



Construction

Close-coupled, centrifugal pumps; electric motor with extended shaft directly connected to the pump.

- Single-impeller
- Two back-to-back impellers (with axial thrust balancing).

Connections: threaded ports NPT.

Applications

- For clean liquids without abrasives, which are, non-aggressive for the pump materials (solids content up to 0.2%).
- For water supply.
- For heating, air-conditioning, cooling and circulation plants.
- For civil and industrial applications.
- For irrigation.

Operating conditions

Liquid temperature from 14 °F to 194 °F.

Ambient temperature up to 104 °F.

Total suction lift up to 23 ft.

Maximum permissible working pressure up to 145 psi (232 psi for pumps NMD).

Continuous duty.

Motor

2-pole induction motor, 60 Hz ($n \approx 3450$ rpm).

Three-phase 230/460 V.

Single-phase 115/230 V, 115 V, 230 V.

Insulation class F.

Protection IP 44.

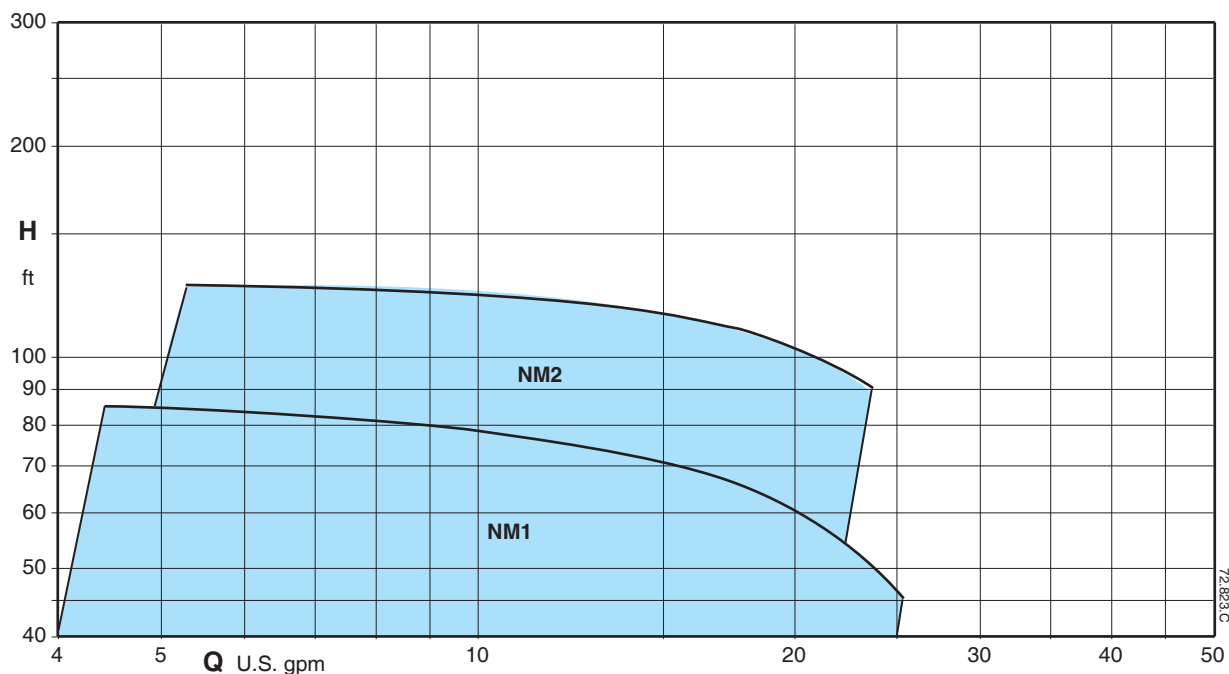
Special features on request

- Other voltages.
- Special mechanical seal
- Higher or lower liquid or ambient temperatures.

