5DW
Submersible Borehole Pump





Single phase

Application

- For water supply from wells or reservoirs
- For domestic use, for civil and industrial applications
- For garden use and irrigation

Operating conditions

- Maximum fluid temperature up to +40℃
- Maximum sand content: 0.15%
- Maximum immersion: 50 m
- Minimum well diameter: 5"
- Warranty: 2 years

Motor and Pump

- Rewindable motor
- **Single-Phase:** 220 - 240V/50Hz
  ※170-240V wide range of operating voltage, minimum starting voltage 130V
- Capacitance: P2
- Cable length:10 m
- Insulation class: F
- Protection class: IP68
- Float switch: Standard for single-phase, not included for three-phase
- Curve tolerance according to ISO 9906
- Standard: Built-in capacitors
- Optional: External capacitors (with control box)

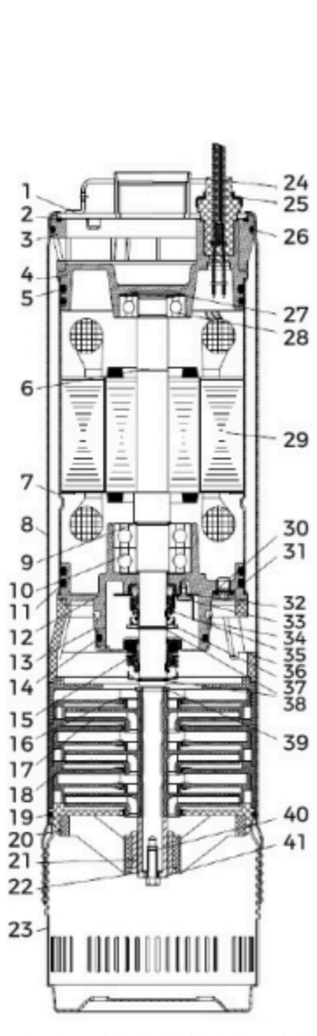
Identification Codes

5 DW m 4 / 3 - 0.55 P

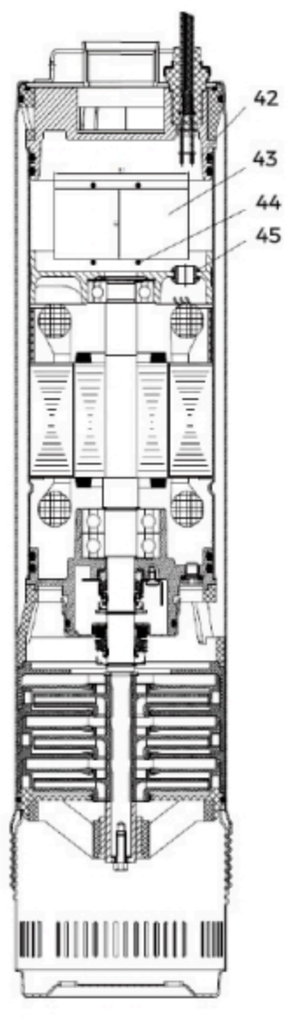
- Plastic Impeller
- Rated Power (KW)
- Impeller Stage
- Rated Flow (m^3/h)
- Single-Phase Motor
- Submersible Borehole Pump
- Min. Well Diameter: 5"

No.	Components	Material
1	Delivery casing	AISI 304
2	O-ring	NBR
3	Upper bearing bracket	PPO
4	Iron bearing seat	HT250
5	O-ring	NBR
6	Rotor	
7	Motor external casing	AISI 201
8	Pump external casing	AISI 304
9	Shaft retaining ring	65Mn
10	Bearing 6204	
11	O-ring	NBR
12	Iron lower bearing seat	HT250
13	Oil cylinder cover	AISI 304
14	O-ring	NBR
15	Mechanical seal	Graphite/Ceramics
16	volute	PPO
17	Impeller	PPO
18	volute	PPO
19	O-ring	NBR
20	Support seat assembly	
21	Rubber bearing	
22	Shaft sleeve	AISI 304
23	Bottom support	AISI 304

No.	Components	Material
24	Cable	
25	Cable clamp	AISI 201
26	O-ring	NBR
27	Corrugated washer	65Mn
28	Bearing 6203	
29	coil	
30	Oil screw	AISI 304
31	O-ring	NBR
32	Static ring clamp	AISI 430
33	Screws	
34	Cylinder baffle	AISI 430
35	Mechanical seal	Graphite/Ceramics
36	Lower bearing bracket	PPO
37	Gasket	AISI 304
38	Shaft retaining ring	65Mn
39	Gasket	AISI 304
40	Outer hexagon bolt	AISI 304
41	Flat pad + Spring pad	AISI 304
42	Barrel top cover	HT250
43	Capacitor	
44	O-ring	NBR
45	Outlet sheath	Rubber

