



- SAFA...05 S (T) series
- NENUTEC security damper actuators are especially designed, developed and produced for fire and smoke applications of dampers in different sizes.
- SAFA...05 S (T) spring return actuators, tension the spring return while the actuator moves the damper to its normal working position. In case of emergency (power supply is interrupted or thermal tripping device is over heated) the stored energy in the spring triggers and moves the damper back to its safe position.

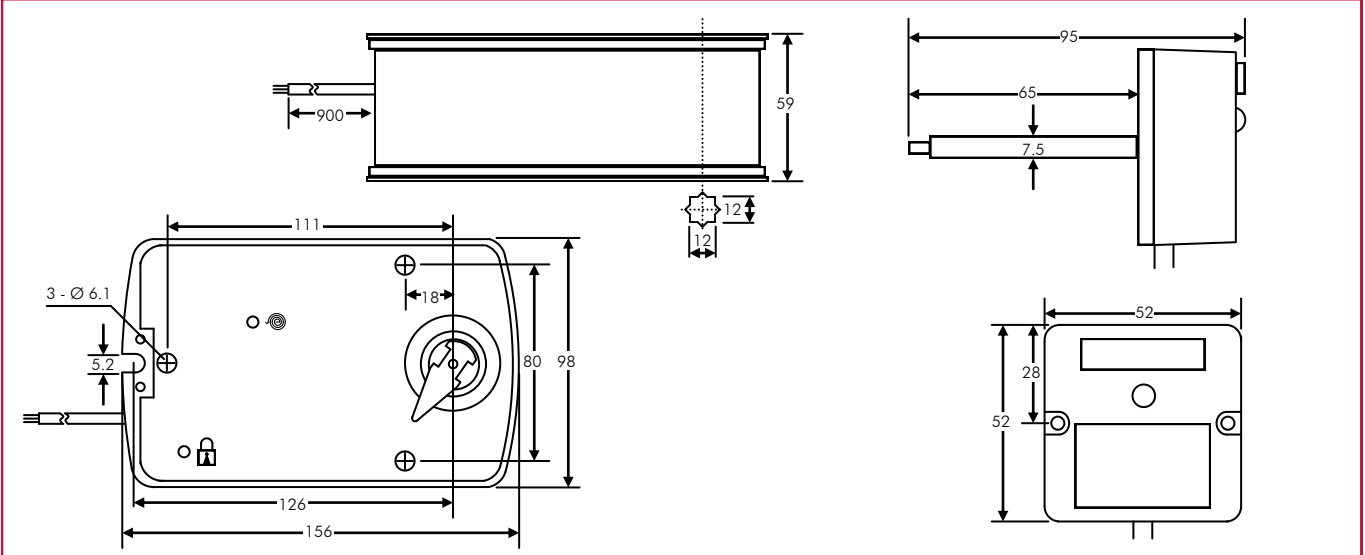
Product Features

- Torque 5 Nm
- Damper size 1.0 m²
- Power Supply AC/DC 24 V and AC 230 V
- Control 2 Point (Open/Closed)
- 2 fixed auxiliary switches (SPDT)
- Shaft dimensions standard
 - 12 mm square (inclusive insert □ 8/10 mm square)
- Minimum shaft length 10 mm
- Selectable direction of rotation
- Actuators with 90 cm cable connection
- Thermal duct and ambient sensor on request
- Manual override with crank handle
- Customer version on request

Model Selection Table

Torque	Running Time	Power Supply	Auxiliary Switch	Thermal Sensor	Model / Type
5 Nm	50...70 sec	AC/DC 24 V ± 10%	2 x SPDT	No	SAFA 1-05 S
5 Nm	Springback <20 sec	AC/DC 24 V ± 10%	2 x SPDT	Yes (SAF 72-1)	SAFA 1-05 S (T)
5 Nm	50...70 sec	AC 230 V ± 10%	2 x SPDT	No	SAFA 2-05 S
5 Nm	Springback <20 sec	AC 230 V ± 10%	2 x SPDT	Yes (SAF 72-1)	SAFA 2-05 S (T)

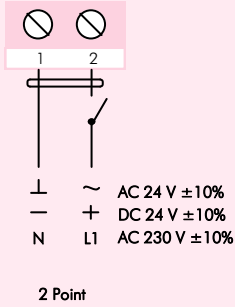
Actuator Dimensions (mm)



Technical Specifications

	SAFA 1... S (T)	SAFA 2... S (T)
Torque (M)	5 Nm	5 Nm
	5 Nm	5 Nm
Damper Size	1.0 m ²	1.0 m ²
Shaft dimensions	□ 12 mm square (insert □ 8 mm / □ 10 mm)	□ 12 mm square (insert □ 8 mm / □ 10 mm)
Power Supply	AC/DC 24 V ± 10%	AC 230 V ± 10%
Frequency	50 - 60 Hz	50 - 60 Hz
Control Signal	2 point Open/Closed	2 point Open/Closed
Power Consumption		
- Operating	7.2 W	4.2 W
- End Position	2.5 W	2.5 W
For Wire Sizing	10.0 VA	10.0 VA
Auxiliary Switch Rating	3 (1.5) A, AC 250 V	3 (1.5) A, AC 250 V
Protection Class	IP54	IP54
Angle of Rotation	0°...90° (95° mechanical)	0°...90° (95° mechanical)
Angle of Limiting	mechanical end stops	mechanical end stops
Weight	2.0 Kg	2.1 Kg
Life Cycle	60'000 rotation	60'000 rotation
Sound Level	45 dB (A)	45 dB (A)
IP Protection	IP 54 (dust protected & protected against splash water)	IP 54 (dust protected & protected against splash water)
Thermal Sensor Temperature	+72°	+72°
Ambient Temperature	-20°...+ 50° C / IEC 721-3-3	-20°...+ 50° C / IEC 721-3-3
Inventory Temperature	+ 70° C / IEC 721-3-2	+ 70° C / IEC 721-3-2
Ambient Humidity	5%...95% rH non condensing / EN 60730-1	5%...95% rH non condensing / EN 60730-1
Maintenance	Maintenance free	Maintenance free
Mode of Operation	Type I / EN 60730-1	Type I / EN 60730-1
EMC	CE according to 89 / 336 / EWG	CE according to 89 / 336 / EWG

