



PERFORMANCE RANGE

- Flow rate up to **300 l/min** (18 m³/h)
- Head up to **14 m**

APPLICATION LIMITS

- **5 m** maximum immersion depth (with a sufficiently long power cable)
- Maximum liquid temperature **+40 °C**
- Passage of suspended solids up to **Ø 10 mm**
- Suction down to **21 mm** above ground level
- **180 mm** minimum immersion depth for continuous service

CONSTRUCTION AND SAFETY STANDARDS

- **5 m** long power cable
- Float switch for single-phase versions

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
ISO 14001: ENVIRONMENT

INSTALLATION AND USE

Designed to pump **clear or slightly dirty water**, these pumps are suitable for use in domestic applications and in particular for draining flooded areas such as cellars or for emptying tanks and reservoirs; they distinguish themselves for the ease with which they are installed and their reliability under automatic operating conditions in fixed installations.

OPTIONS AVAILABLE ON REQUEST

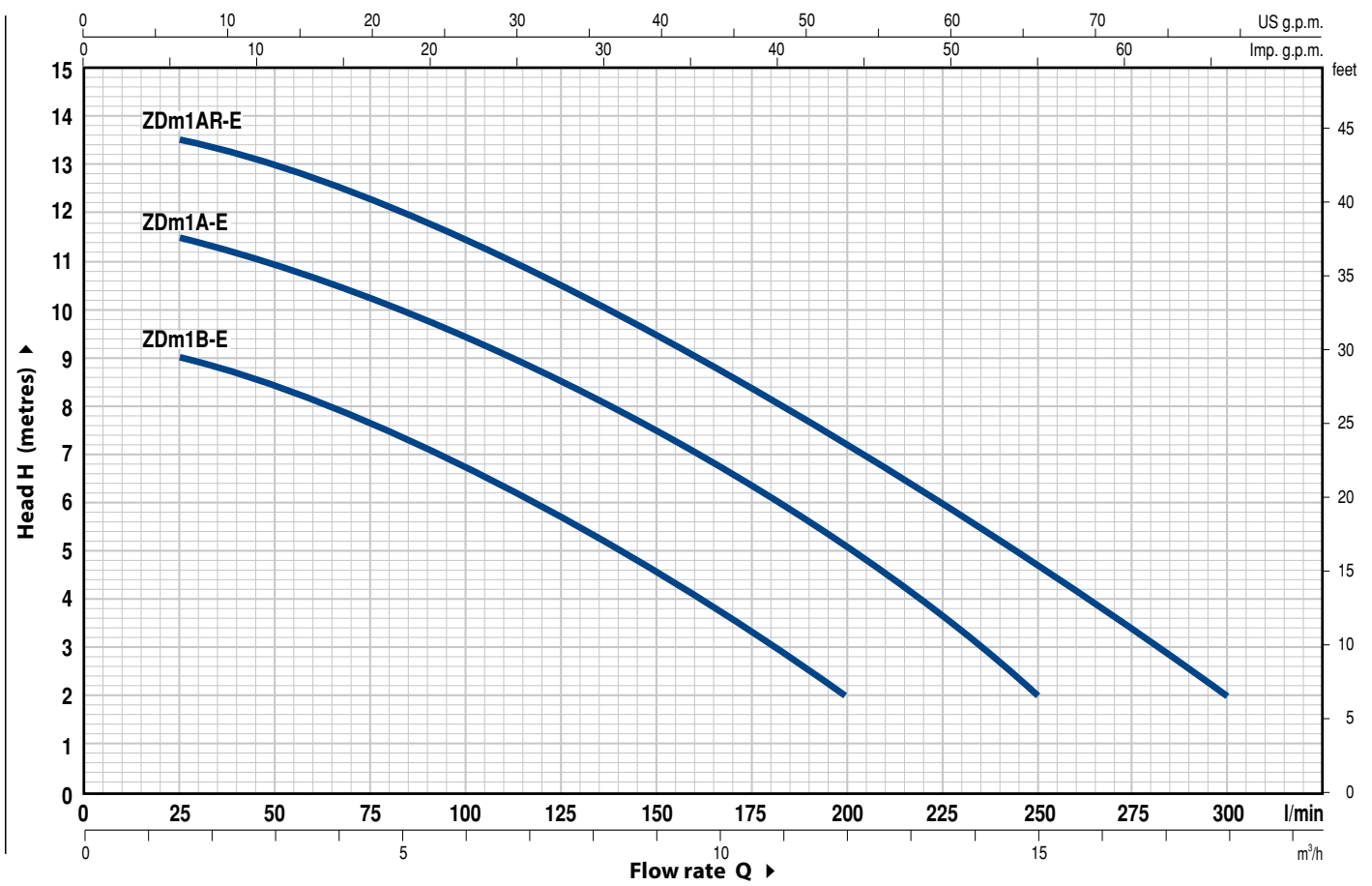
- Pumps with a **10 m** long power cable.
 - N.B.: Standard EN 60335-2-41 states that the power cable must be 10 m long for outdoor applications
- Single-phase pumps without float switch
- Other voltages