Materials

Components	Material
Pump casing	Cast iron
Lantern bracket	GJL 200 EN 1561
Impeller	Brass CW510L (lead free public LAW 111-380)
Shaft	Cr steel AISI 430
	Cr Ni steel AISI 303
	1 - 1.5 - 2.5 - 3 HP
Mechanical seal	Carbon - Ceramic - NBR

Performance range $n \approx 3450$ rpm



Performance $n \approx 3450$ rpm

115 V 1~	230 V 1~	115/230 V 1~	230/460 V 3~	P ₂ HP	H ft	45	50	55	60	65	70	75	80	85					
NM1A 03A16S	NM1A 03C16S		NM1A 03H36S	0.33	Q	23	19	17	14	10	6								
NM1S 05A16S	NM1S 05C16S		NM1S 05H36S	0.5	US gpm	26	26	24	23	21	19	15	11	6					

115 V 1~	230 V 1~	115/230 V 1~	230/460 V 3~	P ₂ HP	H ft	65	70	75	80	85	90	95	100	105	110	115			
NM2B 05A16S	NM2B 05C16S	NM2B 05F16S	NM2B 05H36S	0.5	Q	21	20	16	12	7									
NM2A 07A16S	NM2A 07C16S	NM2A 07F16S	NM2A 07H36S	0.75	US gpm						23	20	17	15	11	7			

P₂ Rated motor power output.

Tolerances according to UNI EN ISO 9906:2012

H Total head in ft.

* Maximum suction lift 6.5-10 ft.

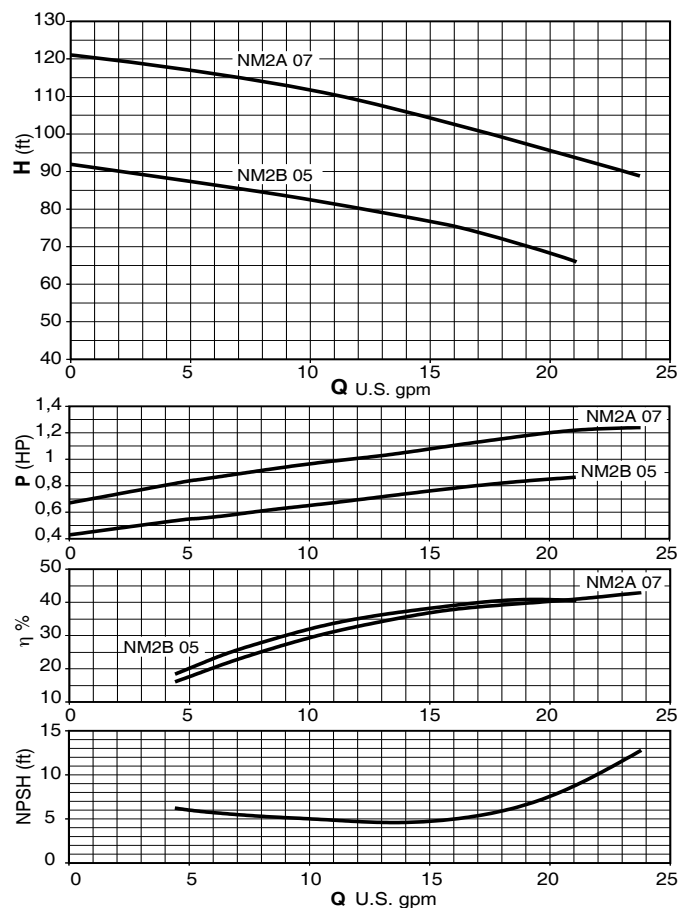
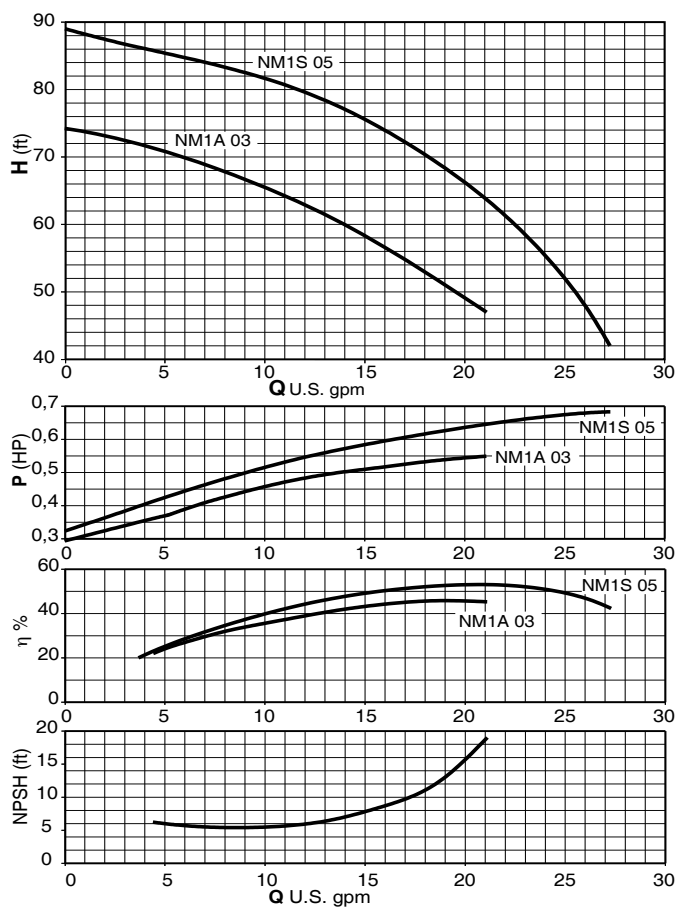
Rated currents

