

Damper actuator for operating air control dampers in ventilation and air-conditioning systems for building services installations

- For air dampers up to approx. 0.4 m<sup>2</sup>
- Torque 2 Nm
- Nominal voltage AC/DC 24 V
- Control: Open-close or 3-point



### Type overview

| Type   | Direction of rotation   |
|--------|-------------------------|
| CM24-L | counter-clockwise (ccw) |
| CM24-R | clockwise (cw)          |

### Technical data

|                            |                           |   |
|----------------------------|---------------------------|---|
| <b>Electrical data</b>     | Nominal voltage           | AC 24 V, 50/60 Hz / DC 24 V   |
|                            | Nominal voltage range     | AC/DC 19.2 ... 28.8 V   |
|                            | Power consumption         | In operation 0.5 W @ nominal torque<br>At rest 0.2 W<br>For wire sizing 1 VA  |
|                            | Connection                | Cable 1 m, 3 x 0.75 mm <sup>2</sup>   |
| <b>Functional data</b>     | Torque (nominal torque)   | Min. 2 Nm @ nominal voltage   |
|                            | Direction of rotation     | See «Type overview»   |
|                            | Manual override           | Gear disengagement with magnet  |
|                            | Angle of rotation         | Without limit Endless<br>With limit Fixed 315°↔ or 0 ... 287.5°↔ with mechanical end stops, can be adjusted in 2.5°↔ increments |
|                            | Running time              | 75 s / 90°↔   |
|                            | Sound power level         | Max. 35 dB (A)  |
|                            | Position indicator        | Mechanical, pluggable<br>(with integrated magnet for gear disengagement)  |
|                            |                           |   |
| <b>Safety</b>              | Protection class          | III Safety extra-low voltage / UL Class 2 Supply  |
|                            | Degree of protection      | IP54 in any mounting position<br>NEMA2, UL Enclosure Type 2   |
| <b>EMC</b>                 | Certification             | CE according to 2004/108/EC   |
|                            |                           |   |
|                            | Certification             | cULus according to UL 60730-1A and UL 60730-2-14 and CAN/CSA E60730-1:02<br>Certified to IEC/EN 60730-1 and IEC/EN 60730-2-14   |
|                            | Mode of operation         | Type 1 (EN 60730-1)   |
|                            | Rated impulse voltage     | 0.8 kV (EN 60730-1)   |
|                            | Control pollution degree  | 3 (EN 60730-1)  |
|                            | Ambient temperature       | -30 ... +50 °C  |
|                            | Non-operating temperature | -40 ... +80 °C  |
|                            | Ambient humidity          | 95% r.H., non-condensating (EN 60730-1)   |
|                            | Maintenance               | Maintenance-free  |
| <b>Dimensions / Weight</b> | Dimensions                | See «Dimensions» on page 2  |
|                            | Weight                    | Approx. 220 g   |

### Safety notes




- The actuator is not allowed to be used outside the specified field of application, especially in aircraft or any other form of air transport.
- Assembly must be carried out by trained personnel. Any legal regulations or regulations issued by authorities must be observed during assembly.
- The device may only be opened at the manufacturer's site. It does not contain any parts that can be replaced or repaired by the user.
- When calculating the required torque, the specifications supplied by the damper manufacturers (cross section, design, installation site), and the air flow conditions must be observed.

## Safety notes

(Continue)

- The device contains electrical and electronic components and is not allowed to be disposed of as household refuse. All locally valid regulations and requirements must be observed.

## Product features

- Simple direct mounting** Simple direct mounting on the damper spindle with a universal spindle clamp ( $\varnothing$  6 ... 12.7 mm). The actuator is then secured with the anti-rotation strap supplied, to prevent it from rotating.
- Manual override** Manual override with magnet possible (the gear is disengaged as long as the magnet adheres to the symbol ). The magnet for gear disengagement is integrated in the position indicator.
- Adjustable angle of rotation** Adjustable angle of rotation with mechanical end stops.
- High functional reliability** The actuator is overload-proof, requires no limit switches and automatically stops when the end stop is reached.

