

TOP

Submersible DRAINAGE pumps

 Clear water

 Domestic use



PERFORMANCE RANGE

- Flow rate up to **360 l/min** (21.6 m³/h)
- Head up to **15.5 m**

APPLICATION LIMITS

- Immersion depth:
 - up to **3 m** for TOP 1-2-3
 - up to **5 m** for TOP 4-5(with a sufficiently long power cable)
- Maximum liquid temperature **+40 °C**
(Maximum liquid temperature +90 °C for a maximum of 3 minutes intermittent service)
- Passage of suspended solids up to **Ø 10 mm**
- Suction level:
 - **14 mm** above ground level for TOP 1-2-3
 - **30 mm** above ground level for TOP 4-5
- Continuous service **S1**

CONSTRUCTION AND SAFETY STANDARDS

The pumps are complete with:

- **5 m** long power cable for TOP 1-2-3
- **10 m** long power cable for TOP 4-5
- float switch

EN 60335-1
IEC 60335-1
CEI 61-150

EN 60034-1
IEC 60034-1
CEI 2-3



CERTIFICATIONS

Company with management system certified DNV
ISO 9001: QUALITY



INSTALLATION AND USE

The **TOP** series is suitable for use with **clear water** that does not contain abrasive particles.

Because of the design solutions that have been adopted, such as the complete cooling of the motor and the shaft with double seal, these pumps are easy to use and reliable.

They are suitable for use in applications such as draining small flooded areas (rooms, cellars, garages) in the event of an emergency, for the disposal of waste water in the home (from dishwashers, washing machines) and for emptying drainage traps.

PATENTS - TRADE MARKS - MODELS

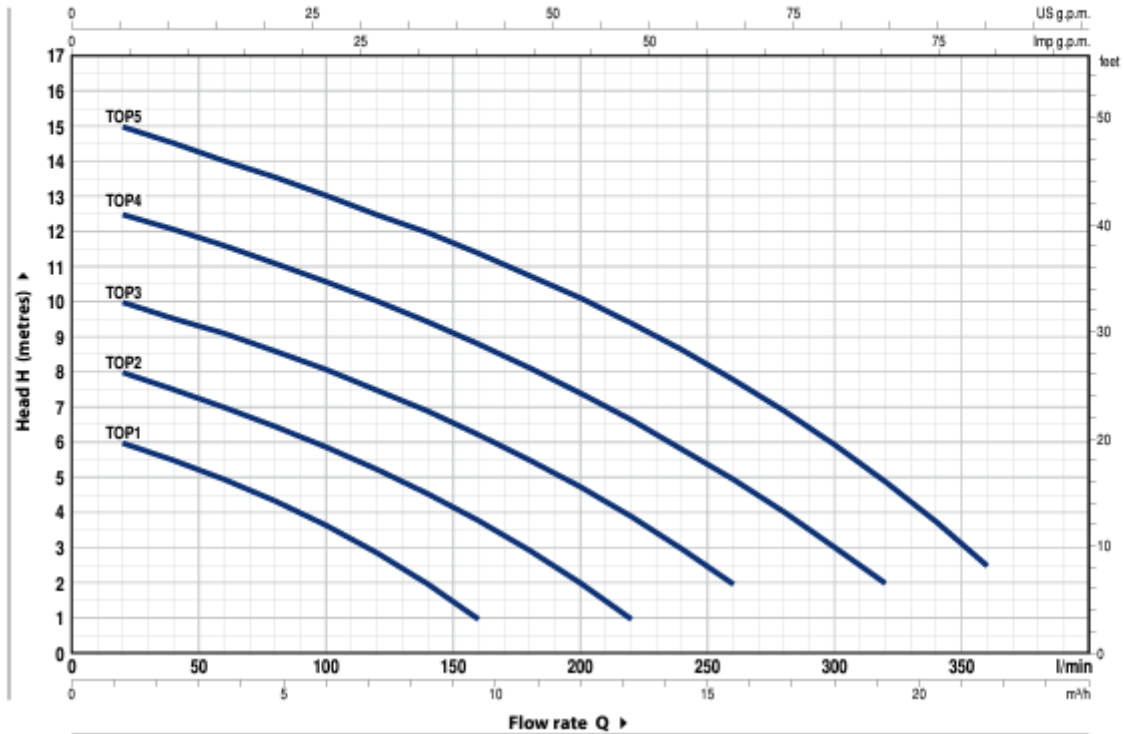
- Patent n. IT0001428923
- Registered EU Design n. 342159-0011