	P ₂ HP	3~		1~			
		230/460V In A	I _A /In	115 V In A	230 V In A	115/230V In A	I _A /In
NM1A 03	0.33	1.9/1.2	3.8	7.4	3.7	-	2.7
NM1S 05	0.5	2.4/1.6	5.4	8.4	4.2	-	2.6
NM2B 05	0.5	2.6/1.6	3.7	10.8	5.4	8.8/4.5	3.1
NM2A 07	0.75	3.8/2.3	6.8	12.4	6.2	11.9/6.1	3.5

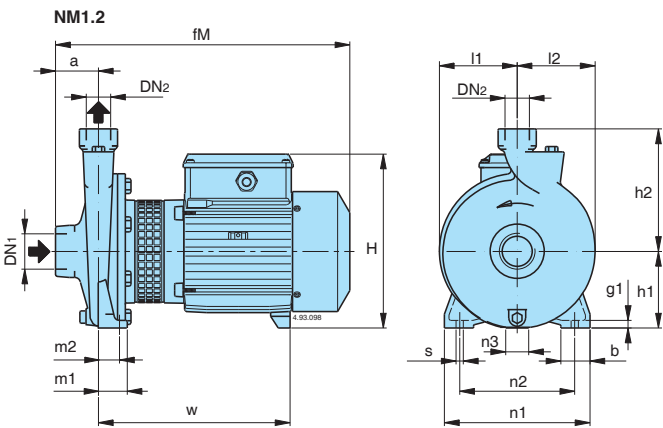
P₂ Rated motor power output.

I_A/In D.O.L. starting current / Rated current

Characteristic curves $n \approx 3450$ rpm



Dimensions and weights



TYPE	DN ₁ NPT	DN ₂ NPT	in															
			a	fM	h ₁	h ₂	H	m ₁	m ₂	n ₁	n ₂	n ₃	b	s	l ₁	l ₂	w	g ₁
NM1A 03 - NM1S 05	1	1	1.57	10.28	3.15	5.2	6.93	1.57	1.26	6.69	5.51	0.67	1.38	0.37	3.03	3.19	6.73	0.39
NM2B 05 - NM2A 07	1	1	1.77	12.01	3.74	5.91	8.15	1.57	1.26	7.48	6.3	0.67	1.38	0.37	3.43	3.54	7.99	0.39

TYPE	lb	
	3~	1~
NM1A 03	18.9	19.1
NM1S 05	20.2	20.5
NM2B 05	28.8	30.8
NM2A 07	31.2	33.2

Features

Compact Design

The compact design allows for easy installation even in confined spaces.

