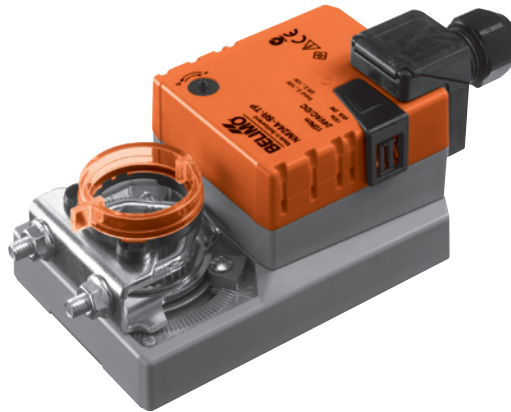


Damper actuator for operating air control dampers in ventilation and air-conditioning systems for building services installations

- For air control dampers up to approx. 2 m<sup>2</sup>
- Torque 10 Nm
- Nominal voltage AC/DC 24 V
- Control: modulating DC 0 ... 10 V, position feedback DC 2 ... 10 V


**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 2 W @ nominal torque At rest 0.4 W For wire sizing 4 VA
	Connection	Terminals 4 mm <sup>2</sup> (Cable Ø 6 ... 8 mm, four-core)
	<b>Functional data</b>	Torque (nominal torque)
Control		Control signal Y DC 0 ... 10 V, typical input impedance 100 kΩ Working range DC 2 ... 10 V
Position feedback (Measuring voltage)		DC 2 ... 10 V, max. 1 mA
Position accuracy		±5%
Direction of rotation		Reversible with switch 0 / 1
Direction of rotation at Y = 0 V		At switch position 0 ↶ resp. 1 ↷
Manual override		Gearing latch disengaged with pushbutton, detentable
Angle of rotation		Max. 95°↔, limited on both sides by means of adjustable, mechanical end stops
Running time		150 s / 90°↔
Sound power level		Max. 35 dB (A)
	Position indication	Mechanical, pluggable
<b>Safety</b>	Protection class	III Safety extra-low voltage
	Degree of protection	IP54 in any mounting position
	EMC	CE according 89/336/EEC
	Mode of operation	Type 1 (to EN 60730-1)
	Rated impulse voltage	0.8 kV (to EN 60730-1)
	Control Pollution Degree	3 (to EN 60730-1)
	Ambient temperature range	-30 ... +50 °C
	Non-operating temperature	-40 ... +80 °C
	Ambient humidity range	95% r.H., non-condensating (EN 60730-1)
	Maintenance	Maintenance-free
<b>Dimensions / Weight</b>	Dimensions	See «Dimensions» on page 2
	Weight	Approx. 800 g

**Safety notes**


- The damper 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.
- 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**

- Mode of operation** The actuator is controlled by means of a standard control signal DC 0 ... 10 V. It opens to the position dictated by this signal. The measuring voltage U allows the damper position (0 ... 100%) to be electrically indicated and serves as a follow-up control signal for other actuators.
- Simple direct mounting** Simple direct mounting on the damper spindle with a universal spindle clamp, supplied with an anti-rotation strap to prevent the actuator from rotating.
- Manual override** Manual operation is possible with the pushbutton (the gearing latch remains disengaged as long as the pushbutton is pressed or detented).
- 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.

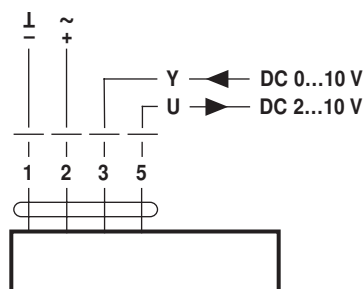
**Accessories**

	Description	Data sheet
<b>Electrical accessories</b>	Auxiliary switch S..A..	T2 - S..A..
	Feedback potentiometer P..A..	T2 - P..A..
	Range controller SBG24	T2 - SBG24
	Positioner SG..24	T2 - SG..24
	Digital position indication ZAD24	T2 - ZAD24
<b>Mechanical accessories</b>	Various accessories (clamps, shaft extensions etc.)	T2 - Z-NM..A..

