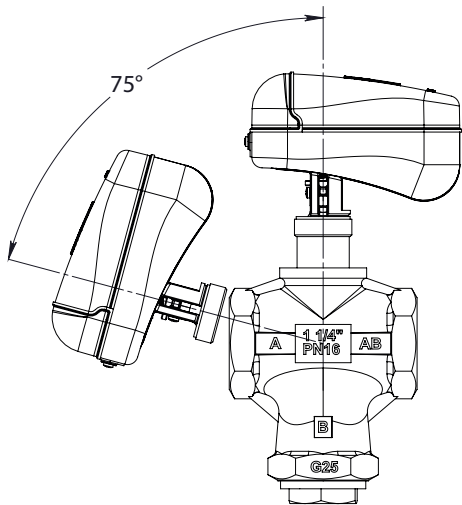
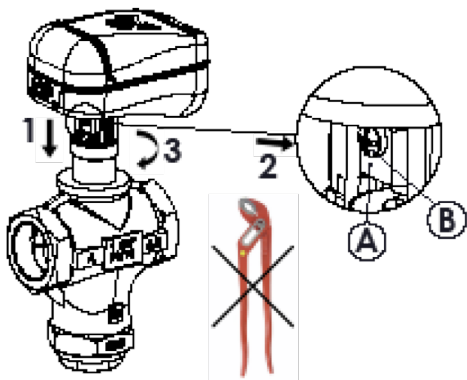
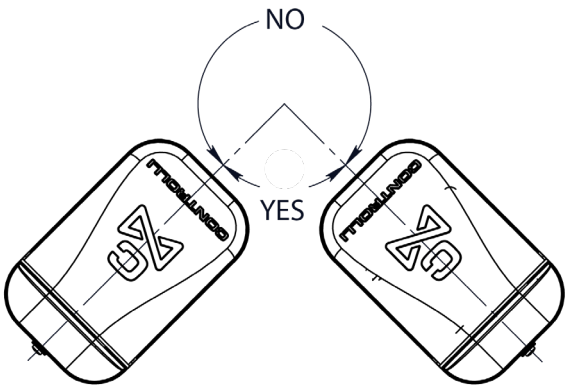


INSTALLATION



Do not use the actuator if not coupled with the valve.



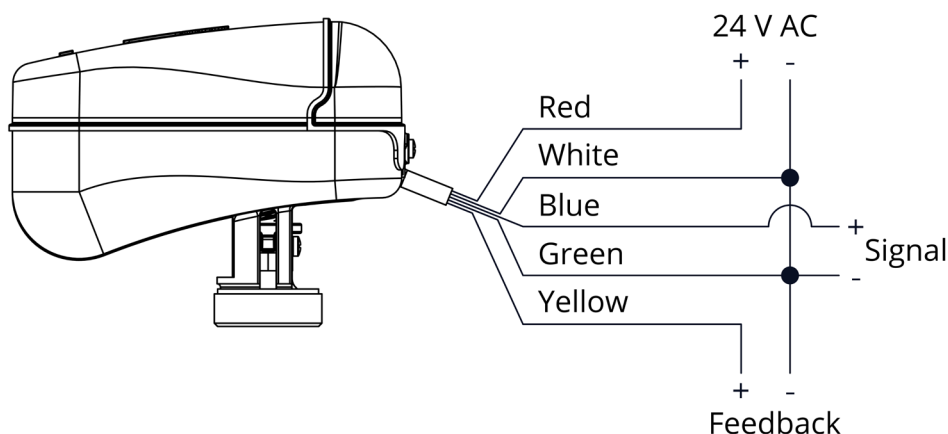
VSB.T-VMB.T, 2-3TGB.B, 2-3TBB.T, 2TGA.BT
Align actuator spindle slot with the hole in locknut (A), secure with bolt (B) through non threaded hole in locknut (A).

WARNING In case of MVC coupling on a valve produced before September 2019 to replace an MVT, must be used the 55061 kit.

VALVE (Production Previous September 2019)	ACTUATOR To Be Replaced	Replacement KIT
VSB.T-VMB.T	MVT203 MVT403 MVT503	55061
2-3TBB.T		
2-3TGB.B		

The performances stated in this sheet can be modified without any prior notice.