Robustness

The mechanical structure of the hydraulic parts in contact with the pumped liquid are dimensioned to guarantee the maximum resistance to mechanical stress.

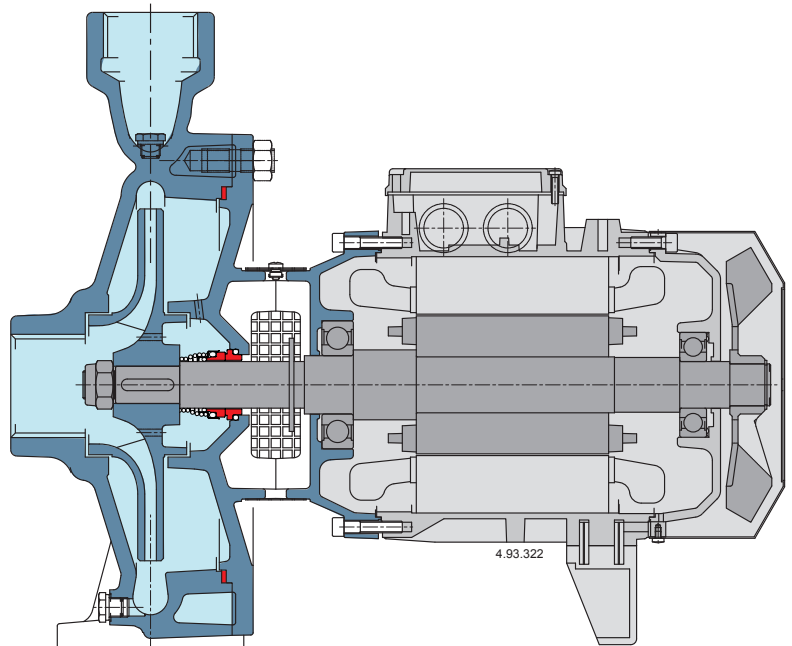
A unique design

The lantern bracket design prevents contact with the pumps rotating parts, providing protection to the end user whilst allowing for inspection of the mechanical seal.

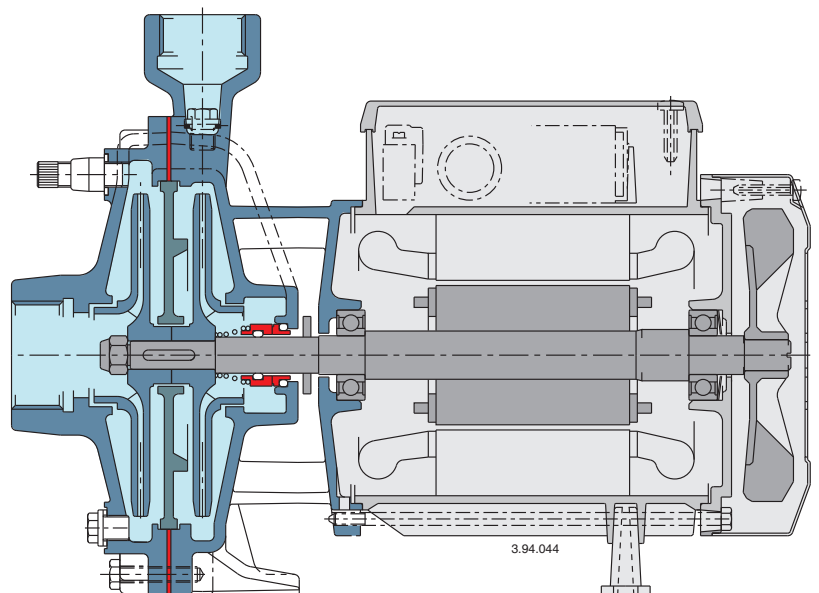
Reliability

The bearing and shaft are designed to ensure the reduction of the stress, providing high reliability under all operating conditions.

Single-impeller



Two back-to-back impellers



Flexibility

The option to choose between cast iron and bronze materials for the hydraulic parts in contact with the pumped liquid allows two back-to-back impellers series pumps to be selected for use with different types of liquids.

Robustness

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Reliability

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