**Electrical installation**

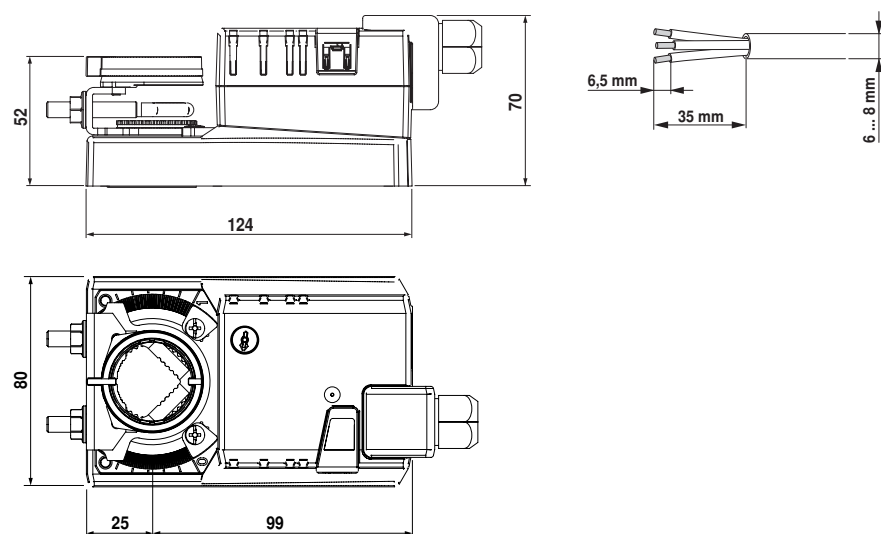
Wiring diagram

- Notes**
- Connection via safety isolating transformer.
  - Other actuators can be connected in parallel. Please note the performance data.



