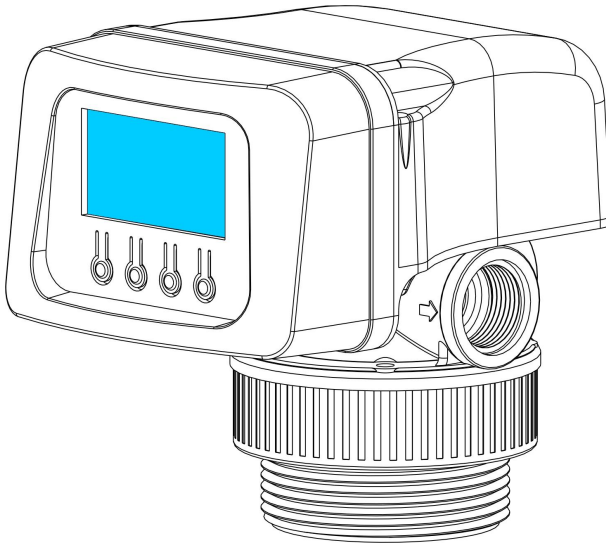


GL-2MLCD

Economical filter valve Installation, Use and Maintenance Manual (GL2-2MLCD\GL4-2MLCD\GL10-2MLCD)



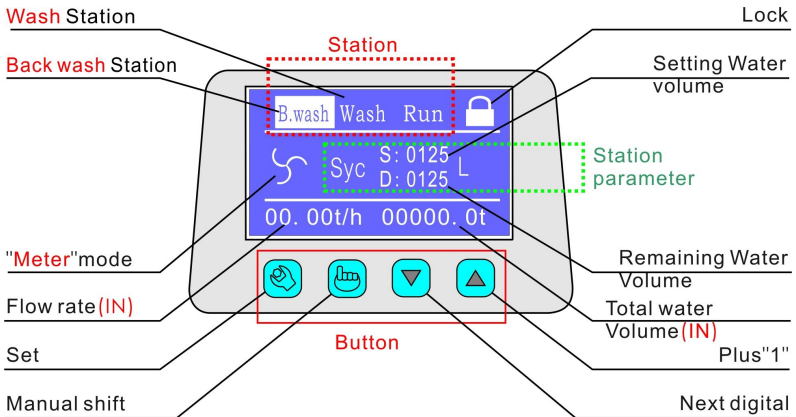
Scan Qr code for the latest



Valve Shifting animation

I .The Controller

(1)、Display and button



Pic1: GL-2MLCD Filter valve Controller interface

Explanation

: Unlock state. push the button to parameter setting.push again back.

: Unlock state. push the button the valve rotate to next station.

Unlock::Push “▼” and “▲” same time.

Lock:three minute late Automatic lock without any operation

▼ :Push the button the cursor to next digital when parameter setting

▲:plus 1

(2)Parameter setting

Meter mode setting

Push "▼&▲" To unlock

B.wash	Wash	Run	
	Syc	S: 0020 D: 0020	L
0. 00t/h 00000000t			



Push to Setting interface

	Set parameter
B.wash :	0025L
Wash :	0020L
Run :	0031.0T



Push* "To next page

Time :	1H:05M:33S
Set :	99H-00M-01D
WorkMode(0-1) :	1
Out_Mode(0-6) :	2



Push* "To next page

B.Wash_Num :	1
Address :	01



Push* "To conform and exit

B.wash	Wash	Run	
	Syc	S: 0020 D: 0020	L
0. 00t/h 00000000t			

Time mode setting

In Meter mode push and into line
Workmode (0-1) : 1 change 1 to 0

Time :	11H:05M:33S
Set :	99H-00M-01D
WorkMode(0-1) :	0
Out_Mode(0-4) :	2



Push* "To conform to Time mode

B.wash	Wash	Run	
	Set: 036 Min	Dec: 036 Min	



Push to Setting interface

	Set parameter
B.wash :	006Min
Wash :	005Min
Run :	0200hour



Push* "To next page

Time :	1H:05M:33S
Set :	99H-00M-01D
WorkMode(0-1) :	1
Out_Mode(0-6) :	2



Push* "To next page

B.Wash_Num :	1
Address :	01

Push* "To conform and exit

Pic2: GL-2MLCD Parameter setting

***Explanation for parameter setting**

A、Time:11H:05M:33S, H/Hour;M/Minute;S/Second。

B、Set:99H-00M-01D,delay backwash setting, default 99 is not delay, For example, when the RUN station parameter decreases to 0, backwash is needed and the equipment cannot stop the water supply, It can be delayed until midnight 2:30, Set **02H-30M-01D** is okay.

