

CONTROL BUTTERFLY VALVE

INSTRUCTION MANUAL

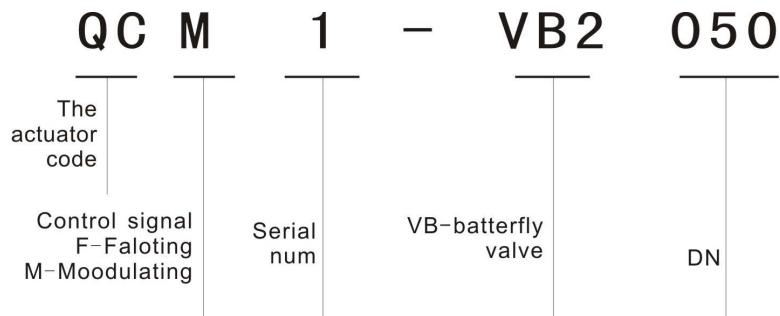


The Actuated Butterfly Valves are suitable for heating and cooling applications. They can also be employed for industrial applications, general services and water treatment. The VB series is equipped with standard On/Off or modulating (4~20mA,) control quarter-turn electric actuator.

FEATURES

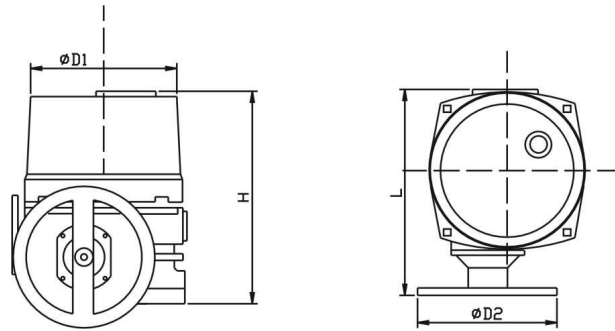
1. Cast Iron or nodular cast iron Wafer Body
2. Centric butterfly valve with elastomer liner
3. For On/Off or Modulating Control
4. Manual override non-clutch design. Manual operation can be operated without any lever, clutch or brake upon power voltage.
5. Visual mechanical position indicator for accurate visual reference of valve position
6. Anti-condensation heater and 2 aux. limit switches on standard model
7. Worm Gear Permanently lubricated and self locking
8. Stall Protection Built-in thermal protection

MODEL NUMBER DESCRIPTIONS



CH-BA

INSTALLATION DIMENSIONS



QCM:

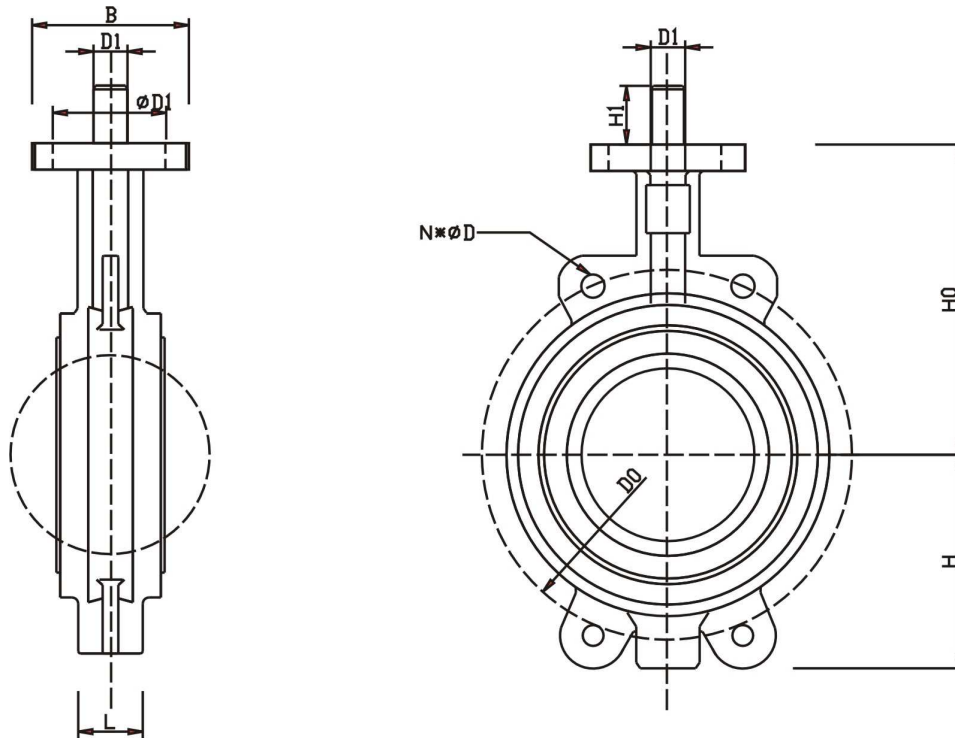
DN	Torque(N.m)	Weight(KG)	Running time(S)	Power(w)	D1(mm)	D2(mm)	H(mm)	L(mm)
DN150	200	15	17-20	40	200	263	263	397
DN200	400	20	20-24	60	220	298	298	415
DN250	600	20	24-29	90	260	342	342	456
DN300	900	27	45	90	260	342	342	456
DN350	1200	40	90	180	260	423	423	456
DN400	1600	53	90	200	260	477	477	456
DN450	2000	53	90	200	260	477	477	456
DN500	2500	53	90	200	260	477	477	456

QCF:

DN	Torque(N.m)	Weight(KG)	Running time(S)	Power(w)	D1(mm)	D2(mm)	H(mm)	L(mm)
DN150	200	13	17-20	40	200	263	263	272
DN200	300	18	20-24	40	220	298	298	290
DN250	400	18	24-29	60	220	298	298	331
DN300	600	25	24-29	90	260	342	342	331
DN350	900	25	90	120	260	342	342	331
DN400	1600	51	90	180	260	477	477	331
DN450	2000	51	90	180	260	477	477	331
DN500	2500	51	90	200	260	477	477	331

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VALVE OUTLINE DIMENSION (PN16):



DN	L	H	H0	B	$\phi D0$	ϕD	D1	H1	$\phi D1$
150	56	139	226	90	240	4*22	14	30	70
200	60	175	260	125	295	4*22	17	38	102
250	68	203	292	125	355	4*26	22	42	102
300	78	242	337	125	410	4*26	22	42	102
350	78	266	368	125	470	4*26	22	48	102
400	102	301	400	125	525	4*32	22	48	102
450	114	317	422	175	585	4*32	26	52	140
500	127	361	480	210	650	4*32	26	52	165

WARNING

1. Installation are for use by qualified personnel only. To avoid injury and electric shock, do not perform any servicing other than that contained in this manual.

2. All actuators are shipped from the factory already for installation; no electrical adjustments are required before placing them in operation.

3. Check the connections before energizing the power supply since wrong connections can damage the equipment.

4. The actuator should be stored in its shipping carton in a clean, dry area.

INSTALLATION

MOUNTING ON VALVE

Operate the valve manually to fully open or fully closed position before the actuator is mounted.

Operate the actuator and valve stem to fully open or fully closed position.

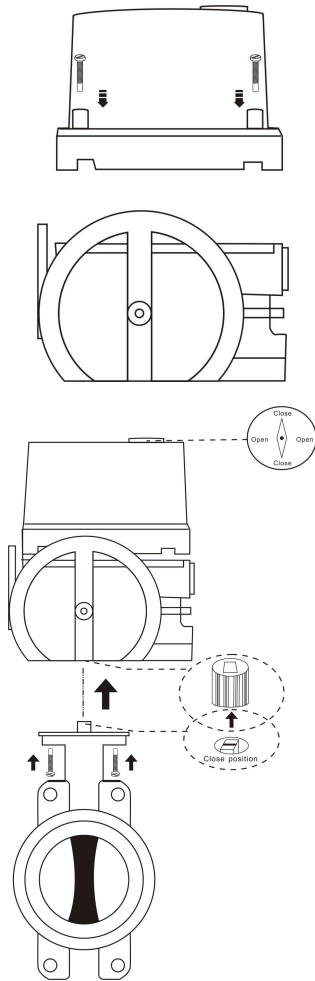
Check that the actuator and valve stem are in correct position. Please note, valve and actuator must be in the same mode (fully open/fully closed) prior to the assembly.