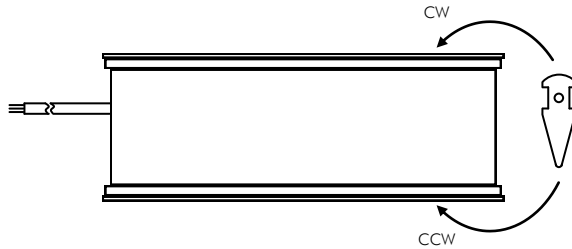
Wiring Diagram SAFA 1/2...S (T) Power Supply AC/DC 24 V- AC 230 V



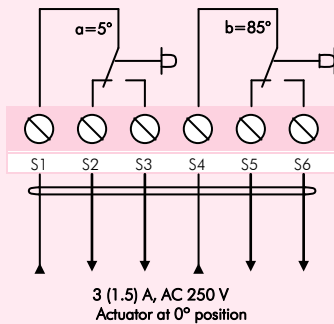
⚠ Connect via safety isolating transformer

Changing Direction of Rotation SAFA 1/2... S (T)

The direction of rotation can be changed by releasing the pointer adapter and push it into the square shaft on the opposite side.



Wiring Diagram SAFA 1/2... S (T) Auxiliary Switches



Fixed Auxiliary Switch SAFA 1/2... S (T)

Auxiliary Switch **a** is fixed and factory-set at 5°.

Auxiliary Switch **b** is fixed and factory-set at 85°.

Remark

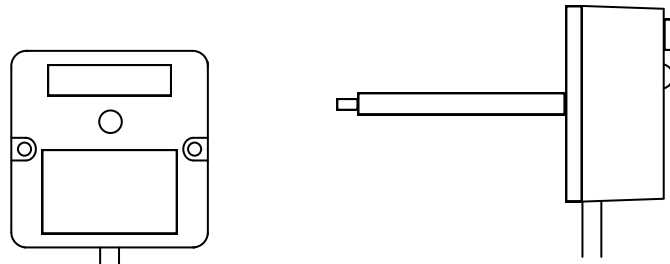
Both auxiliary switches are not adjustable!

Thermal Sensor

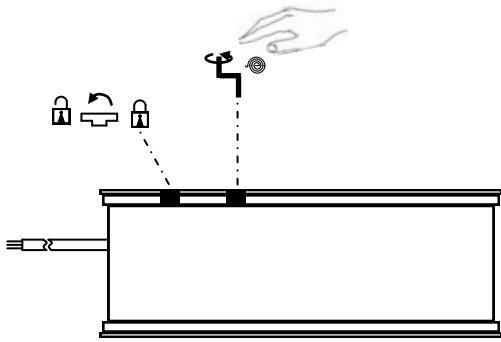
Thermal Sensor SAF 72-1 consists of duct and ambient sensor.

The duct sensor and/or the ambient sensor will be tripped when the duct temperature rises above 72°C and closes the damper.

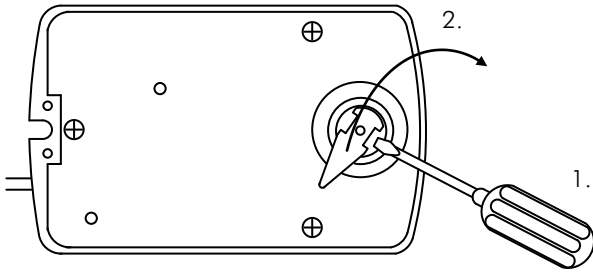
Thermal Sensor SAF 72-1



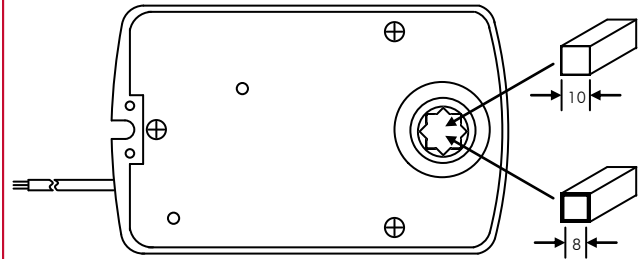
Specified Safety Requirements SAFA 1/2... S (T)



Releasing the Pointer Adapter SAFA 1/2... S (T)



Using Different Inserts SAFA 1/2... S (T)




OEM Customized Version on Request

TELIMA offers you NENUTEC actuators in customised versions, e.g. with your own brand name, with colour-coordinated applications and with your particular demand. Please contact us for further information.

Important Remark

Consult NENUTEC representatives for specific requirements and material selections for your intended application.

  This actuator includes electrical and electronic components and may not be disposed as household garbage. Please consider the local valid legislation.

 AC / DC 24 V: Connect via safety isolating transformer.
AC 230 V: To isolate from the main power supply, the system must incorporate a device which disconnects the phase conductors (with at least a 3 mm contact gap).

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