OPTIONS AVAILABLE ON REQUEST

- **"TOP-GM"** pumps with vertical float switch (suitable for particularly small wells)
- **"TOP 2-3 LA"** pumps intended for use with aggressive liquids
- Special mechanical seal
- TOP 1-2-3 pumps with **10 m** long power cable
 - ⇒ N.B. Standard EN 60335-2-41 states that the power cable must be 10 m long for outdoor applications
- Pumps without float switch
- Other voltages or 60 Hz frequency

CHARACTERISTIC CURVES AND PERFORMANCE DATA

50 Hz n= 2900 min⁻¹



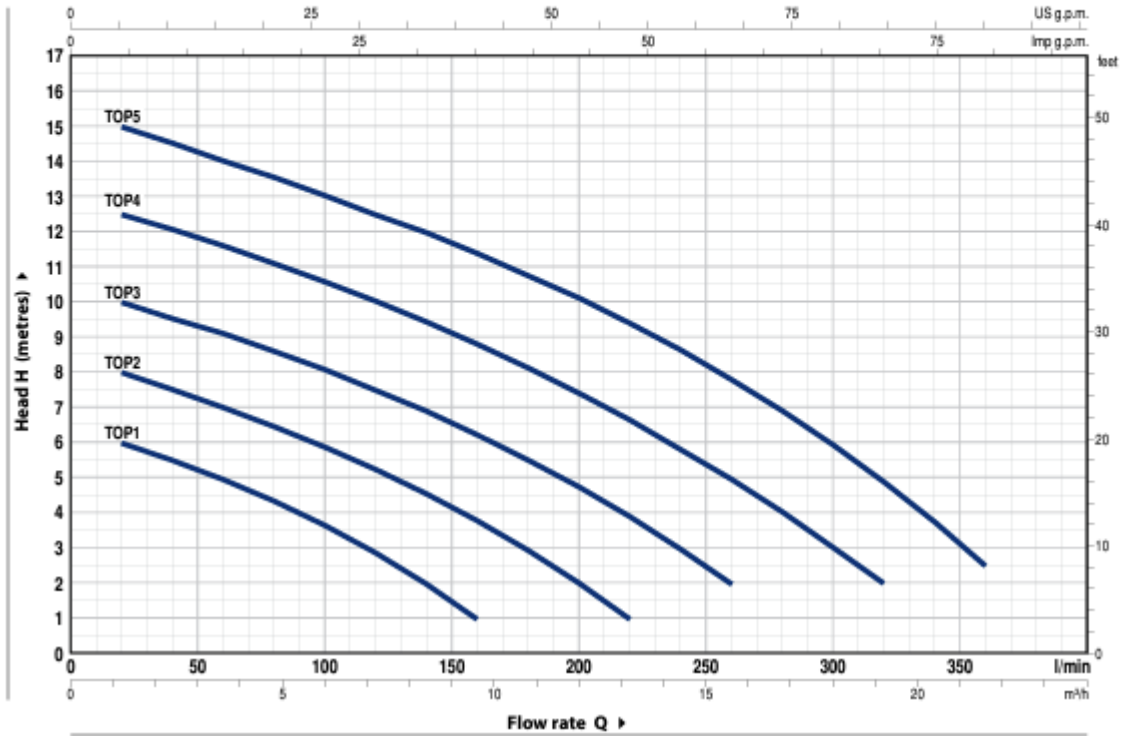
MODEL Single-phase	POWER (P ₂)		Q	Flow rate																					
	kW	HP		m ³ /h	l/min	0	1.2	2.4	3.6	4.8	6.0	7.2	8.4	9.6	10.8	12.0	13.2	14.4	15.6	16.8	18.0	19.2	20.4	21.6	
TOP 1	0.25	0.33	H metres	6.5	6	5.5	5	4.4	3.7	2.9	2	1													
TOP 2	0.37	0.50		8.5	8	7.5	7	6.5	5.9	5.3	4.6	3.8	3	2	1										
TOP 3	0.55	0.75		10.4	10	9.6	9.1	8.6	8.1	7.5	6.9	6.3	5.5	4.8	3.9	3	2								
TOP 4	0.75	1		12.9	12.5	12.1	11.6	11.1	10.6	10.1	9.5	8.8	8.2	7.4	6.7	5.9	5	4	3.1	2					
TOP 5	0.92	1.25		15.5	15	14.5	14	13.6	13.1	12.6	12	11.4	10.8	10.1	9.4	8.7	7.8	6.9	6	4.9	3.7	2.5			

