ELGA VEOLIA

MEDICA

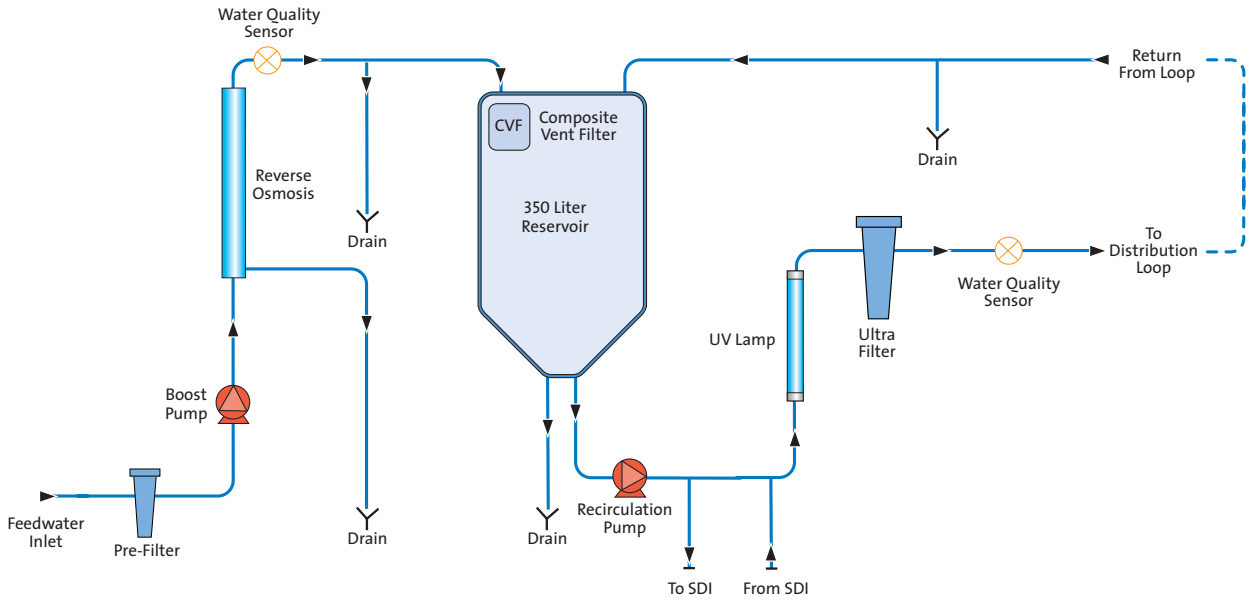
DIAGNOSTICS

MEDICA®-R 200

The MEDICA-R 200 features a unique, award winning design incorporating a very high output water purification system, large 350 liter storage reservoir and distribution loop pump. The system is designed to feed large Clinical Laboratory Automation systems, delivering up to 21 l/min of CLRW grade water directly to multiple Clinical Diagnostic Analyzers across several laboratory areas. By integrating the reservoir and water purification components into one compact system the MEDICA-R 200 is very cost-effective to install and maintain on a loop system.

- Guaranteed high output – 200 l/hr pure water productivity, delivering up to 21 l/min to Clinical Diagnostic Analyzers
- Guaranteed bacterial specification – onboard technology combined with easy system sanitization guarantees the CLSI Type 1 bacterial specification of <10 CFU/ml
- Compact footprint – easy project planning and system installation
- Cost effective – use of environmentally friendly regenerated service deionization cylinders keeps running costs low
- Easy operation and control – self monitoring software and remote display units for convenience and easy management

MEDICA-R 200



MEDICA

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Treated Water Specifications

MODEL	MEDICA-R 200
Make-up rate @15°C	200 l/hr
Delivery flow rate – maximum	230V ac, 50Hz – 18 l/min @ 45psi (3bar) ()/115V, 60Hz 21 l/min @ 45psi (3bar)
Inorganics (resistivity @25°C)	>10 MΩ-cm [1]
Organics (TOC) - typical	<30 ppb [1]
Bacteria - typical	<10 CFU/ml [2]
Particles	0.2 µm filter
Silica	<0.05 mg/l

[1] with Ion-exchange cylinder installed (Nuclear or Hypex grade resin), [2] subject to correct operating and maintenance procedures

Dimensions and weights

Dimensions	Height 1820mm (71.7in), Width 730mm (28.75in), Depth 890mm (35in)
Supply weight	180 kgs
Operational weight	530 kgs
Installation	Floor

Feedwater Requirement

Source	Tap water as detailed below		
Conductivity	<2000 µS/cm [3]		
Contaminant	**Measure**	**Range**	**Pretreatment**
Calcium	Ca ppm as $CaCO_3$	<250	None [4]
		>250	Softner or use very low RO recovery [4]
Free chlorine	Cl_2 ppm	<0.1	None
		0.1 – 0.5	20 inch carbon block
		>0.5	Cylinder of carbon sized correctly to obtain <0.1 ppm
Chloramine	Cl_2 ppm	<0.1	None
		0.1 – 0.5	20 inch high efficiency carbon [6]
		>0.5	Cylinder of carbon sized correctly to obtain <0.1 ppm
Silica	SiO_2 ppm	<30	None
		>30	20 inch cartridge depth filter or use very low RO recovery [5]
Fouling index	FI	<10	None
		10 to 20	20 inch cartridge depth filter
		>20	Back washable media filter with a minimum flow rate of 20 l/min
Iron/manganese	Fe/Mn ppm	<0.05	None
		>0.05	20 inch cartridge depth filter [6]
		>0.1	Back-washable Fe filter [7]
Organics	TOC ppm C	<2	None
		2 to 3	20 inch carbon block [5]
		>3	Cylinder of carbon sized correctly for TOC demand [5]
Temperature	4 - 40°C (Recommended 15 - 25°C)		
Flowrate (requirement at 15°C)	20 l/min		
Drain requirements (gravity fall with air gap)	45 l/min		
Feedwater pressure	60psi (4bar) maximum, 30psi (2bar) minimum		

[3] Purification pack life may vary with feedwater >1400 µS/cm [4] Check LSI, increase frequency of acid cleaning, [5] Increase frequency of alkaline cleaning, [6] Please use ELGA Part Numbers LA683 (F ilter Housing) and LC172 (Carbon F ilter), [7] Increase frequency of acid cleaning

Electrical Requirements

Mains Input	230V ac, 50Hz, 115V, 60Hz
System control voltage (not including pumps and UV)	24V dc
Power consumption (peak demand)	2000VA
Electrical protection rating	20 amps
Noise level during recirculation	<70dBA

ELGA LabWater
tel: +44 (0) 203 567 7300 • fax: +44 (0) 203 567 7205 • info@elgalabwater.com • www.elgalabwater.com

LITR 38760-04