

# 621DF with 620RA (ATEX) pumphead

600 series close-coupled pumps

## Features and benefits

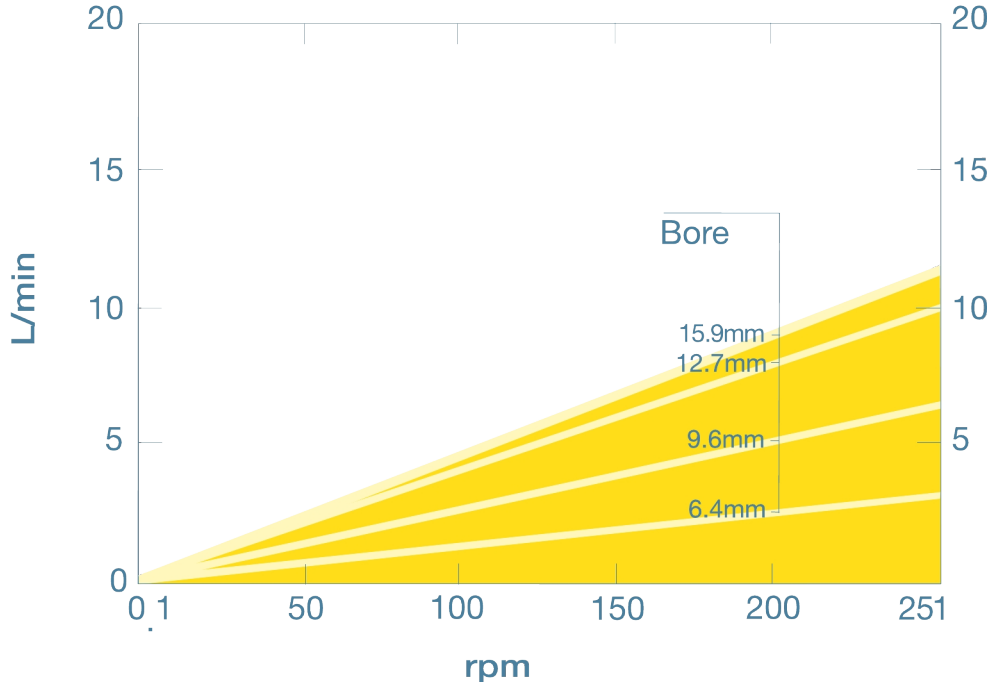
- Simplex flow rates up to 15 L/min
- Discharge pressures up to 2 bar with continuous tubing
- 620RA two roller pumphead with CIP/SIP rotor
- Compact design with foot mounted gearbox
- 24-hour continuous duty with a two-year warranty
- Reversible operation
- Fixed Speed options: 230/400 VAC, 50 Hz 3-phase. Inverters available for use outside the ATEX zone. Mechanical ball variator versions available for variable speed within the ATEX zone.



## 621DF with 620RA (ATEX) pumphead performance

Tube bore and flow rates (L/min)						Elements			
Material	rpm	620RA continuous tubing				620REA Loadsure		620RE4A Loadsure	
		6.4mm	9.6mm	12.7mm	15.9mm	12.0mm	17.0mm	12.0mm	17.0mm
Marpene, Bioprene TM	79/245					2.9-9.1	4.7-14	2.5-7.7	3.3-10
Marpene, Bioprene TL	79/245	1.0-3.2	2.0-6.1	3.2-9.8	4.3-11	2.9-9.1	5.3-16	2.5-7.7	3.7-12
Pumpsil, Neoprene, STA-PURE PCS	79/245	0.95-2.9	2.1-6.6	3.3-10	4.9-14	3.1-9.5	4.8-15	2.6-8.1	3.4-10
STA-PURE PFL	79/245	0.95-2.9	2.0-6.1	3.2-9.8	4.8-15	3.1-9.8	5.7-18	2.7-8.3	4.0-12

620RA performance graph



## Technical specifications

	621DF with 620RA (ATEX) pumphead
Max. flow rate	15 L/min
Min. flow rate	0.95 L/min
Max. operating pressure	2 bar
Max. operating pressure	30 psi
Ambient Temperature Range	5 to 40 °C
Ambient Temperature Range	41 to 104 °F
Motor types	Fixed speed motor
Max. operating speed	245 rpm
Standards	ATEX 2014/34/EU, ATEX II 2G Ex h IIB T4 Gb X, CE
Ingress rating	IP55
Noise	<70dB(A) at 1m
Weight	26 kg
Weight	57 lbs
Power supply	230/400 V 3 ph, 50 Hz

Table lists details for fixed speed pumps. For more detail on drive, AC motor and inverter options please contact your local Watson-Marlow Fluid Technology Solutions representative.