C、WorkMode:(0-1):Default, 0 is Meter mode and 1 is Time mode

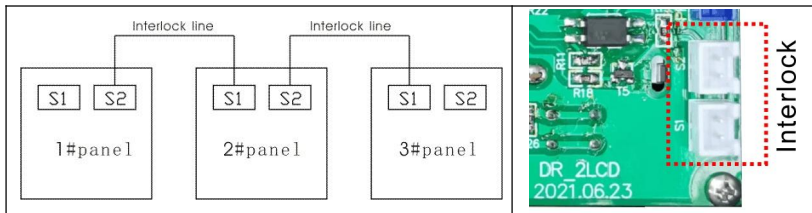
D、Out_Mode: (0-6) : Output relay setting (See 2. Relay output interface)

E、B.Wash_Num:1: The default is 1, and multiple backwash can be set as required. If it is set to 2, the cycle from **RUN** to **B.Wash** will be twice during each cycle.

F、Address: 01:Remote 485 communication address setting

(3) 、Output control

1、Interlock line connection as below



Pic3: Interlock line Instruction

Explanation:

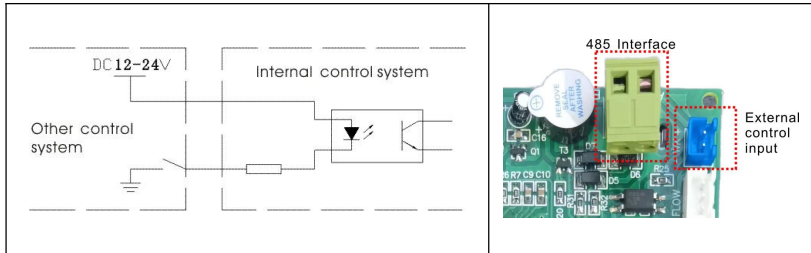
*A. Any valve at **B.wash**、**Wash** position, the valve can send lock*

signal.

- B. Any valve from **RUN** to **B.wash** 、 **Wash** position, the program will read locking signal from interlock line. If there are locking signals (that means there are other valves is in **B.wash** 、 **Wash**, the valve will continue service in **RUN** until the locking signals disappear. At that time,. Until other valves finish in **B.wash** 、 **Wash** (locking signal disappear), this valve start **B.wash** 、 **Wash** and send a lock signal.*
- C. There is no sequence relationship for S1 and S2 on board.*
- The interlock line can be inserted in S1 or S2 can play the role of interlock.*
- D. If only one valve works, the interlock line can be ignored.*
- E. If there are many valves work and don't need interlock, don't insert the interlock line. Each valve can work independently.*

2. External control interface

The valve can be controlled by external system to control into B.Wash



Pic4: External control Instruction

3. Relay (Normal Open) output interface

A、The contact capacity of the relay is 5A/250V.

B、When connecting the output of the relay, the AC220V power supply input end shall be connected with the leakage circuit breaker.

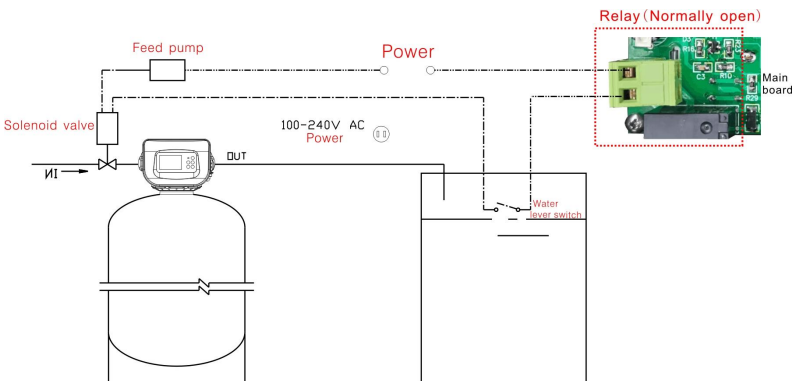
Different mode, the relay output

Connected for "C", disconnect for "x"