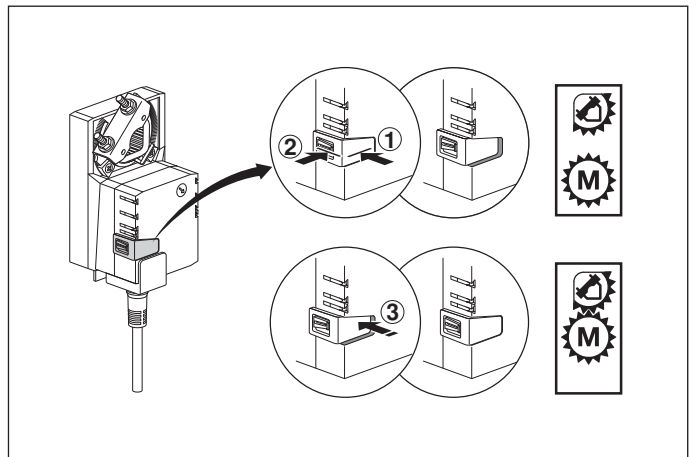
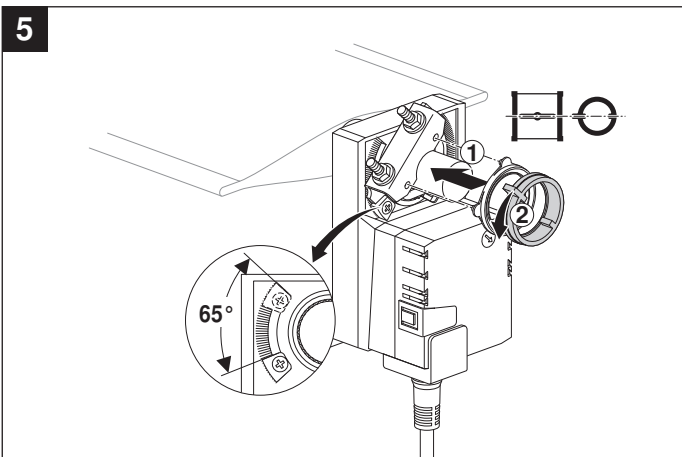
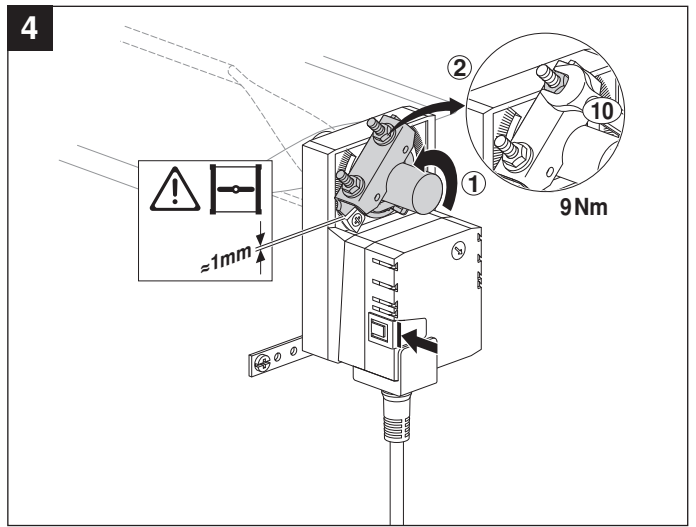
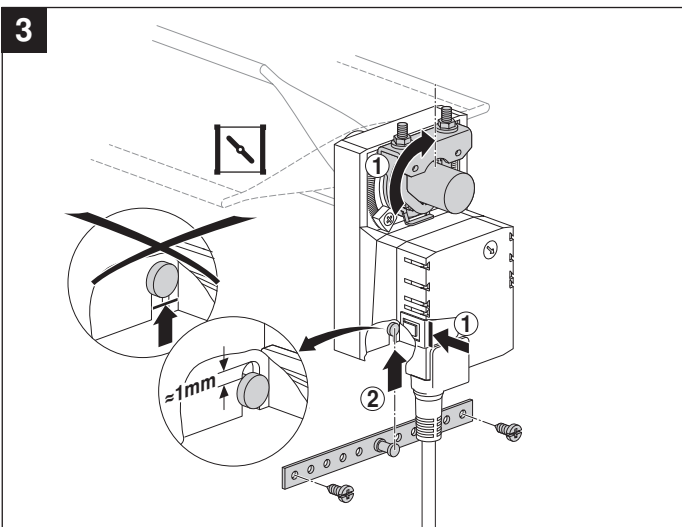
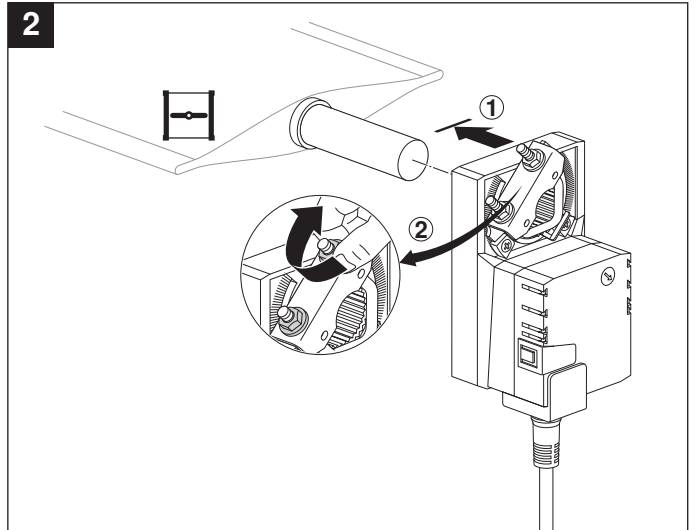
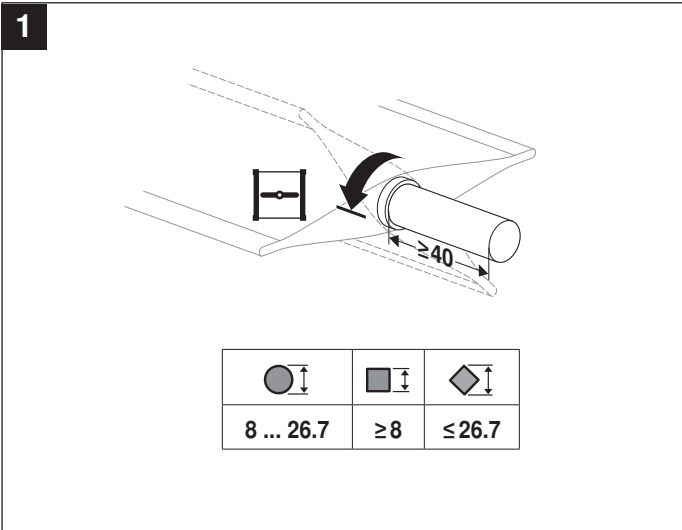
**Dimensions [mm]**