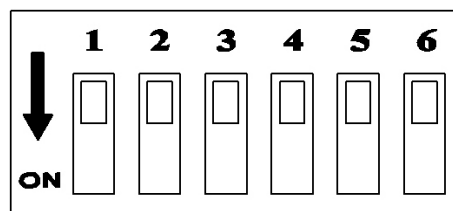
WIRING DIAGRAM



DIP SWITCHES SELECTION

The actuator is supplied prearranged for 0-10 V control signal, direct action and fully extended return position (DOWN); to modify this setting, follow these instructions:

1. Remove the cover and the connector (look at the following picture).
2. Change the DIP switches as indicated in the following scheme.
3. The new settings will be active on the next power off/on cycle.



DIP	ON	OFF
1	Reverse action	Direct action
2	2-10 V / 6-10 V	0-10 V / 0-5 V
3	Range SEQ	Range NORM
4	Not applicable	Auto calibrated stroke
5	4-20 mA	Voltage range
6	Calibration	Running

The actuator can be coupled with push/pull iSMA CONTROLLI valves using auto calibration stroke; or to iSMA CONTROLLI valves with spring return using fixed stroke. Actuators with fixed stroke (DIP 4 ON) have only reverse action.

MODEL	VALVES WITHOUT SPRING				
	VS.B.T-VMB.T 3/4" .. 2" STROKE 5,5 mm	2-3TGB.B 1/2" STROKE 11,5 mm	2-3TBB.T 1/2" .. 2" STROKE 12 mm	2TGA.BT 3/4" .. 2" STROKE 8,5 mm	VALVES OF OTHER MANUFACTURERS STROKE max 12 mm
MVC503	●	● Ag74-03	●	●	●

Automatic Stroke Calibration (Valid only for DIP n. 4 in OFF)

This function helps to calibrate the maximum valve time stroke, so that the actuator can place the valve correctly following the control signal. If the actuator is powered on, this action can be repeated any time DIP 6 goes from OFF to ON and DIP 4 is OFF. During normal operation, it is possible to choose the position of DIP 6: at each start up the stroke calibration will be carried out if DIP 6 is ON; it will be maintained the previous stroke if DIP 6 is OFF.

Direct/Reverse Action

Through DIP1 is possible to set direct or reverse action. In direct action without control signal the actuator is fully retracted with feedback set to 2V. With reverse action the actuator is fully extended and the feedback without control signal is 2 V in this position.

Setting Control Signal Fields

Through DIP 2,3 and 5 it is possible to set 5 different input ranges. If DIP 5 is ON, the input range is set at 4-20mA and DIP 2 and 3 have no meaning. If DIP 5 is OFF, the possible ranges are: 0-10/2-10 if DIP 3 is OFF and 0-5/6-10 if DIP 3 is ON.

Initial Positioning

It is executed every time the actuator is powered and before to have performed the learning of the race. This operation allows the servocontrol to start from a certain position for then follow the command signal. This position depends on the selection made on DIP 1.

Unexpected Stall Condition

If an unexpected stop during the stroke occurs, this function has the aim to make it disappear. The actuator will be driven in the opposite direction and then it will try again to reach the position. If it was not unlocked after the first 3 attempts, after a 1 minute pause, 3 more attempts are made.

Feedback Output Signal (2-10 V)

The actuator is equipped with a proper output to transmit the feedback signal relating to the supposed actuator position. This signal can vary from 2 to 10V. During the "automatic stroke calibration" and "Initial positioning" function it is set at 2V. During the emergency positioning function the feedback signal is set to 1V.

Manual Control

To activate the manual control, remove the power supply, remove the transparent cover and insert a 3 mm hexagonal key into the front hole and turn the key until the desired position is reached.

LEDs BEHAVIOR

LEDs	CALIBRATION PHASE	INITIAL POSITIONING	UP POSITIONING	END STROKE UP	DOWN POSITIONING	END STROKE DOWN	ACTUATOR STOP	UN-EXPECTED STALL	LOW SUPPLY VOLTAGE	ACTUATOR OFF OR UNDER RESET (SUPPLY VOLTAGE LOW)	MAX STROKE LIMIT PHASE
YELLOW	ON	ON	ON	ON	ON	ON	ON	ON	BLINKING 1Hz	OFF	ON
RED	ALTER-NATING 5Hz	ALTER-NATING 1Hz	OFF	OFF	BLINKING 1Hz	ON	OFF	SIMULTANEOUS 5Hz	OFF	OFF	ON
GREEN			BLINKING 1Hz	ON	OFF	OFF	OFF		OFF	OFF	ON