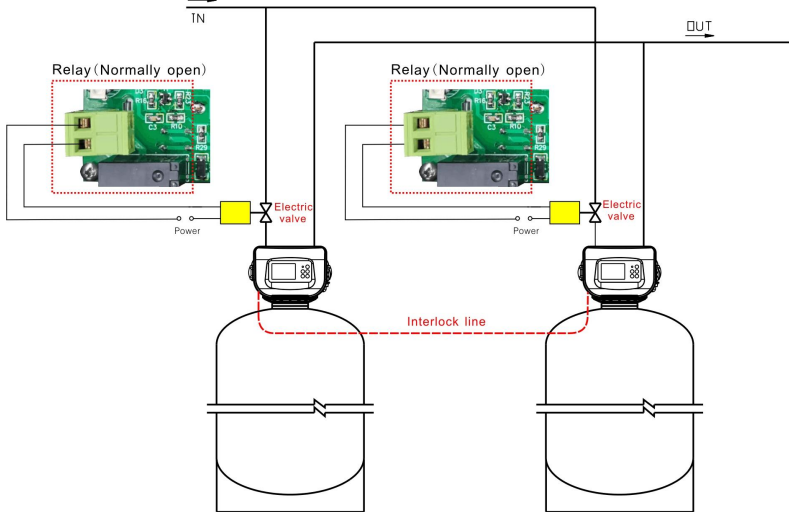
Mode	B.wash	Wash	RUN	
0	C	C	C	x
1	C	C	x	x
2	x	x	C	x
3	C	C	x	x
4	C	C	x	x
5	x	x	Cx	x
6	C	x	x	x

Mode	Applications
0	Solenoid valve mode , relay break when shifting station.

	PIC5
1	booster pump mode: control backwash pump start-up, In B.wash and Wash station, Relay is connected, backwash booster pump start-up.
2	Outflow pump start-up mode: such as for subsequent RO system high pressure pump start-up, only in RUN station, high pressure pump start-up.
3	Tow valve one RUN & one standby inflow water solenoid valve mode: This mode is using for soften valve.
4	Tow valve same time RUN backwash respectively mode: this mode for filter valve use , As shown in PIC 6.
5	CX(Mode2 additional conditions) : When the inlet flow meter check the water flow signal in RUN station. the Relay is Connected.
6	Backwash booster and compressed air mode.



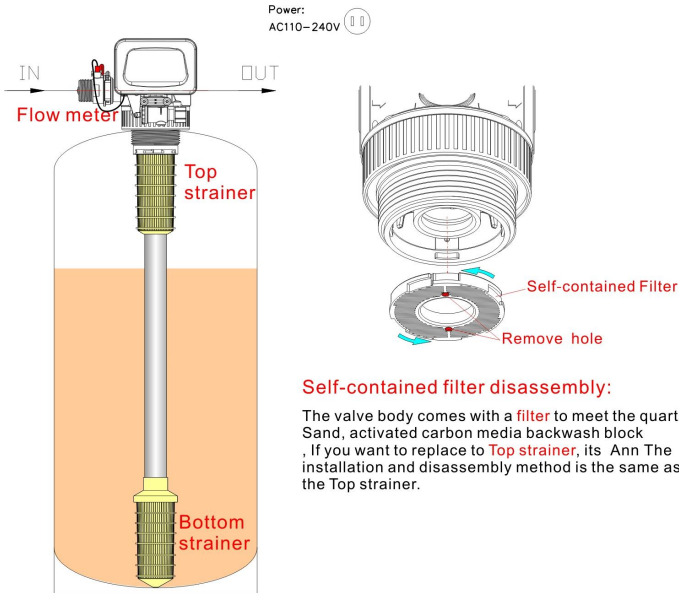
Pic5: Mode0: Solenoid valve liquid level switch and feed pump. water pressure relief when the valve is shifting station and solenoid valve cut off