GUARANTEE

2 years subject to terms and conditions

CHARACTERISTIC CURVES AND PERFORMANCE DATA

60 Hz n= 3450 rpm



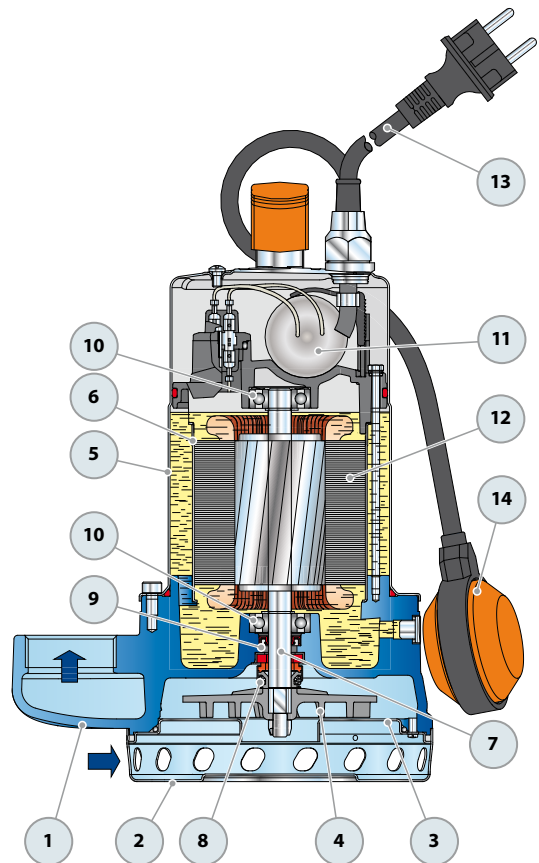
MODEL Single-phase	POWER (P ₂)		Q	Flow rate														
	kW	HP		m ³ /h	0	1.5	3.0	4.5	6.0	7.5	9.0	10.5	12.0	13.5	15.0	16.5	18.0	
ZDm 1B-E	0.37	0.50	l/min	0	25	50	75	100	125	150	175	200	225	250	275	300		
ZDm 1A-E	0.50	0.70	H metres	9.5	9	8.4	7.6	6.7	5.7	4.5	3.3	2						
ZDm 1AR-E	0.60	0.85		12	11.5	10.9	10.2	9.5	8.5	7.5	6.3	5	3.6	2				
				14	13.5	13	12.2	11.5	10.5	9.5	8.3	7	5.7	4.5	3.2	2		

Q = Flow rate H = Total manometric head

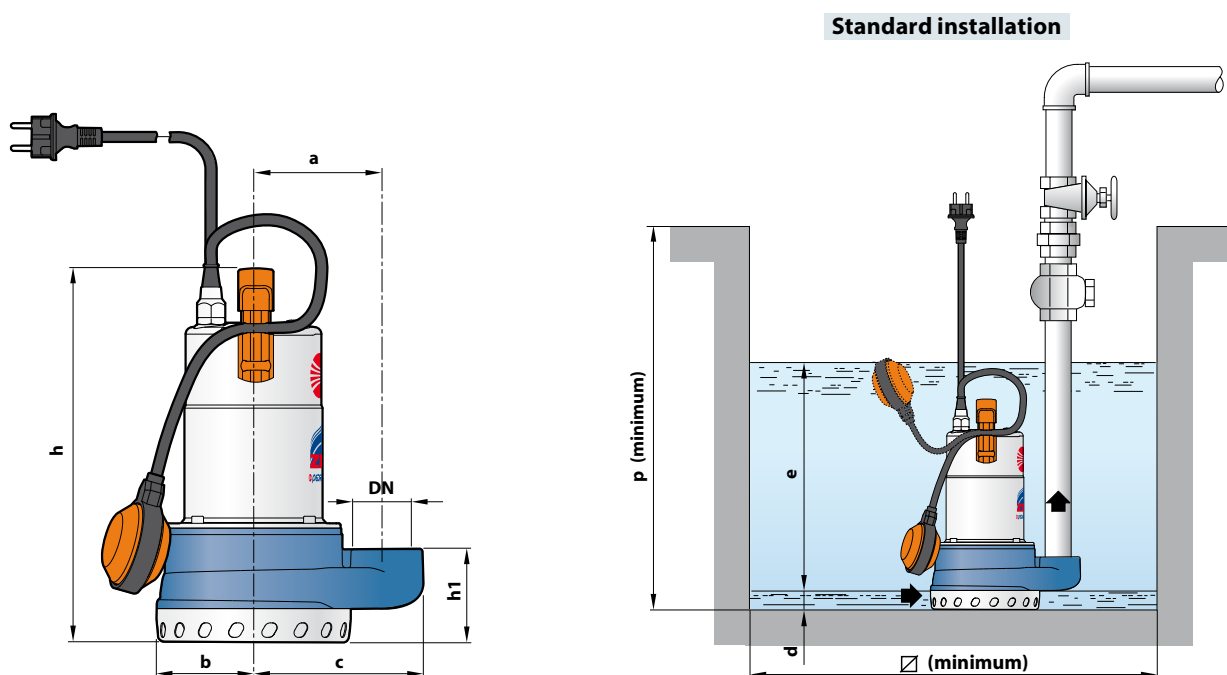
Tolerance of characteristic curves in compliance with EN ISO 9906 Grade 3B.