Dimensional drawings



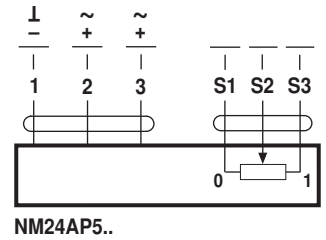
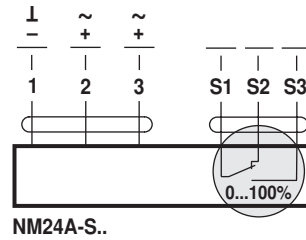
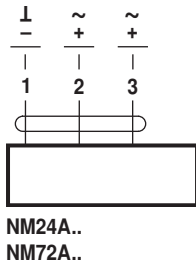
Damper spindle	Length			
Clamp on top	>40	8 ... 26.7	>8	<26.7
Clamp on bottom *	>20	8 ... 20	>8	<20

\* Option (Accessory K-NA)

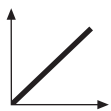
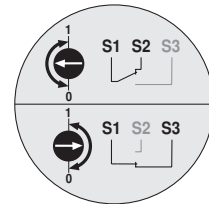
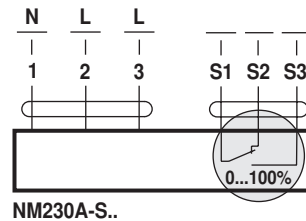
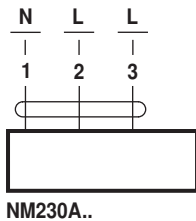




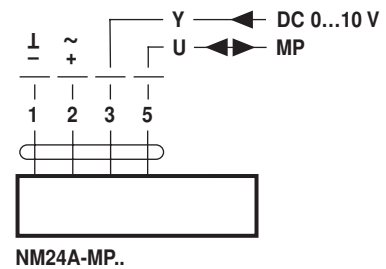
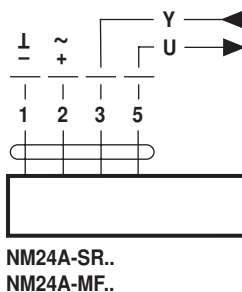
AC 24 V / DC 24 V  
DC 48 ... 110 V (NM72A..) ⚠



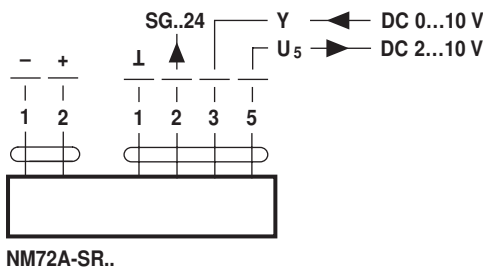
AC 100 ... 240 V ⚠



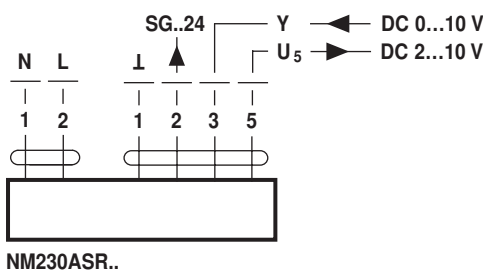
AC 24 V / DC 24 V



DC 48 ... 110 V (NM72A-SR..) ⚠



AC 100 ... 240 V ⚠



AC 24 V / DC 24 V (NM24A-V / VR..) ⚠