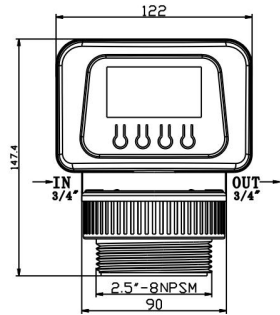
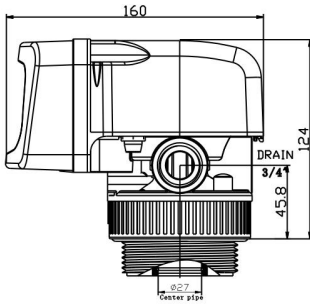
Pic6: Mode4: Same time RUN backwash Respectively

II 、 Installation

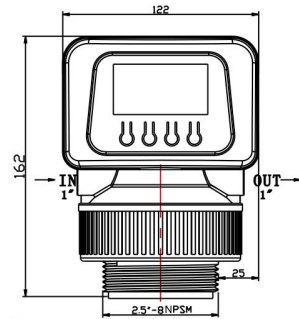
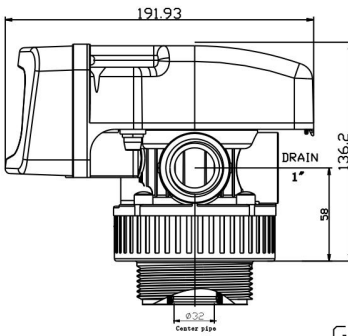
- 1, The water must be installed filters, lest cause valve core fault and water distributor congestion.
- 2, Pipe valve specifications is not less than control valve in and out of the size.
- 3, Water static pressure is not higher than 0.6 MPa.
- 4, the equipment is installed in the room, the humidity should not be too high, there should be no corrosive chemical gas around, to avoid strong electromagnetic interference to affect the power supply of the control valve.
5. Floor drain or trench drainage shall be set around the equipment to avoid accidental water leakage causing the floor and other indoor items to be flooded.
- 6, water temperature is $0^{\circ}\text{C} \sim 50^{\circ}\text{C}$.



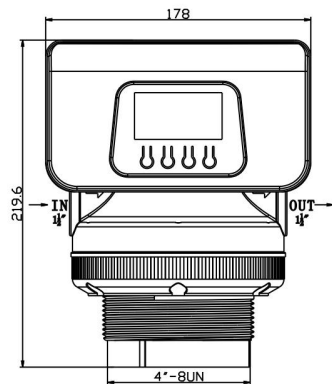
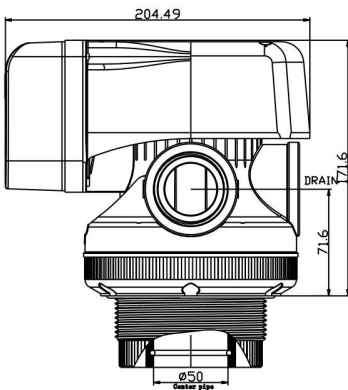
Pic7: GL-2M configuration and install



