

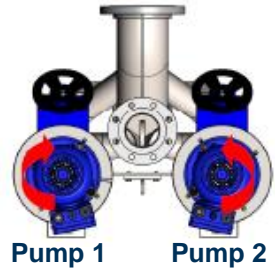
Monthly Maintenance Procedure

www.flowsolutions.com

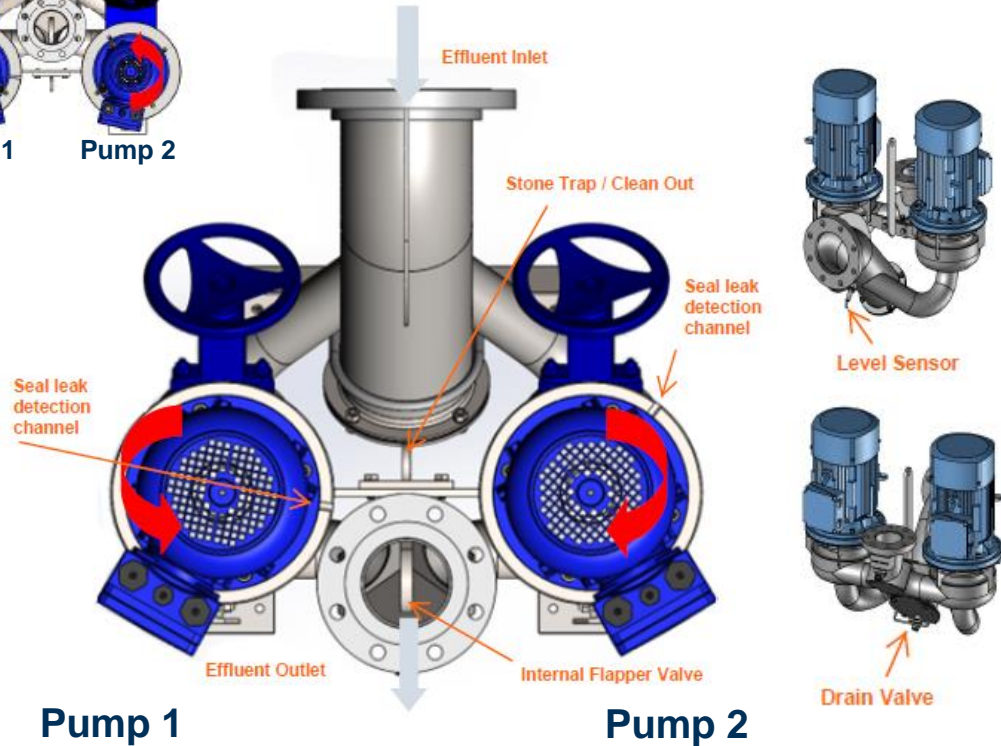
OverWatch
Direct In-Line Pump System



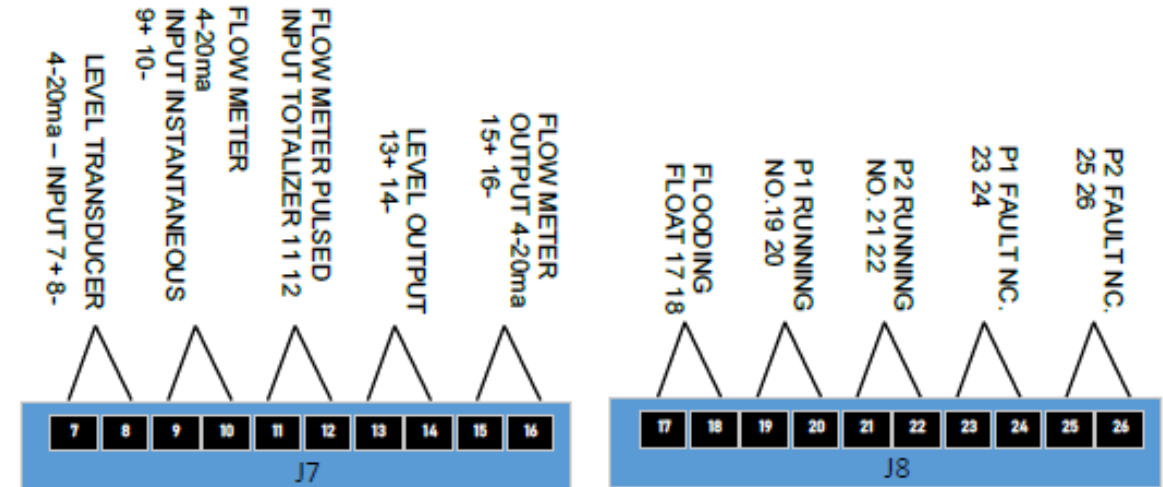
U-Version Rotation Direction: Top View



Standard Rotation Direction: Top View



Terminal Board Connections:



Recommended Monthly Checks: Regularly Check Level Sensor.

