong linear actuator with integrated free adjustable limit switches and many options.



Mini

Extremely compact linear actuator with integrated limit switches and many options.

Compacta

Slip-on geared motor with built-in limit switches and many options.



LinearChain

The Framo® Push-Pull Chain combines long strokes with minimum space requirements.

DiscPower

Disc motor with integrated planetary gear.



Custom Drives

Framo designs and produces custom drives from worm gear box to complete drives.

Framo Morat - your competent partner for drive and gear technology



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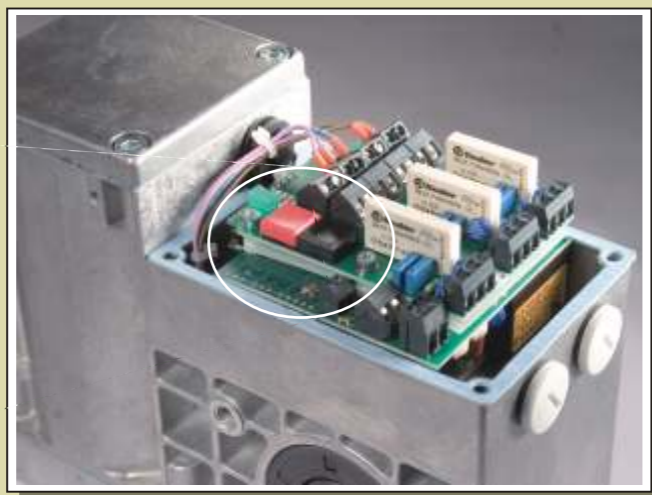
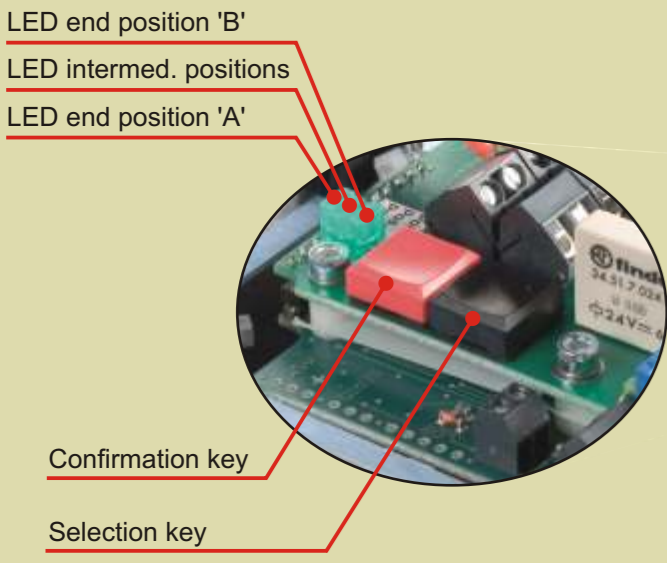
Framo®

ESA

Electronic Switching Action applicable for all Compacta slip-on geared motors



Easy setup with ESA (Electronic Switching Action)



MR6 with applied ESA

The Electronic Switching Action (ESA) is the consequent advancement of the integrated mechanical limit switches for the slip-on geared motors Compacta.

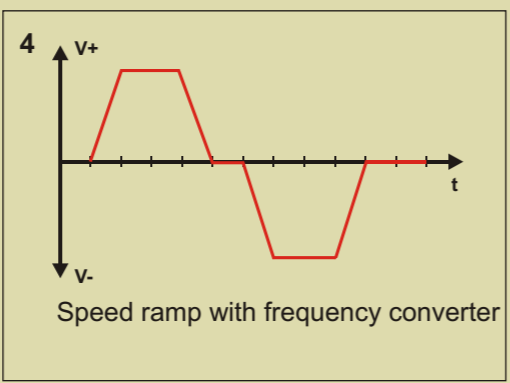
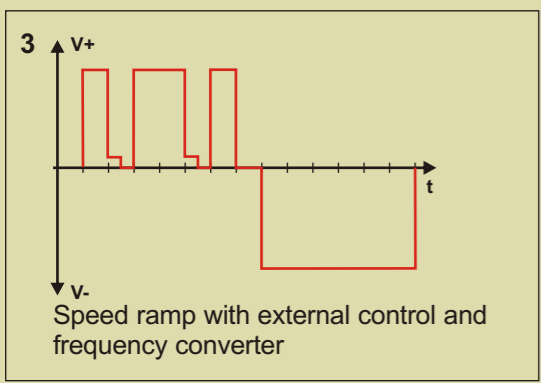
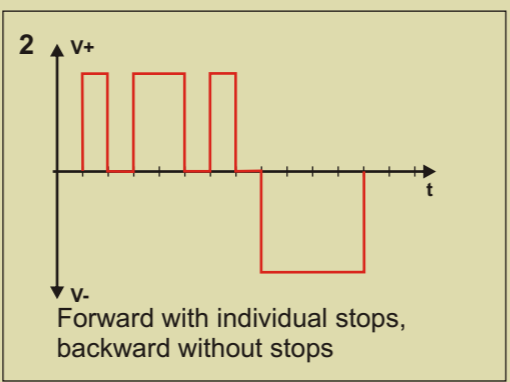
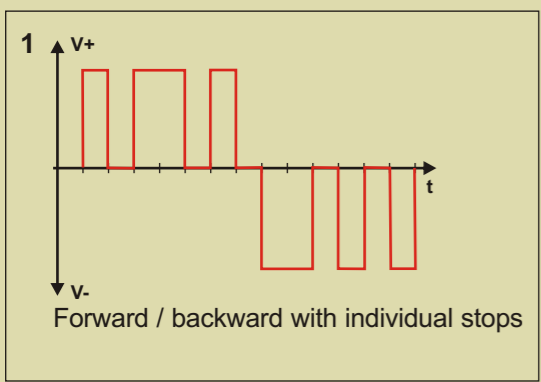
The ESA allows the programming of two endpositions and up to ten free adjustable intermediate positions in reversing operation mode. The programming is very simple and done within minutes by using just two keys.

The precise determination of the position occurs from an internal absolute value transmitter. An additional encoder with rotating direction detection is integrated. External control systems can handle the gained feedback signal.

The integration in existing drive concepts is uncritical. The internal signal processing allows to use cost-efficient external control units.



Examples for moving profiles



Application examples for the ESA

Waver processing



A Compacta with ESA allows to open the cover of a vacuum chamber in different angles.

Light- and stage technology



The Compacta slip-on geared motor with ESA allows to approach different pre-programmed positions on the ceiling rail.

Sheet processing



The Compacta precisely adjusts the crowning die unit of press brakes. With the ESA it is possible to pre-define recurring adjustments.

Benefits:

- Easy setup
- Accurate switching of up to 10 defined intermediate positions
- Reduced installation time due to on-board signal processing
- Integrated 24 VDC power supply
- Controllable with most PLC hardware (11-30 VDC)
- Output of A/B signals with detection of rotation direction
- Less efforts for PLC hardware and programming while used with external control units

Handling



The angles of the pivot arm can be adjusted in different pre-defined positions with ESA.

Lift table



A Compacta slip-on geared motor with ESA allows up to 12 pre-defined height adjustments of the lift table.