## Electrical installation

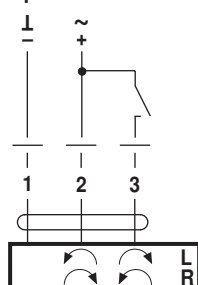
## Wiring diagrams

## Note

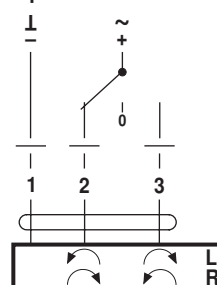
- Connect via safety isolation transformer.
- Other actuators can be connected in parallel. Please note the performance data.



## Open-close control

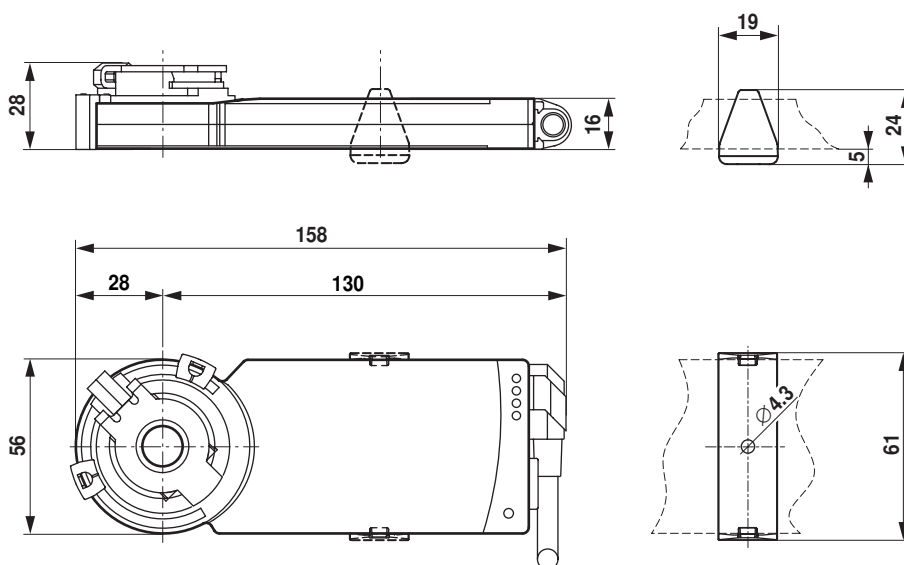