## Materials of construction

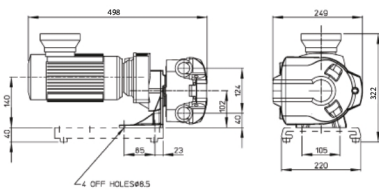
	621DF with 620RA (ATEX) pumphead
Gearbox	Aluminium, Cast iron
Motor	Cast iron
Pumphead guard	Pressure die-cast aluminium LM24
Pumphead roller assembly	MoS2 filled Nylon 6 (Nylatron), Stainless steel 303S31
Pumphead rotor assembly	PPS/10% stainless steel strands
Pumphead track	Aluminium alloy with epoxy polyester powder coat finish
Seals	Neoprene
Tube clamp assembly	PP (polypropylene)

Information listed covers the complete range of fixed speed pumps.

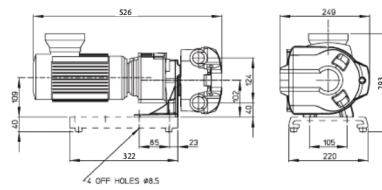
For detailed specifications of individual models/components and other drive/pumphead options, refer to user manual or contact WMFTS representative.

## 621DF with 620RA (ATEX) pumphead dimensions

245 rpm model



79 rpm model



## Product codes

Pump	rpm	Supply	Product code
621DF/RA ATEX fixed speed PTC's	79	230/400V 50Hz 3ph 0.37kW	060.8622.020 - *10:1
	245	230/400V 50Hz 3ph 0.37kW	060.8652.020 - *10:1

\*10:1 or 5:1 speed reduction available using VFD

\*ATEX pumps 10:1 speed reduction available using VFD from geared units fitted with PTC thermistors

For alternative speeds and motor options contact Watson-Marlow Applications Engineering Department.

Pumphead	Description	Product code
620RA (ATEX)	Two roller continuous tubing pumphead for maximum 2bar peak pressure	064.0211.A00

Tubing				
Bore/wall (mm)	Bioprene	Marprene	Platinum Silicone	PureWeld XL
6.4x3.2	933.0064.032	902.0064.032	913.A064.032	
9.6x3.2	933.0096.032	902.0096.032	913.A096.032	942.0096.032
12.7x3.2	933.0127.032	902.0127.032	913.A127.032	942.0127.032
15.9x3.2	933.0159.032	902.0159.032	913.A159.032	
Bore/wall (mm)	STA-PURE	STA-PURE PFL		
6.4x3.2	961.0064.032	966.0064.032		
9.6x3.2	961.0096.032	966.0096.032		
12.7x3.2	961.0127.032	966.0127.032		
15.9x3.2	961.0159.032	966.0159.032		

Loadsure Elements				
Material	12mm Tri-Clamp 3/4" PVDF connectors	17mm Tri-Clamp 3/4" PVDF connectors	12mm C&G with PP 3/4" connectors	12mm C&G with PP 3/4" connectors
Bioprene TL 0-2 bar (peak)	933.0120.PFT	933.0170.PFT		
Bioprene TM 0-4 bar (peak)	933.M120.PFT	933.M170.PFT		
STA-PURE PCS 0-4 bar (peak)	961.0120.PFT	961.0170.PFT		
Pumpsil (0-2 bar peak)	913.A120.PFT	913.A170.PFT		
Marprene TL 0-2 bar (peak)			902.0120.PPC	902.0170.PPC
Marprene TM 0-4 bar (peak)			902.P120.PPC	902.P170.PPC
Pumpsil 0-2 bar (peak)			913.A120.PPC	913.A170.PPC

Disclaimer: All flow rates shown were obtained pumping water at 20 °C (68 °F) with zero suction and delivery heads. Watson-Marlow, Pumpsil, PureWeld XL, Bioprene and Marprene are trademarks of Watson-Marlow Limited. Disclaimer: The information contained in this document is believed to be correct but Watson-Marlow Limited accepts no liability for any errors it contains, and reserves the right to alter specifications without notice. GORE and STA-PURE are trademarks of W. L. Gore & Associates. Please state the product code when ordering pumps and tubing.

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