- Sump pump is operational, and the sump is clean and dry
- No alarms are present on the variable frequency controller screen
- Confirm the swing check is working properly. Removal of inspection cover maybe required if plugging or leaking is suspected
- No abnormal vibrations or elevated temperatures of the motor or in control panel
- Inspect stone trap/clean out is not full of debris
- Inspect motor fan shroud to confirm free of debris
- No leaks present on the pump; visual inspection of the seal leakage detection channel
- Inspect the internal flapper valve (a proper valve should not cause rotation of opposite motor during pumping)

Fault Codes (see full list in IOM):

3: Earth Fault (Ground fault)	There is a grounding issue that may require further inspection of the motor or cabling.
15: Motor Stall (Motor over temp)	The motor's anti-stall protection has been tripped, check for foreign material in the volute preventing pumping.
17: Auto-Level (Under-load)	The pump is not primed. Check the upstream network for water as well as calibration of the level sensor. (The system must be empty during level sensor calibration.)
50: Sensor Loss	Check for proper functioning of level sensor (Preset run mode at fixed frequency)

Electric Motor Removal Procedure (Non C-Version)



x1

30 min.

Tools

16 mm wrench for OW11 to OW21
19 mm wrench for OW31 to OW201

1

Turn HOA switches to O (Off), open inner door by turning main disconnect to 'Off'

2

Turn fusible disconnects to the "Off" position. Confirm that there is no power to the motors

3

Firmly close the suction and discharge valves

4

Open flapper assembly valve to drain the liquid

5

Open stone trap/clean out valve assembly to drain the liquid

6

Remove motor mounting bolts Use proper lifting techniques to remove the motor from its seat

7

Install closing plate on open motor seat while motor is out for R/R

8

After the motor has been installed and wired, close the stone trap/clean out valve assembly

9

Fully open the suction valve

10

Once liquid flow has been observed, the unit is primed. Close the flapper assembly valve

11

Fully open the discharge valve

12

After a few minutes of run-in, confirm there is no liquid leaks present at detection channel

13

Power the control panel and turn HOA switches to Auto. Confirm motor rotation is accurate

Electric Motor Removal Procedure (C-version)

x1

30 min.

Tools

x1
x8
x2
x8

16 mm wrench for OW11 to OW21
19 mm wrench for OW31 to OW201

1

Turn HOA switch to 0 for faulted motor. The operational motor can stay on-line and pumping liquid during this operation (with C-version Body)

2

Turn fusible disconnect on failed motor to off. The operational motor can stay on-line and pumping liquid during this operation (with C-version Body)

3

Fully close the branch isolation valve of the motor that will be replaced. The valve or the operational motor must remain open

4

Remove motor mounting bolts

5

Use proper lifting techniques to remove the motor from its seat

6

Install closing plate on motor seat while motor is out for R/R. This keeps the area dry and odorless while the system is still pumping

7

After the motor has been installed and mounting bolts are tight, the branch isolation valve can now be fully open

8

After a few minutes of run-in- confirm that there is no visible leaks, and no water is leaking from the seal leak detection channel

9

Power the control panel's fusible disconnects & turn the HOA switch to Auto. Confirm the motor rotation is accurate

OverWatch™
Direct In-Line Pump System



www.flowsolutions.com

Swing Check Valve Removal Procedure

www.flowsolutions.com

OverWatch™

Direct In-Line Pump System



x1

30 min.

Tools

x2

24mm wrench for OW11 to OW61R
30mm wrench for OW101 to OW201

1

Turn HOA switches to O (Off), open inner door by turning main disconnect to 'Off')

2

Turn fusible disconnects to the "Off" position. Confirm that there is no power to the motors

3

Firmly close the suction and discharge valves

4

Open flapper assembly valve to drain the liquid

5

Remove bolts at top and bottom of swing check; remove valve

6

Inspected internal flapper check; free to rotate

7

Replace swing check, install bolts at top and bottom of valve

8

Fully open the suction valve

9

Close flapper assembly valve to drain the liquid

10

Fully open the discharge valve

11

Inspect swing check for leaks

12

Power the control panel and turn HOA switches to Auto

OverWatch™
Direct In-Line Pump System



www.flowsolutions.com

Rev. May 2021

Maintenance Procedure – Level Sensor

www.flowsolutions.com

OverWatch™

Direct In-Line Pump System



x1

30 min.

Tools

27 mm wrench for level sensor x1

17mm wrench for OW11 to OW151 x2

19mm wrench for OW201 to OW501

1

Turn HOA switch to O (Off)

2

Firmly close the suction and discharge valves

3

Open flapper assembly valve to drain the liquid

Open Stone trap/clean out valve to drain the liquid

4

Remove stone trap/clean out cover plate

5

- When emptied, if the level sensor is reading over 16" (40 cm) the sensor is out of tolerance, replace the sensor.

- If the level sensor does not vary with the flow, replace the sensor

-If the read error is below 16" (40cm), increase level thresholds to account for this tolerance. (If an adjustment has previously been accounted for, replace the level sensor shortly)

27mm wrench

6

Close the stone trap/clean out valve assembly

7

Fully open the suction valve

8

Once liquid flow has been observed, the unit is primed. Close the flapper assembly valve

9

Fully open the discharge valve

10

Power the control panel and turn HOA switches to Auto. Confirm motor rotation is accurate



www.flowsolutions.com