

OVERVIEW

All Purpose Pumps **HYDRA™** Industrial Water Recirculation Filtration Systems are engineered to provide continuous circulation and high-efficiency filtration of industrial water within storage tank networks. These systems ensure water quality is maintained, protecting downstream equipment and supporting reliable operation of mechanical cooling or process systems.

Each **HYDRA™** system is fully custom-designed to meet specific project requirements and principal specifications. Advanced configurations including dual redundancy (N+1) and integrated skid-mounted solutions, combined with Water Pressure Booster Systems, are available to deliver enhanced reliability and seamless integration into complex water infrastructure.

SYSTEM OVERVIEW

BASE:

- Common galvanised base plate and controller stand.
- Baseplate lifting point designed to meet AS4100:1998 and AS1170.1:2002.

MANIFOLD:

- Stainless steel or PVC suction and discharge manifolds.
- Pump isolation and non return valves.
- 20mm test and drain valve.
- Stainless steel liquid filled pressure gauge.
- Pressure accumulator tank.
- Pressure Sensing Transducer (VSD).
- Flow control valves.

PUMPS:

- Single stage end suction pump or vertical multistage pump with standard IEC motors and M.I.P (Maintenance in Place) capabilities.
- Cartridge mechanical shaft seal.
- Vibration isolation rubber mounts.
- AS4020:2018 potable water compliant.

CONTROLLER:

- Manufactured in accordance with the relevant standards: AS3000:2007, AS1939:1990 and AS3439.1:2002.
- Constant Pressure VSD's (Variable Speed Drives) including capability for ultra-low harmonics ULH.
- High level interface for system monitoring and data logging.
- BACnet control (if required).

FILTRATION:

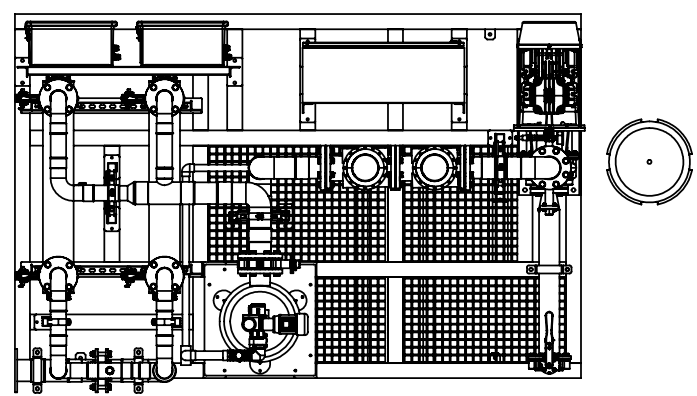
Watermark® Automatic Backwash Filters with BMS comprising of:

- 100um automatic backwash filter – Judo.
- 50/30um automatic backwash filter - Judo.
- 5/6um automatic self-cleaning fine filtration.
- Ultraviolet Disinfection – a range of highly customisable Watermark-certified UV disinfection systems, designed for long life with up to 12,000 hours lamp life & low maintenance with self-wiping capability.
- Custom configurations available to suit site requirements.

FEATURES

- Vertical or Horizontal Multistage Pumps.
- Reliable and proved control logic.
- Variable Speed Drive Controller with LED Screen.
- Fabricated Stainless Steel Pipework and Valves.
- Pressure Tanks.
- Common Steel Base for easy transport and installation.

DRAWING



TECHNICAL DATA

APPLIES TO N+1 ARRANGEMENTS

STANDARD RANGE*	
Number of pumps	1-2 Pumps
Flow range	1L/s - 120L/s
Maximum head	2000kpa
Liquid temperature	0°C to +50°C
Ambient temperature	0°C to +30°C