POS. COMPONENT CONSTRUCTION CHARACTERISTICS

1 PUMP BODY	Cast iron with threaded port in compliance with ISO 228/1																	
2 SUCTION FILTER	Stainless steel AISI 304																	
3 SUCTION PLATE	Stainless steel AISI 304																	
4 IMPELLER	Noryl FE1520PW open type																	
5 MOTOR SLEEVE	Stainless steel AISI 304																	
6 MOTOR CASING	Steel																	
7 MOTOR SHAFT	Stainless steel EN 10088-3 - 1.4104																	
8 SHAFT WITH DOUBLE SEAL	<table border="1"> <thead> <tr> <th rowspan="2">Seal</th> <th rowspan="2">Shaft</th> <th colspan="3">Materials</th> </tr> <tr> <th>Stationary ring</th> <th>Rotational ring</th> <th>Elastomer</th> </tr> </thead> <tbody> <tr> <td>STA-12R</td> <td>Ø 12 mm</td> <td>Ceramic</td> <td>Graphite</td> <td>NBR</td> </tr> </tbody> </table>				Seal	Shaft	Materials			Stationary ring	Rotational ring	Elastomer	STA-12R	Ø 12 mm	Ceramic	Graphite	NBR	
Seal	Shaft	Materials																
		Stationary ring	Rotational ring	Elastomer														
STA-12R	Ø 12 mm	Ceramic	Graphite	NBR														
9 LIP SEAL	Ø 12 x Ø 22 x H 6 mm																	
10 BEARINGS	6201 ZZ / 6201 ZZ																	
11 CAPACITOR	<table border="1"> <thead> <tr> <th rowspan="2">Pump</th> <th colspan="2">Capacitance</th> </tr> <tr> <th>(220 V)</th> <th>(110 V or 127 V)</th> </tr> </thead> <tbody> <tr> <td>ZDm 1B-E</td> <td>10 µF - 450 VL</td> <td>16 µF - 250 VL</td> </tr> <tr> <td>ZDm 1A-E</td> <td>12.5 µF - 450 VL</td> <td>30 µF - 250 VL</td> </tr> <tr> <td>ZDm 1AR-E</td> <td>16 µF - 450 VL</td> <td>30 µF - 250 VL</td> </tr> </tbody> </table>				Pump	Capacitance		(220 V)	(110 V or 127 V)	ZDm 1B-E	10 µF - 450 VL	16 µF - 250 VL	ZDm 1A-E	12.5 µF - 450 VL	30 µF - 250 VL	ZDm 1AR-E	16 µF - 450 VL	30 µF - 250 VL
Pump	Capacitance																	
	(220 V)	(110 V or 127 V)																
ZDm 1B-E	10 µF - 450 VL	16 µF - 250 VL																
ZDm 1A-E	12.5 µF - 450 VL	30 µF - 250 VL																
ZDm 1AR-E	16 µF - 450 VL	30 µF - 250 VL																
12 ELECTRIC MOTOR	<p>ZDm: single-phase 220 V - 60 Hz with thermal overload protector incorporated into the winding</p> <ul style="list-style-type: none"> - Insulation: class F - Protection: IP X8 																	
13 POWER CABLE	<p>"H07 RN-F" with Schuko plug Standard length 5 metres</p>																	
14 FLOAT SWITCH	(only for single-phase versions)																	



DIMENSIONS AND WEIGHT



MODEL	PORT DN	DIMENSIONS mm									kg	
		a	b	c	h	h1	d	e	p	∅		
Single-phase												
ZDm 1B-E	1½"	110	81	142	316	77	21	variable	450	450	10.9	
ZDm 1A-E											11.5	
ZDm 1AR-E											11.8	

ABSORPTION

MODEL	VOLTAGE		
	220 V	110 V	127 V
Single-phase			
ZDm 1B-E	2.3 A	4.6 A	4.3 A
ZDm 1A-E	3.4 A	7.5 A	7.2 A
ZDm 1AR-E	4.6 A	9,0 A	8.5 A

PALLETIZATION

MODEL	GROUPAGE	CONTAINER
	n. pumps	n. pumps
Single-phase		
ZDm 1B-E	60	100
ZDm 1A-E	60	100
ZDm 1AR-E	60	100