

MD20B-24/-230



On/Off or 3-point 24 V AC/230 V AC Damper Actuator 20 Nm (180 in-lb)

MD20B series damper actuators for operating air control dampers in ventilation and air-conditioning systems for building services installations

- For air control dampers up to approx. 4 m² (4.8 yard²)
- Torque 20 Nm (180 in-lb)
- Nominal voltage AC/DC 24 V or 230 V
- Control: On/Off or 3-point

SPECIFICATIONS

Part numbers

MD20B-230 875-1021-000

MD20B-24 875-1025-000

Power supply

MD20B-24 24 V AC ±20%, 50–60 Hz,
24 V DC ±20%

MD20B-230 230 V AC –56% to +15%, 50–60 Hz

Power consumption

In operation

MD20B-24 2 W @ nominal torque

MD20B-230 2.5 W @ nominal torque

At rest

MD20B-24 0.2 W

MD20B-230 0.6 W

For wire sizing

MD20B-24 4 VA

MD20B-230 6 VA

Connection cable 1 m (3.3 ft), 3×0.75 mm²
(AWG 18)

Angle of rotation max. 95°
(adjustable by mechanical stops)

Torque . . . min. 20 Nm (180 in-lb) @ nominal voltage

Running time 150 s

Direction of rotation Reversible with switch

Position indication mechanical

Standards conformity

EMC

2004/108/EC

LVD 2006/95/EC (230 V only)

Protection class

MD20B-24 III Safety extra-low voltage

MD20B-230 II Totally insulated

Enclosure rating IP 54

Ambient humidity 95% r.H (EN 60730-1)

Ambient temperature

Operation –30 to +50 °C (–22 to +122 °F)

Storage –40 to +80 °C (–40 to +176 °F)

Sound power leve. max. 45 dB (A)

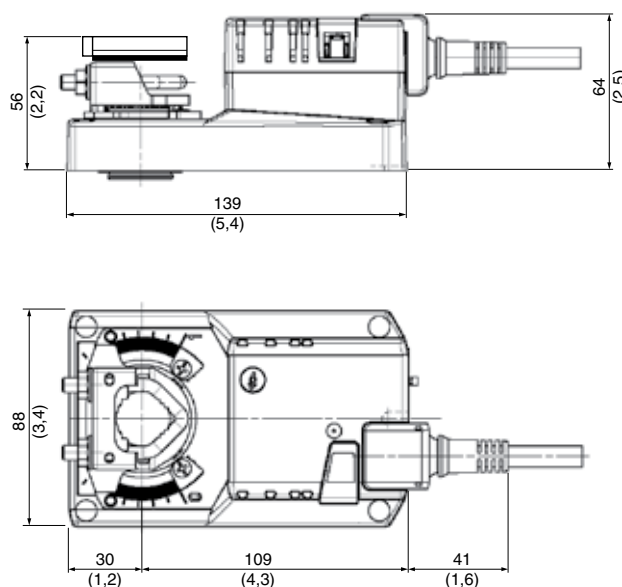
Maintenance. Maintenance-free

Weight

MD20B-24 Approx 1 kg (2.2 lb.)

MD20B-230 Approx 1 kg (2.2 lb.)

DIMENSIONS mm (in)



Damper spindle (in.)	Length mm (in.)	Ø \square mm
Clamp on top	min. 48 (1.89)	10 ... 20 (0.39 ... 0.78)
Clamp on bottom	min. 20 (0.78)	10 ... 20 (0.39 ... 0.78)

FUNCTION

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 self-resetting 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.

SAFETY NOTES



The damper actuator is not allowed to be used outside the specified field of application, especially in aircraft.

Caution: 230 V voltage !

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.

The cables must not be removed from the device.

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.



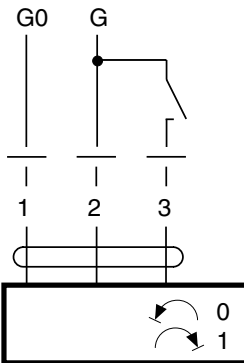
The device contains electrical and electronic components and is not allowed to be disposed of as household refuse. All locally valid regulations and requirements must be observed.

WIRING

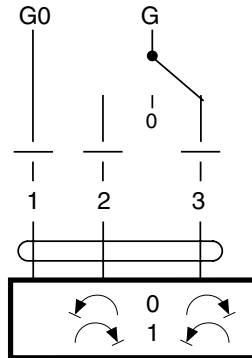


Direction of rotation

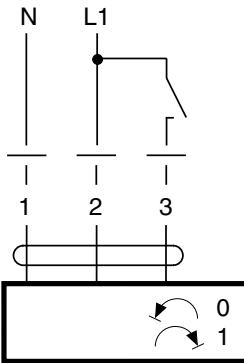
On/Off control



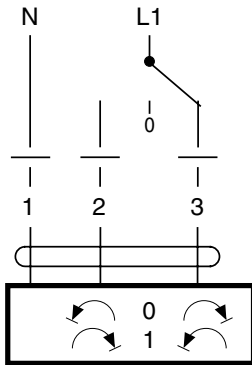
3-point control



On/Off control



3-point control



WIRING

MD20B-230



Caution: 230 V voltage!

Other actuators can be connected in parallel. Please not the performance data.

MD20B-24



Connection via safety isolating transformer.

Other actuators can be connected in parallel. Please not the performance data.

ACCESSORIES

Please refer to data sheet G-30-90

“Accessories Damper Actuators”
(part. no. 0-003-2251).