Globe valve actuator for 2-way and 3-way globe valves

- · Actuating force 2500 N
- Nominal voltage AC/DC 24 V
- · Control Open-close, 3-point
- · Nominal stroke 40 mm



Technical data sheet

Technical data		
Electrical data	Nominal voltage	AC/DC 24 V
	Nominal voltage frequency	50/60 Hz
	Nominal voltage range	AC 19.228.8 V / DC 21.628.8 V
	Power consumption in operation	2.5 W
	Power consumption in rest position	0.5 W
	Power consumption for wire sizing	4.5 VA
	Connection supply / control	Terminals with cable 1 m, 3 x 0.75 mm ² (Terminal 4 mm ²)
	Parallel operation	Yes (note the performance data)
Functional data	Actuating force motor	2500 N
	Manual override	with push-button, can be locked
	Nominal stroke	40 mm
	Running time motor	150 s / 40 mm
	Sound power level motor	56 dB(A)
	Position indication	Mechanically, 540 mm stroke
Safety	Protection class IEC/EN	III Safety Extra-Low Voltage (SELV)
	Protection class UL	UL Class 2 Supply
	Degree of protection IEC/EN	IP54
	Degree of protection NEMA/UL	NEMA 2, UL Enclosure Type 2
	EMC	CE according to 2014/30/EU
	Certification IEC/EN	IEC/EN 60730-1 and IEC/EN 60730-2-14
	Certification UL	cULus according to UL60730-1A, UL60730-2- 14 and CAN/CSA E60730-1:02
	Mode of operation	Type 1
	Rated impulse voltage supply / control	0.8 kV
	Control pollution degree	3
	Ambient temperature	050°C
	Non-operating temperature	-4080°C
	Ambient humidity	Max. 95% r.h., non-condensing
	Maintenance	Maintenance-free

Safety notes



Weight

Weight

• This device has been designed for use in stationary heating, ventilation and air conditioning systems and must not be used outside the specified field of application, especially in aircraft or in any other airborne means of transport.

4.3 kg

- Outdoor application: only possible in case that no (sea)water, snow, ice, insolation
 or aggressive gases interfere directly with the actuator and that is ensured that the
 ambient conditions remain at any time within the thresholds according to the data
 sheet.
- Only authorised specialists may carry out installation. All applicable legal or institutional installation regulations must be complied during installation.
- The switch for changing the direction of motion and so the closing point may be adjusted only by authorised specialists. The direction of motion is critical, particularly in connection with frost protection circuits.
- 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.

Globe valve actuator, Open-close 3-point, AC/DC 24 V, 2500 N



Safety notes

The device contains electrical and electronic components and must not 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 globe valve by means of form-fit hollow clamping jaws.

The actuator can be rotated by 360° on the valve neck.

Manual override Manual override with push-button possible (the gear is disengaged for as long as the

button is pressed or remains locked).

The stroke can be adjusted by using a hexagon socket screw key (5 mm), which is inserted into the top of the actuator. The stroke spindle extends when the key is

rotated clockwise.

High functional reliability The actuator is overload protected, requires no limit switches and automatically stops

when the end stop is reached.

Combination valve/actuator Refer to the valve documentation for suitable valves, their permitted medium

temperatures and closing pressures.

Position indication
The stroke is indicated mechanically on the bracket with tabs. The stroke range

adjusts itself automatically during operation.

Home position Factory setting: Actuator spindle is retracted.

When valve-actuator combinations are shipped, the direction of motion is set in

accordance with the closing point of the valve.

Setting direction of stroke When actuated, the direction of stroke switch changes the running direction in normal

operation.

Restriction 3-point controller Steps must be taken to ensure that the pulsating 3-point controller stops when the end

position is reached. If this is not possible on the system side, the multifunctional 24V

version of the actuator (EV24A-MP-..) must be used.

Accessories

	Description	Туре
Electrical accessories	Auxiliary switch, 2 x SPDT, add-on, grey	S2A-H

Electrical installation

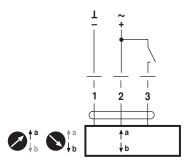


Notes

- · Connection via safety isolating transformer.
- Parallel connection of other actuators possible. Observe the performance data.
- Direction of stroke switch factory setting: Actuator spindle retracted.

Wiring diagrams

AC/DC 24 V, open-close (one-wire)



Cable colours:

1 = black

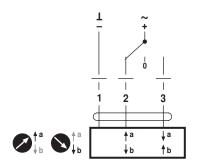
2 = red

3 = white



Electrical installation

AC/DC 24 V, 3-point



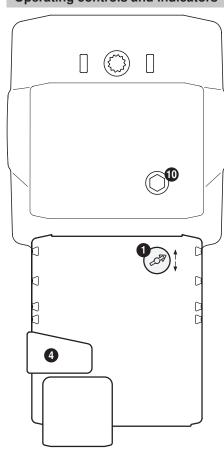
Cable colours:

1 = black

2 = red

3 = white

Operating controls and indicators



Direction of stroke switch

Switch over: Direction of stroke changes

4 Gear disengagement button

Press button: Gear disengages, motor stops, manual override possible

Release button: Gear engages, standard mode

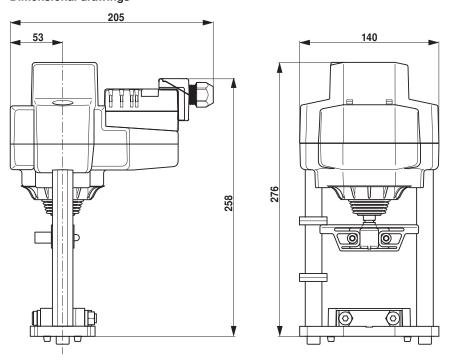
Manual override

Clockwise: Actuator spindle extends
Counterclockwise: Actuator spindle retracts



Dimensions [mm]

Dimensional drawings



Further documentation

- Overview Valve-actuator combinations
- Data sheets for globe valves
- Installation instructions for actuators and/or globe valves
- Notes for project planning 2-way and 3-way globe valves General notes for project planning