Mount the actuator on the valve and check that the actuator and valve stems are centered and aligned.

Operate the valve manually with the aid of the actuator hand-wheel and check that the valve moves with normal resistance.

Check that all screws are correctly tightened.

CH-BA



Note:

Remove power before the cover is dismantled!
 The actuator must be handled with the utmost care when the cover is removed and the power connected!

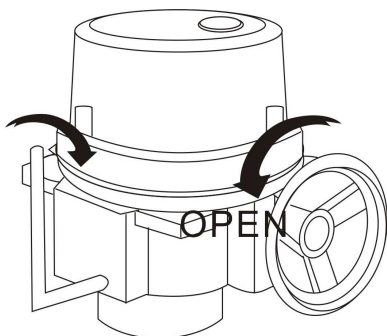
Manual operation

The actuators are equipped with a manual operator handwheel to open or close butterfly valves in the events of power failure.

Push back the manual operator handspike and turn the handwheel:

A: counterclockwise to drive the valve open

B: clockwise to drive the valve close



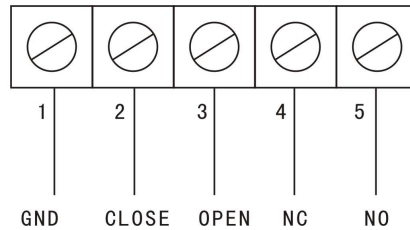
Note:

Electric wiring must be carried out by qualified personnel only!
 Wiring diagram is also shown on the label of top cover.

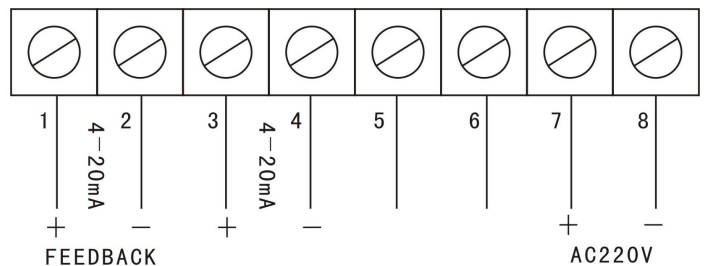
TECHNICAL DATA

WIRING DIAGRAMS

QCF :



QCM:



ELECTRIC WIRING

VALVE	
Flow media	Cold and hot water, water with max. 50% volume of glycol
Temperature of medium	-10°C.. +100°C
Rated pressure	1600 / 2760kPa
Leakage rate	Air bubble-tight (Bo 1, DIN 3230)
Size	DN150-DN500
Material	Body Cast Iron or nodular cast iron ,Shaft Stainless Steel,
	Disc Ductile Iron with epoxy coating
	Liner EPDM
Actuator	
Actuator	QCF/QCM
Output torque	200-2500N.m
Power supply	AC220V or AC/DC24V
Run time	15S~,90S
Operating power	40~200VA
Output angle	90°± 3°
ON/OFF control signal	1 wire or 2 wire control
Modulating control signal	4~20mA
Feedback signal	4~20mA
Installation position	Upright to horizontal (No upset)
Protection class	IP66
Ambient conditions	- 10°C .to 55°C 0..90% RH
Weight	1.5~50kg
Material	Steel. Aluminium Alloy

ORDER EXAMPLE

1. Order valve DN125, 220V 2 WAY ON/OFF control butterfly valve