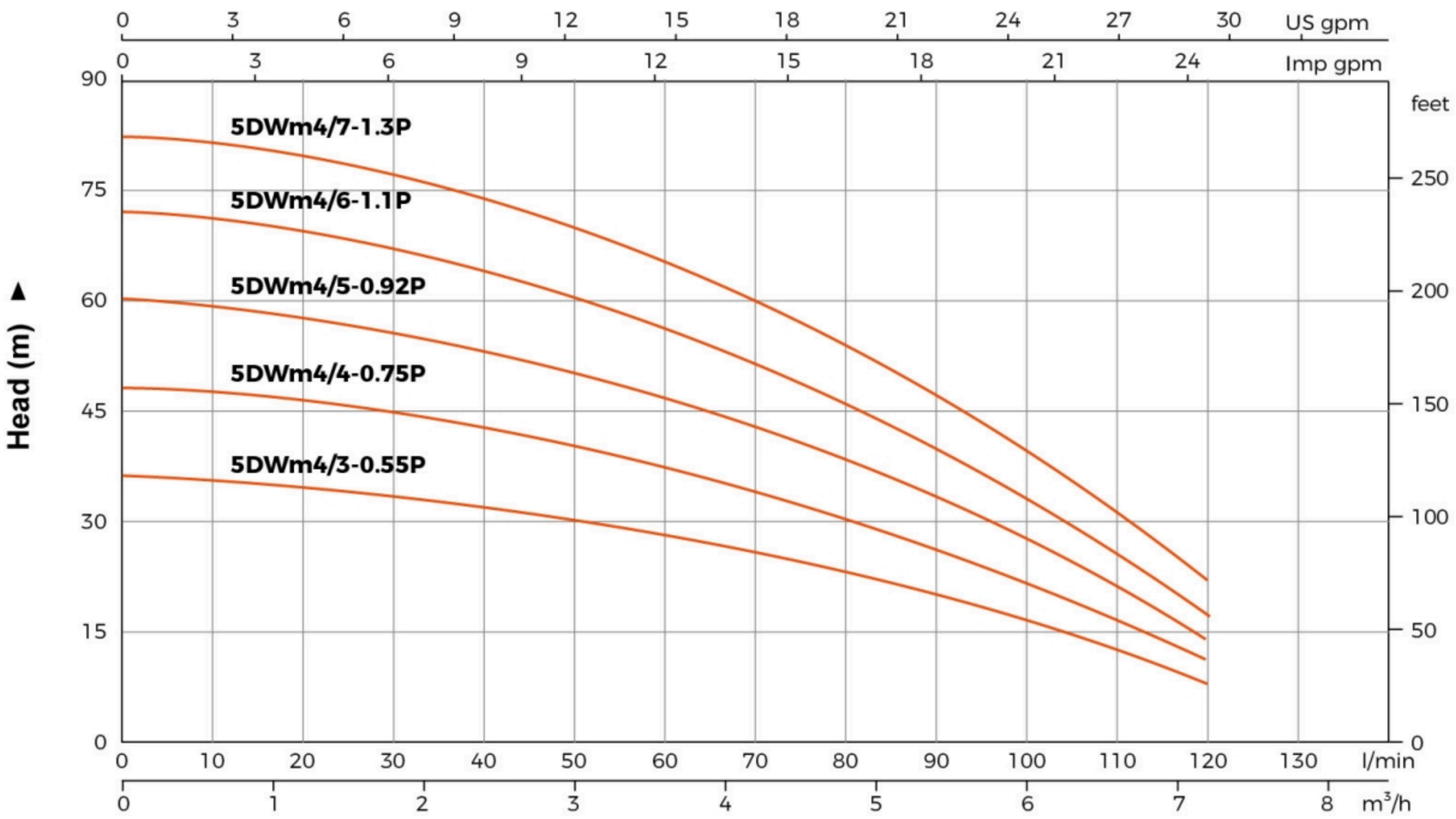


External capacitor



Built-in capacitor

Hydraulic Performance Curves

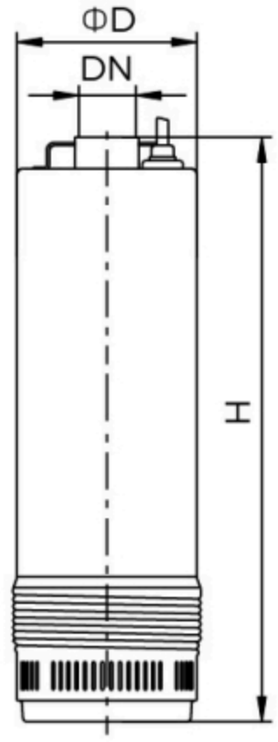


Technical Data

Model	Power		DELIVERY n≈2850 rpm							
	kW	HP	Q(m^3/h)	0	1.2	2.4	3.6	4.8	6	7.2
			Q(l/min)	0	20	40	60	80	100	120
5DWm4/3-0.55P	0.55	0.75	H (m)	36	34	32	28	23	16	8
5DWm4/4-0.75P	0.75	1		48	46	43	37	30	21	11
5DWm4/5-0.92P	0.92	1.25		60	57	53	47	39	28	14
5DWm4/6-1.1P	1.1	1.5		72	68	63	56	46	33	17
5DWm4/7-1.3P	1.3	1.75		82	78	73	65	54	38	21

Dimension

Model	ΦD (mm)	DN	H(mm)	Weight N.W(kg)
5DWm4/3-0.55P	Φ130	1 1/4"	499	13.1
5DWm4/4-0.75P	Φ130	1 1/4"	538	15
5DWm4/5-0.92P	Φ130	1 1/4"	577	17.5
5DWm4/6-1.1P	Φ130	1 1/4"	616	19.5
