

Positioner CMSX for linear and quarter turn actuators

FESTO



Reliable position control

Highlights

- Excellent price/performance ratio
- Energy-efficient and inexpensive in operation
- Feedback signals as standard
- Predefinable safety positions for emergency stop

The newly optimised positioner CMSX for single- and double-acting linear and quarter turn actuators is as economical as it is reliable. It is the top performer in its class in the non-explosive area. Its extra features include an excellent price/performance ratio, energy-efficient operation, high process reliability thanks to analogue or digital feedback signals and definable safety positions.

Feedback signal as standard

The end position can be flexibly defined via the freely configurable analogue signal (0 ... 10 V, 0 ... 20 mA, 4 ... 20 mA). The current position in each case is permanently monitored by the microcontroller of the position controller.

Controlled positioning operation

The position controller continuously compares the setpoint signal with the actual position of the quarter turn actuator in closed-loop mode. Any deviations automatically trigger an error message and an emergency stop.

Predefinable safety position

A safety position for the process valve (close, open, hold) can be predefined in case of a power failure. This unique feature reduces potentially very costly risks in the production process to a minimum.

Naturally energy-efficient

When it is at standstill, the compressed air consumption of the valve actuator is zero. The two variants for low or high flow rates are new additions.

**CMSX =
great performance, great price**

Positioner CMSX for linear and quarter turn actuators

Economical

The CMSX regulates control operations for single- and double-acting linear or quarter turn actuators in closed-loop operation. The integrated intake and exhaust valves are controlled by pulse width modulation (PWM) (also known as pulse duration modulation (PDM)). The flow rate for the controlled pneumatic actuator of the process valve can be up to

130 l/min depending on the variant chosen (low or high flow rate). At standstill, the compressed air consumption is zero.

The analogue feedback functions and the definable safety positions are unique for a position controller in this inexpensive price class.



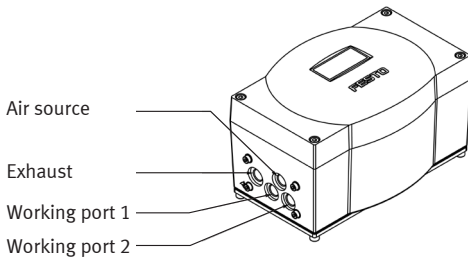
CMSX in a water application

New features at a glance

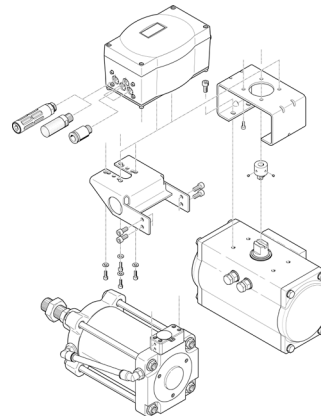
- Now single-acting too
- Linear versions
- Two variants for low and high flow rate
- Improved repetition accuracy: +/- 1%

Can be used in many industries

- General applications in process automation
- Food and beverage industry
 - Water/wastewater treatment
 - Paper manufacture
 - Pharmaceutical industry



The CMSX as a stand-alone unit



Design

- [P] Primarily polymer

Interface

- NAMUR (VDI/VDE 3845)

Display type

- [C] LCD with backlighting

Setpoint value

- [U] Configurable (0 ... 10 V/0 ... 20 mA/4 ... 20 mA)

Positional feedback

- [F1] 4 ... 20 mA

Function

- [E] Single-acting
- [D] Double-acting

Safety function

- [A] Opening or closing in case of breakdown
- [C] Holding position in case of breakdown

Technical data

Input signal	0 ... 20 mA, 4 ... 20 mA, 0 ... 10 V
Feedback signal, standard [mA]	4 ... 20
Pressure range [bar]	3 ... 8
Operating temperature [°C]	-5 ... 60
Rotation angle [°]	0 ... 110
Degree of protection	IP65
Repetition accuracy [%]	±1
Compressed air consumption at rest [l/min]	0
Flow rate [l/min]	50 130
Housing material	Technical polymer

www.festo.com