GR2-2LCD



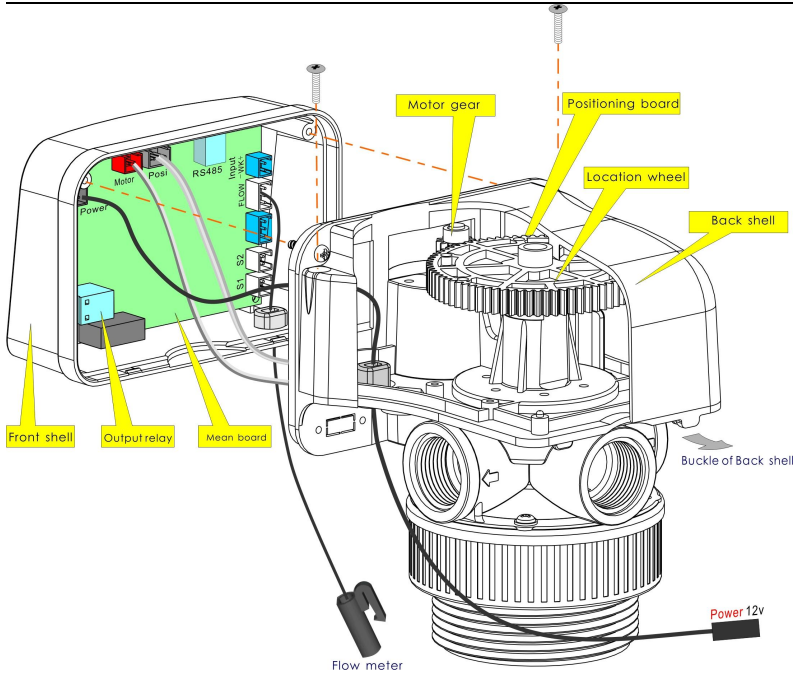
GR4-2LCD



GR10-2LCD

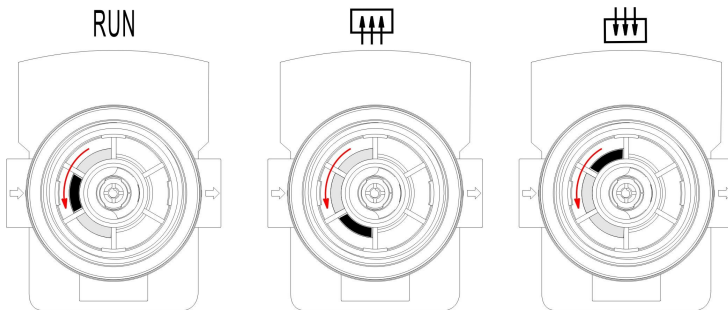
Pic8: valve geometric parameter





Pic10: Removal and connection of front shell of the controller

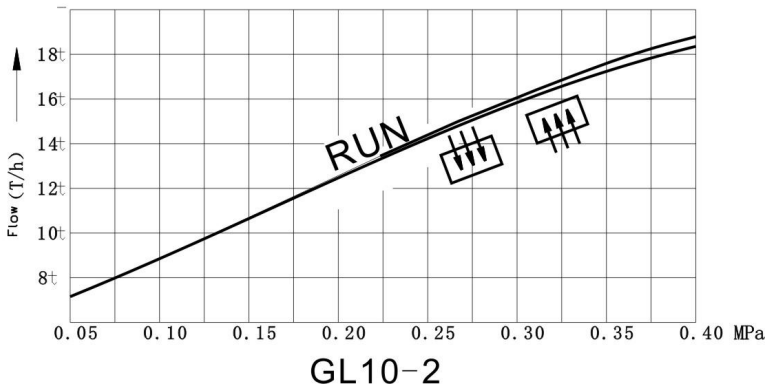
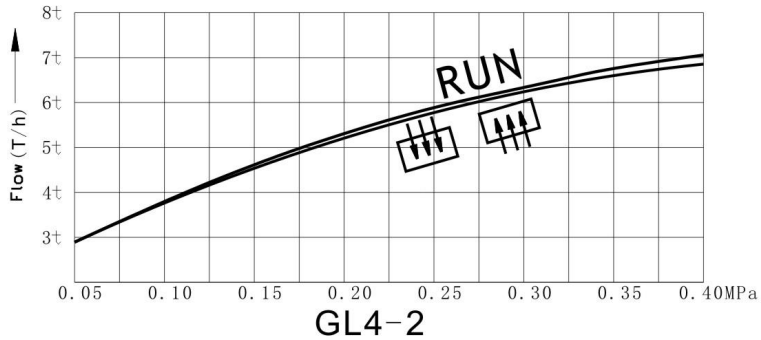
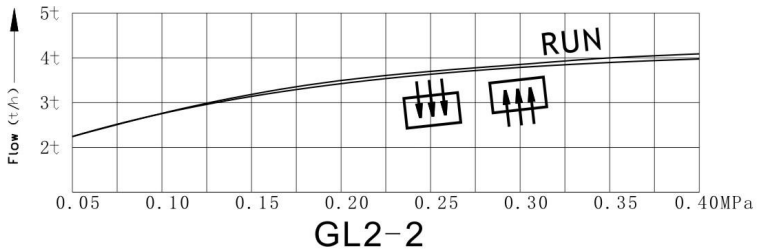
III、 Station identification from valve bottom



Note、: **B.Wash**; : **Wash**

Pic11: GL-2 identification from valve bottom

IV. Curve of Flow and Pressure for the Valve



Note、: **B.Wash**; : **Wash**

Pic12: Curve of Flow and Pressure for the Valve