5DWm4/7-1.3P	Φ130	1 1/4"	655	21.8



5DW
Submersible Borehole Pump



Stainless steel impeller

Application

- For water supply from wells or reservoirs
- For domestic use, for civil and industrial applications
- For garden use and irrigation

Operating Conditions

- Maximum fluid temperature up to +35°C
- Minimum immersion: 100 mm
- Maximum immersion: 20 m
- Minimum well diameter: 5"

Motor and Pump

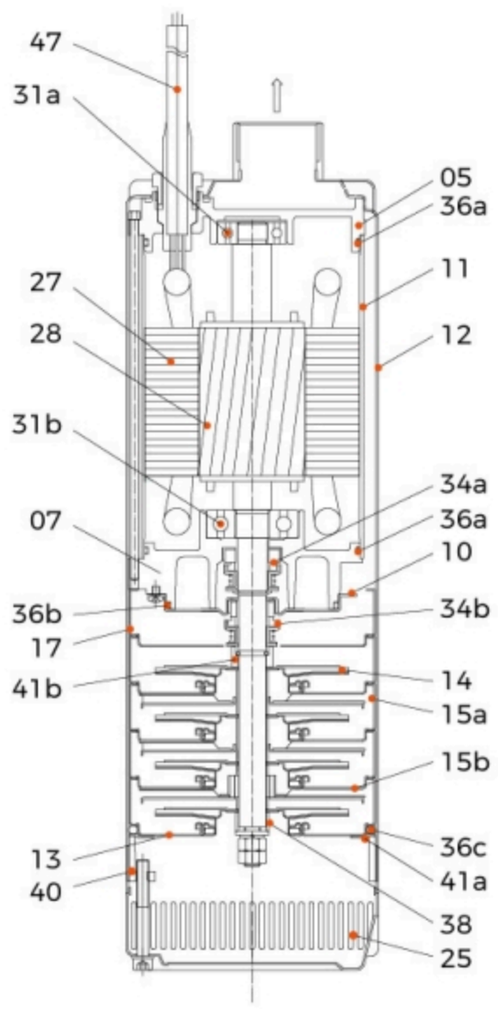
- Rewindable motor
- **Single phase:** 230V±10%/50Hz
- **Three phase:** 230V±10%/50Hz
  400V±10%/50Hz
- Cable length: 10 m
- Insulation class: F
- Protection class: IP68
- Standard: Built-in capacitors
  Optional: External capacitors