Q = Flow rate H = Total manometric head

Tolerance of characteristic curves in compliance with EN ISO 9906 Grade 3B.

CHARACTERISTIC CURVES AND PERFORMANCE DATA

50 Hz n= 2900 min⁻¹



MODEL	POWER (P ₂)		Q	H metres																		
	kW	HP		0	1.2	2.4	3.6	4.8	6.0	7.2	8.4	9.6	10.8	12.0	13.2	14.4	15.6	16.8	18.0	19.2	20.4	21.6
Single-phase			l/min	0	20	40	60	80	100	120	140	160	180	200	220	240	260	280	300	320	340	360
TOP 1	0.25	0.33		6.5	6	5.5	5	4.4	3.7	2.9	2	1										
TOP 2	0.37	0.50		8.5	8	7.5	7	6.5	5.9	5.3	4.6	3.8	3	2	1							
TOP 3	0.55	0.75		10.4	10	9.6	9.1	8.6	8.1	7.5	6.9	6.3	5.5	4.8	3.9	3	2					
TOP 4	0.75	1		12.9	12.5	12.1	11.6	11.1	10.6	10.1	9.5	8.8	8.2	7.4	6.7	5.9	5	4	3.1	2		
TOP 5	0.92	1.25		15.5	15	14.5	14	13.6	13.1	12.6	12	11.4	10.8	10.1	9.4	8.7	7.8	6.9	6	4.9	3.7	2.5

Q = Flow rate H = Total manometric head

Tolerance of characteristic curves in compliance with EN ISO 9906 Grade 3B.

TOP 1-2-3

POS. COMPONENT CONSTRUCTION CHARACTERISTICS

1 PUMP BODY	Technopolymer
2 SUCTION FILTER	Technopolymer
3 SUCTION PLATE	Stainless steel AISI 304 (AISI 316L for LA versions)
4 DIFFUSER	Technopolymer
5 IMPELLER	Noryl
6 MOTOR CASING	Stainless steel AISI 304 (AISI 316L for LA versions)
7 MOTOR CASING PLATE	Stainless steel AISI 304
8 MOTOR SHAFT	Stainless steel AISI 431 (AISI 316L for LA versions)

9 SHAFT WITH DOUBLE SEAL AND OIL CHAMBER

Pump Model	Seal Model	Shaft Diameter	Materials			
			Stationary ring	Rotational ring	Elastomer	Metals
TOP 1-2-3 TOP 1-2-3 GM	STA-12R	Ø 12 mm	Ceramic	Graphite	NBR	AISI 304
TOP 2-3 LA	AR-12R LA	Ø 12 mm	Ceramic	Graphite	NBR	AISI 316

10 LIP SEAL	Ø 12 x Ø 19 x H 5 mm
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11 BEARINGS	6201 ZZ / 6201 ZZ
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12 CAPACITOR

Pump	Capacitance	
Single-phase	(230 V or 240 V)	(110 V)
TOP 1	10 µF 450 VL	16 µF - 250 VL
TOP 2	10 µF 450 VL	16 µF - 250 VL
TOP 3	14 µF 450 VL	16 µF - 250 VL