## 3-point control

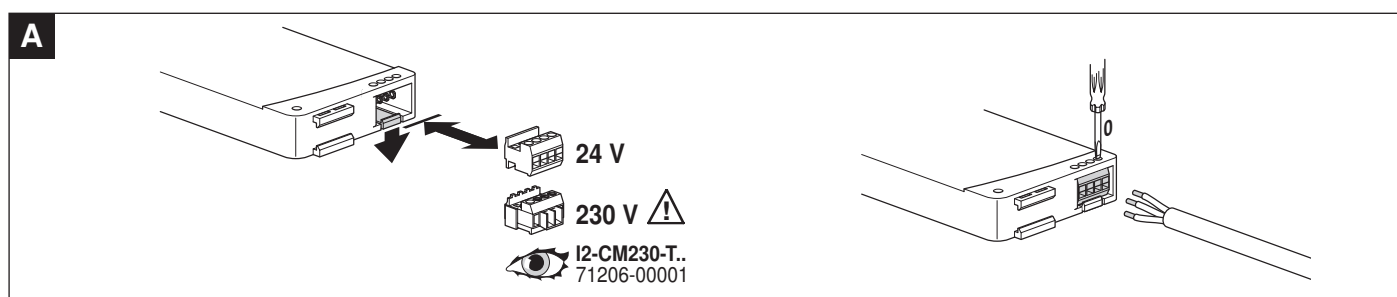
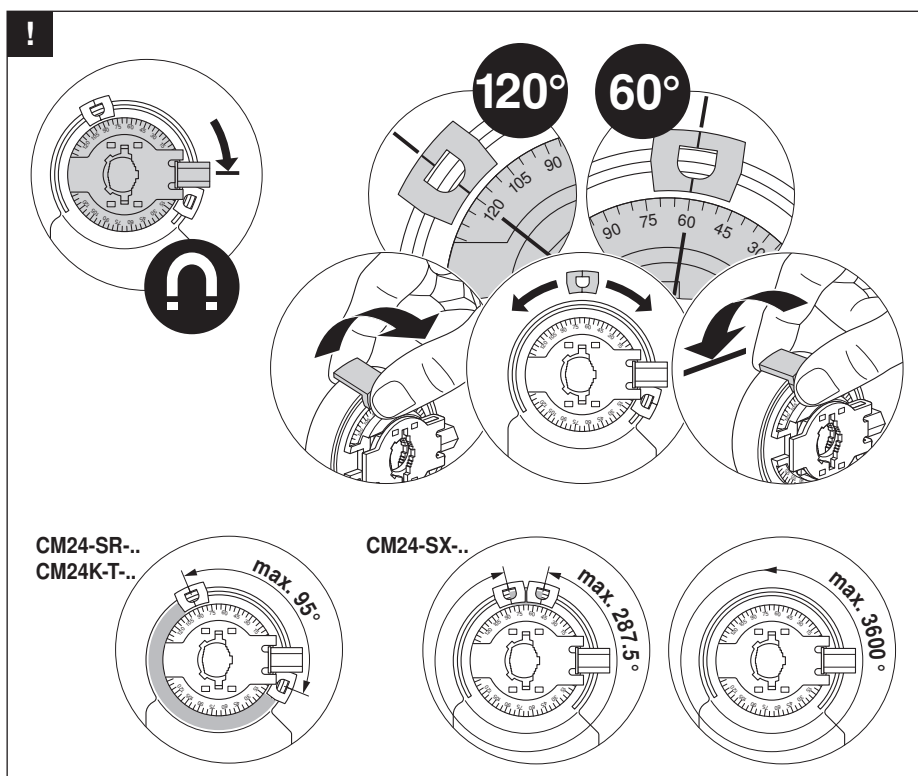
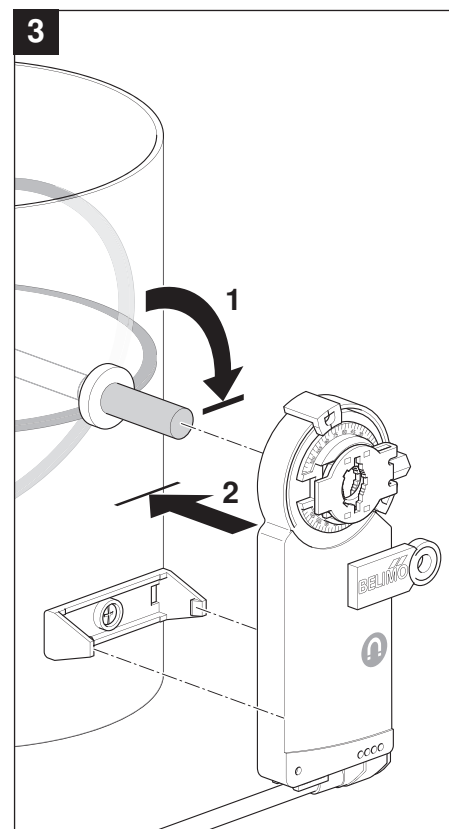
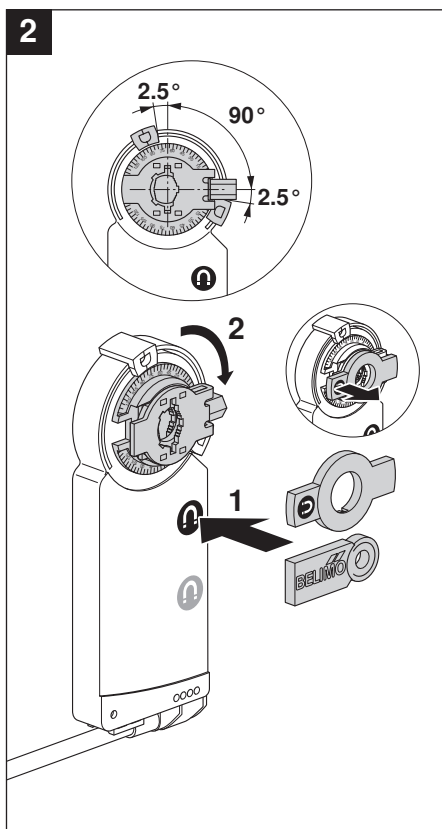
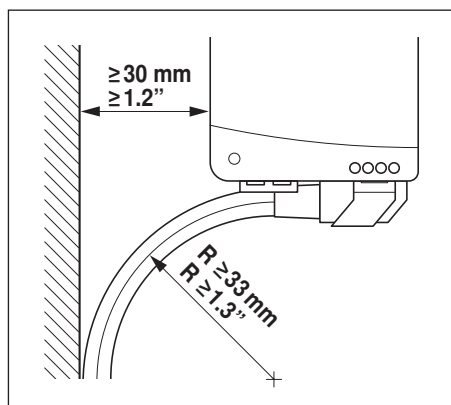
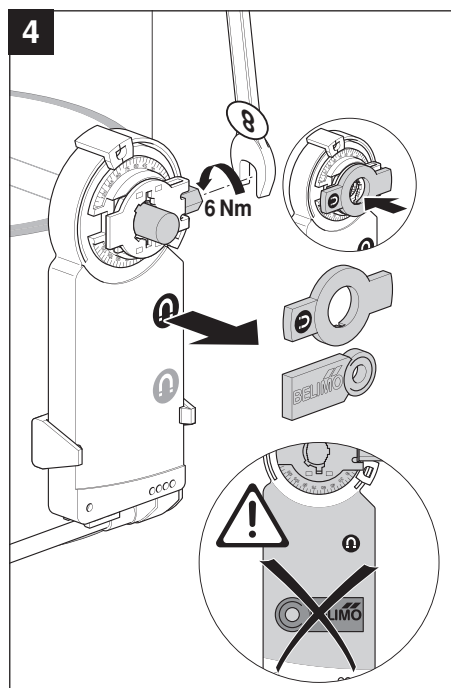
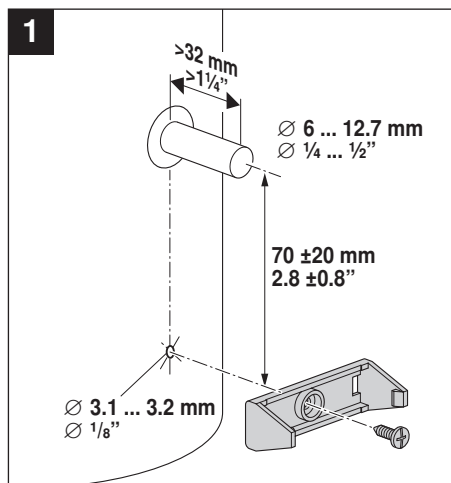