Identification Codes

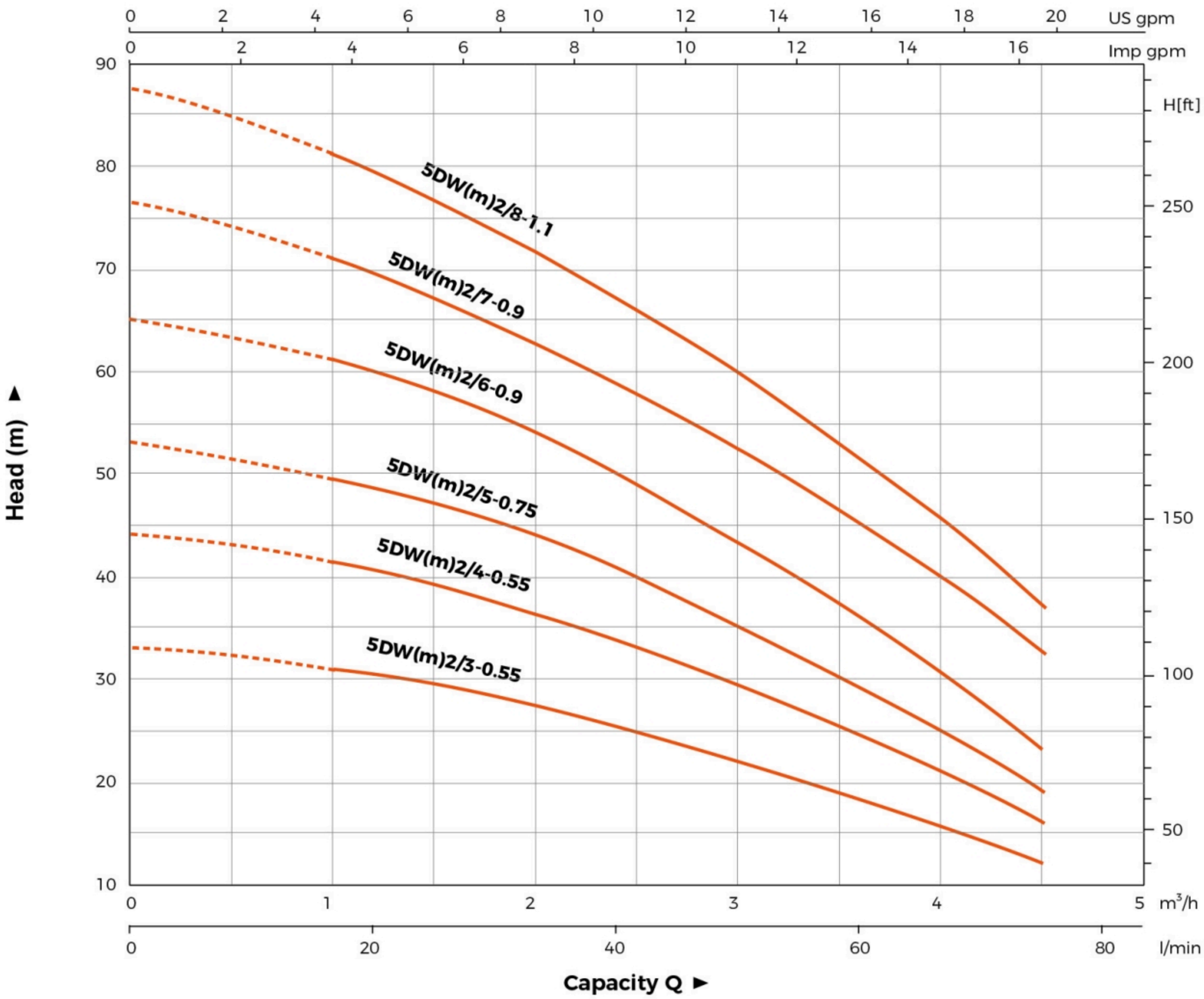
5 DW (m) 2 /3 - 0.55

- Rated Power (kW)
- Impeller Stage
- Rated Flow (m^3/h)
- Single-Phase Motor
- Submersible Borehole Pump
- Min.Well Diameter: 5"

No.	Components	Material
5	Upper cover	Cast Cu (Standard) AISI 304 Optional
7	Bearing house	
10	Seal bracket	AISI 304
11	Motor casing	AISI 304
12	Outer casing	AISI 304
13	Pump casing	AISI 304
14	Impeller	AISI 304
15	Diffuser	AISI 304
17	Suction interconnector	AISI 304
25	Strainer	AISI 304
27	Stator	/
28	Rotor	/
31a,b	Bearing	/
34a	Mechenical Seal	Carbon/Ceramic
34b	Mechenical Seal	Sic/Sic
36a,b,c	O-ring	NBR
38	Shaft sleeve	AISI 304
40	Clamp ring	Cast Cu
41a	Shim	AISI 304
41b	Pressing block	AISI 304
47	Cable	H07RN-F



