

Alfa Laval MR-166US, -185US, -200US Liquid-Ring Pump

Air/Gas and Vacuum - No Problem

Application

The MR liquid-ring pump is specially designed for pumping liquids containing air or gas. This versatile 3A compliant pump can be used in the food, pharmaceutical, chemical and similar industries. You'll find the pump is mainly used for CIP return applications.

Standard design

All product wetted parts including the pump casing, casing cover and impeller are build with AISI 316L stainless steel.

Shaft seal

The mechanical single seals have stationary seal rings of stainless steel AISI 329 and rotating seal rings of carbon.



TECHNICAL DATA

Materials

Surface finish: Ra 32 μ in.

Product wetted steel parts: Stainless steel AISI 316L and

AISI 329L.

Other stainless steel parts: Stainless steel
Adaptor: Mild steel grade.
Product wetted seals: EPDM (acc. to FDA).

Motor

Standard C-faced, foot mounted motor according to NEMA standard. 1750 RPM. Class F.

Voltage and frequency

3~, 60 Hz, 230/460V.

Motor sizes

166	60 Hz:	3 Hp - 1750 RPM
185	60Hz:	7.5 Hp - 1750 RPM
200	60Hz:	15 Hp - 1750 RPM

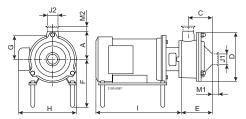
OPERATING DATA

Pressure

Max. inlet pressure: 60 psi (4 bar).

Temperature

Dimension



Pump specific measures

Pump Model	MR-166 US	MR-185 US	MR-200 US
A	5.079	6.063	6.063
С	4.606	5.512	5.512
D	9.173	10.236	10.236
Е	5.906	6.811	6.811

Motor specific measures

Motor TC	182TC	184TC	213TC	215TC	254TC
Motor HP	3.0	5.0	7.5	10.0	15.0
F(max)*	9.094	9.094	9.843	9.843	10.866
G	4.488	4.488	5.394	5.394	6.772
Н	11.102	11.102	13.071	13.071	17.795
I	16.772	16.929	19.134	19.252	23.189

^{*}Possible to reduce dimension F by min. XX mm for all pump models. For smaller models it will be possible to reduce dimension F even further.

Motor overview

Pump Model	MR-166 US	MR-185 US	MR-200 US
Moter range (TC)	182TC	213TC	254TC

Dimensional data are based on 4 pole, Sterling motors.

Connections

Pump Model		MR-166S	MR-185US/200US
Tri-Clamp	M1	1.13	1.13
	M2	1.13	1.13
Bevel seat	M1	2.19	2.63
	M2	2.19	2.37
J1*		2.00"	3.00"
J2*		2.00"	2.50"

^{*} Other dimensions available on request.

Options

- A. Other voltage and frequency.
- B. 20 Ra mechanical polish on wetted path.
- C. Drain in casing and cover.
- D. Product wetted seals of Fluorinated rubber (FPM).
- E. Shaft seal with SIC/SIC is an option for the MR-185 and MR-200.

Ordering

Please state the following when ordering:

- Pump type.
- Voltage and frequency.
- Connections.
- Flow rate. pressure and temperature.
- Density and viscosity of product.
- Options.

Note!

For further information, see also instruction ESE00675 and ESE02051.