13 ELECTRIC MOTOR

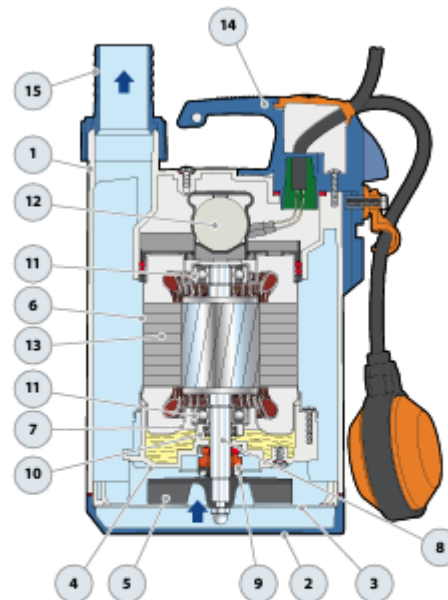
TOP: single-phase 230 V - 50 Hz
with thermal overload protector incorporated into the winding.
- Insulation: class F
- Protection: IP X8

14 HANDLE ASSEMBLY (resin sealed)

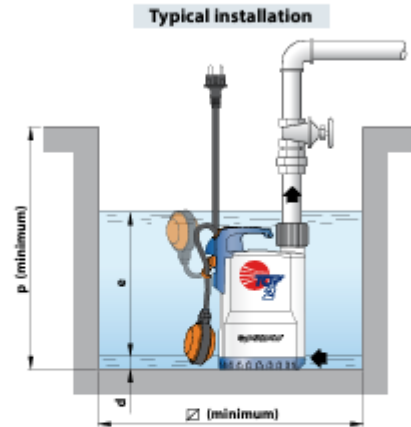
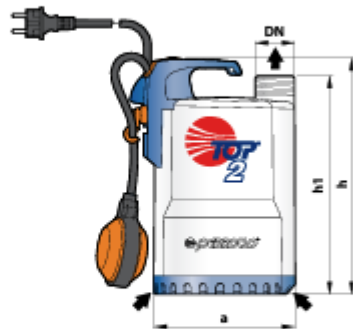
Complete with:
- 5 metres long "H07 RN-F" power cable with Schuko plug
- Float switch
(Vertical float switch in the GM versions)

15 HOSE CONNECTOR WITH RING NUT

Ø 25 mm hose connection for TOP 1
Ø 35 mm for TOP 2-3

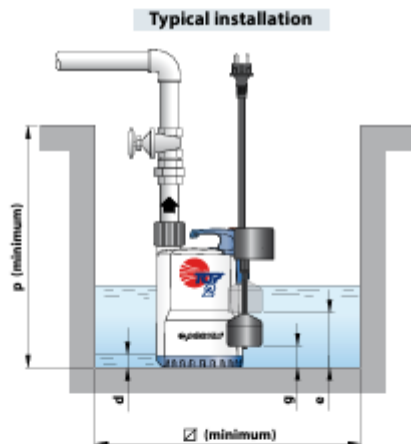
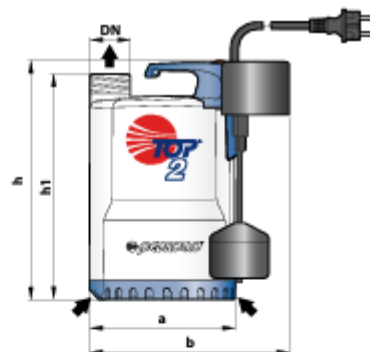


DIMENSIONS AND WEIGHT



MODEL	PORT DN	DIMENSIONS mm							kg
		a	h	h1	d	e	p	Ø	
Single-phase									
TOP 1	1½"	152	260	240	14	regolabile	350	350	5.3
TOP 2			290	270					5.3
TOP 3									6.7

Version with vertical float switch



MODEL	PORT DN	DIMENSIONS mm										kg
		a	b	h	h1	d	e	g	p	Ø		
Single-phase												
TOP 1-GM	1½"	152	200	260	240	14	140	35	350	220	5.4	
TOP 2-GM				290	270						5.4	
TOP 3-GM											6.9	

ABSORPTION

MODEL	VOLTAGE		
	230 V	240 V	110 V
Single-phase			
TOP 1	1.5 A	1.4 A	3.0 A
TOP 2	2.0 A	2.0 A	4.0 A
TOP 3	3.2 A	3.2 A	6.4 A

PALLETIZATION

MODEL	GROUPAGE	CONTAINER
Single-phase	n. pumps	n. pumps
TOP 1	96	144
TOP 2	96	144
TOP 3	96	144