



S I L E N C E

MODULATING Actuators

2.16

Application

The JOVENTA **SILENCE** electric damper-actuator series have been developed to operate small and medium air dampers in ventilation and air conditioning systems.

The compact design and universal adapter fitted with limitation of rotation angle make this JOVENTA actuator highly versatile.

Key features

- DC 0...10 V control
- Up to 5 actuators in parallel operation possible
- Plug-in terminal block connection
- Simple direct mounting with universal adapter for fitting to Ø6-mm to 16-mm shaft or with Z01DN adapter kit for 8, 10, 11 and 12 mm square shaft. 45-mm min shaft length
- Selectable direction of rotation
- Limitation of rotation angle
- Manual release button
- Automatic shut-off at end position (overload switch)
- Energy saving at end positions
- Actuators available with 1 m halogen-free cable
- Customized versions available
- Devices meet CE requirements

Nomenclature/Specification/Technical data

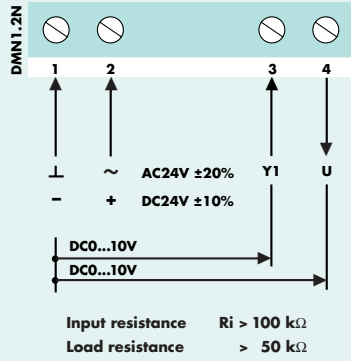
DMN1.2N	AC/DC24V
.....K	with 1 m halogen-free cable

Actuator	DMN1.2N
Torque	4 Nm
Damper area*	0.8 m ²
Running time	35 s
Supply voltage	AC/DC24V
Frequency	50-60 C
Power consumption	
- Running	2.5 W
- At end position	0.75 W
Dimensioning	3.5VA / 2.5A @ 2 ms
Weight	0.9 kg
Control signal	DC0...10V
Position signal	DC0...10V
Angle of rotation / working range	90° (93° mech.)
Angle of rotation / limitation	0°...30° and 90°...60°
Service lifetime	60,000 rotations
Noise level	40 dB (A)
Protection class	II
Degree of protection	IP 50
Cable aperture connection	M16 x 1.5
Mode of action	Type 1
Ambient conditions	
- Operating temperature	-20...+50°C / IEC 721-3-3
- Storage temperature	-30...+60°C / IEC 721-3-2
- Humidity	5...95% r.F.
Service	Maintenance free
Standards	
	Mechanics EN 60 529 / EN 60 730-2-14
	Electronics EN 60 730-2-14
	EMC Emissions EN 50 081-1:92 / IEC 61 000-6-3:96
	EMC Immunity EN 50 082-2:95 / IEC 61 000-6-2:99

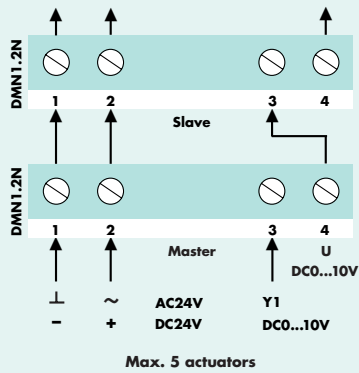
Subject to design modifications without notice.

* Caution: Please note damper manufacturer's information concerning the open/close torque.

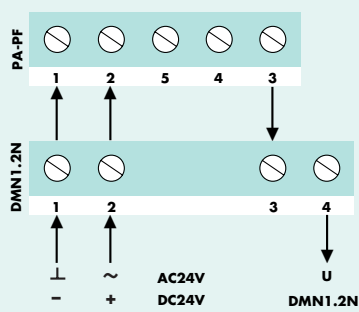
Wiring diagram



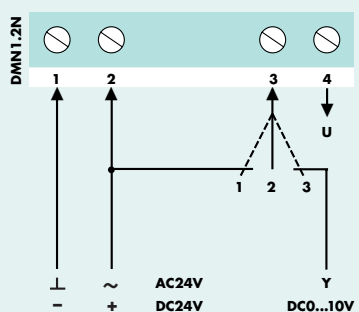
Parallel connections



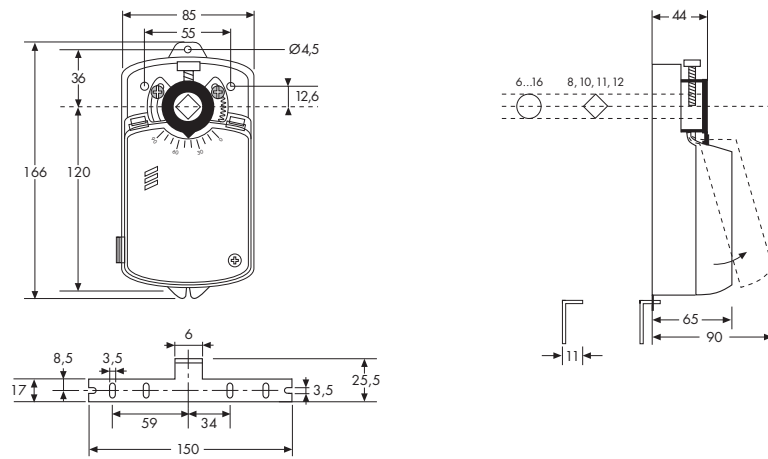
Positioner



Override control

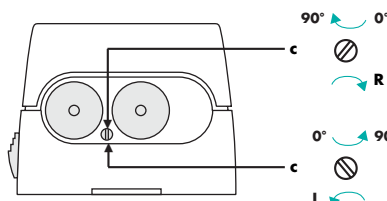


Dimensions in mm



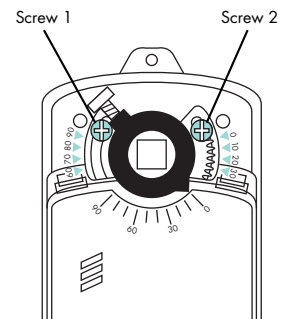
Changing the direction of rotation

R = Factory setting



Limitation of rotation angle

The angle of rotation/working range of 90° can be reduced by up to 30° from each end position by means of screw 1 and 2.



The actuator DMN1.2N can also be controlled using the JOVENTA Positioner (PA-PF) with a control signal of DC0...10V. For further information concerning the PA and PF positioner please refer to data sheet 6.20.

Caution:

A maximum of 5 actuators can be controlled in parallel operation.

The actuator DMN1.2N can be forced to override control when wired in accordance with the relevant diagram on the left.

Switch position:

- 1 = Actuator runs at 10 V
- 2 = Actuator runs at 0 V
- 3 = Automatic control operation