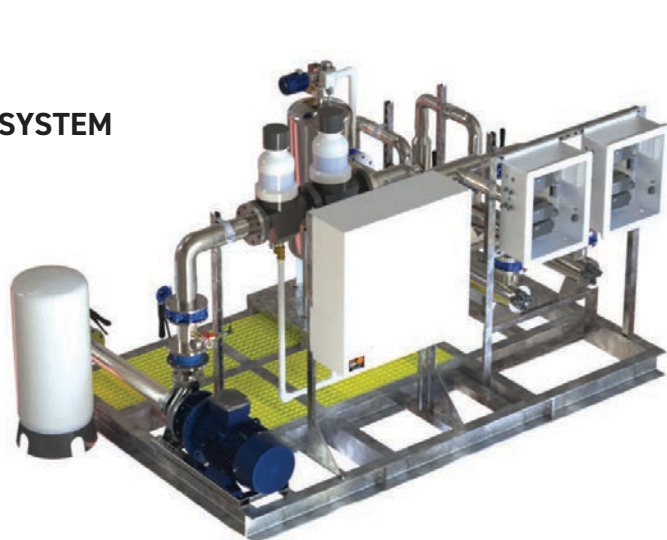
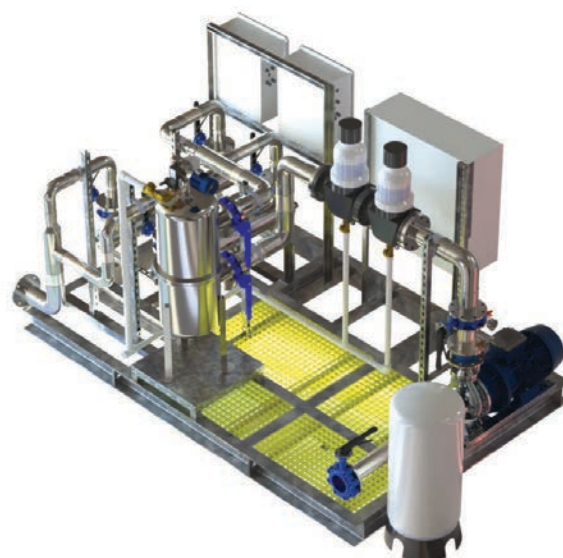
*Note – contact our team for higher capacities

INCLUSIONS

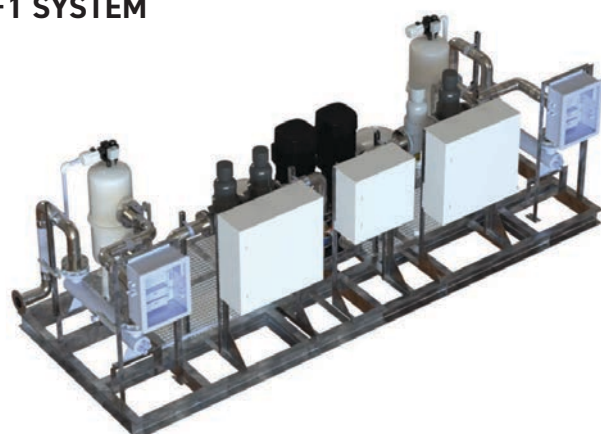
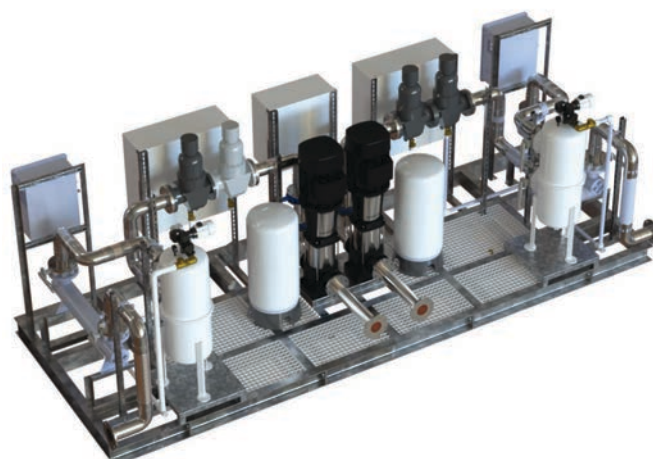
- Delivery to site - optional crane truck.
- Factory Acceptance Testing (F.A.T) at our state-of-the-art facility.
- Onsite commissioning.
- 24/7 technical support.

TYPICAL ARRANGEMENTS

N SYSTEM



N+1 SYSTEM



HIGH-FLOW SYSTEMS