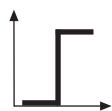
## Dimensions [mm]

## Dimensional drawings

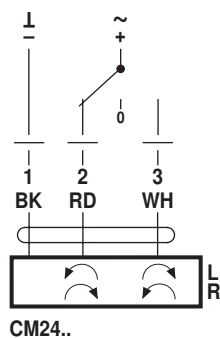
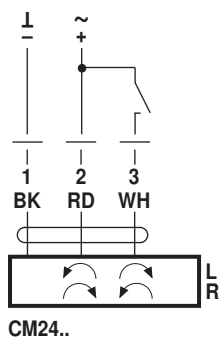
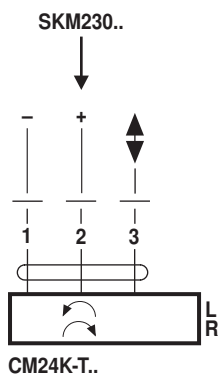


| Damper spindle | Length |  |
|----------------|--------|---|
|                | ≥32    | 6 ... 12.7  |

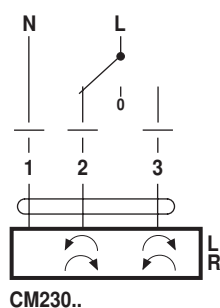
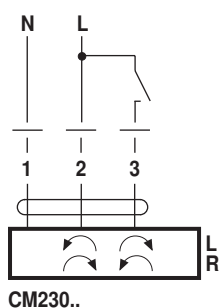




AC 24 V / DC 24 V

DC 24 V  
(SKM230..)

AC 100 ... 240 V ⚠



AC 24 V / DC 24 V