Hydraulic Performance Curves

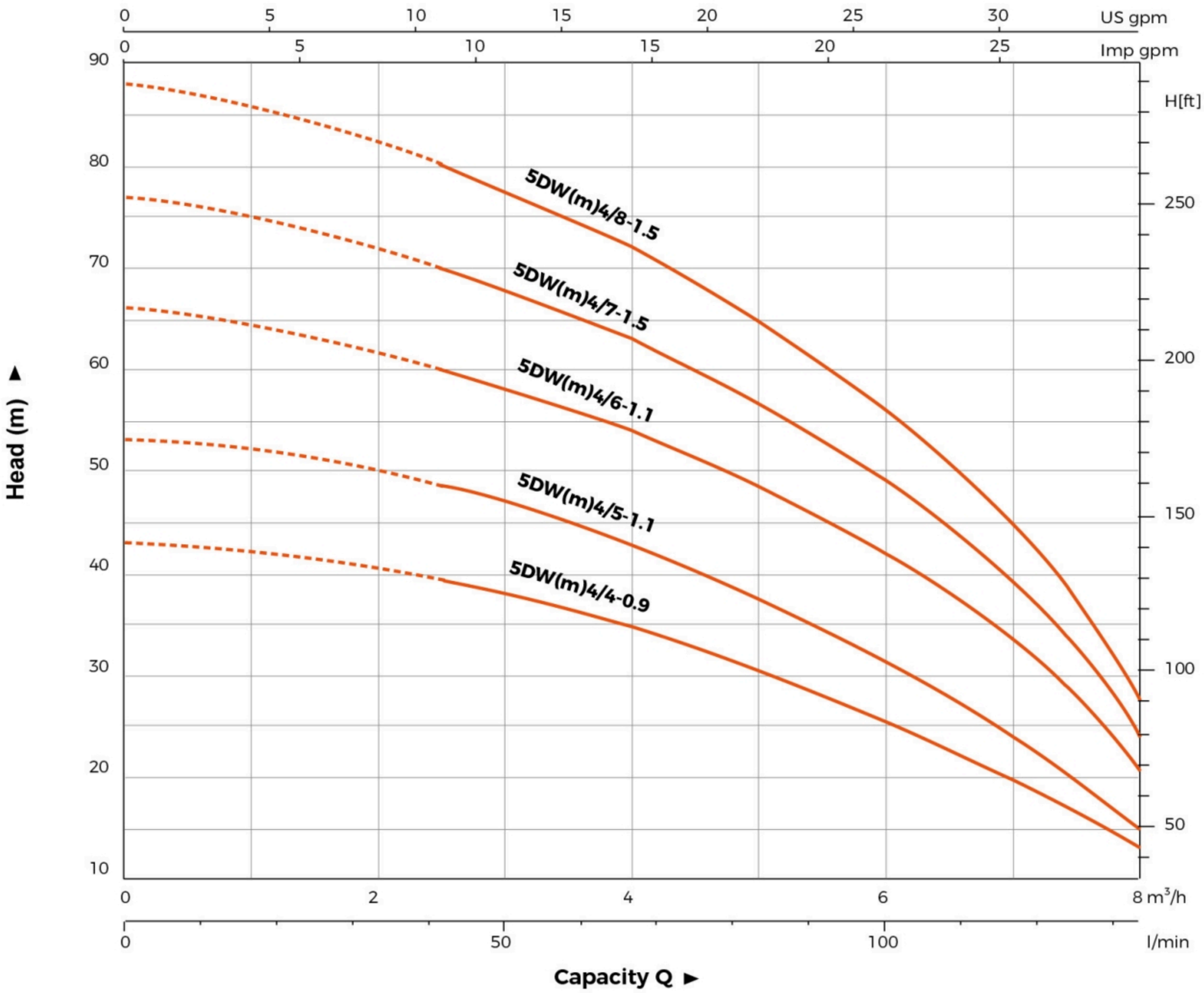


Technical Data

Model			Power		DELIVERY n≈2850 rpm								
1~	3~		kW	HP	Q(m³/h)	0	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5
230V	230V	400V			Q(l/min)	0	16.6	25	33.3	41.6	50	58.3	66.6	75
5DWm2/3-0.55	5DW2/3-0.55		0.55	0.75	H (m)	33	31	29.5	27.5	25	22	19	16	12
5DWm2/4-0.55	5DW2/4-0.55		0.55	0.75		44	41.5	39.5	36.5	33.5	29.5	25.5	21	16
5DWm2/5-0.75	5DW2/5-0.75		0.75	1		53	49.5	47	44	40	35	30	25	19
5DWm2/6-0.9	5DW2/6-0.9		0.9	1.2		65	61	58	54	49	43	37	30.5	23
5DWm2/7-0.9	5DW2/7-0.9		0.9	1.2		76.5	71	67.5	62.5	57.5	52.5	46	40	32.5
5DWm2/8-1.1	5DW2/8-1.1		1.1	1.5		87.5	81	77	71.5	66	60	52.5	46	37

5DW
Submersible Borehole Pump

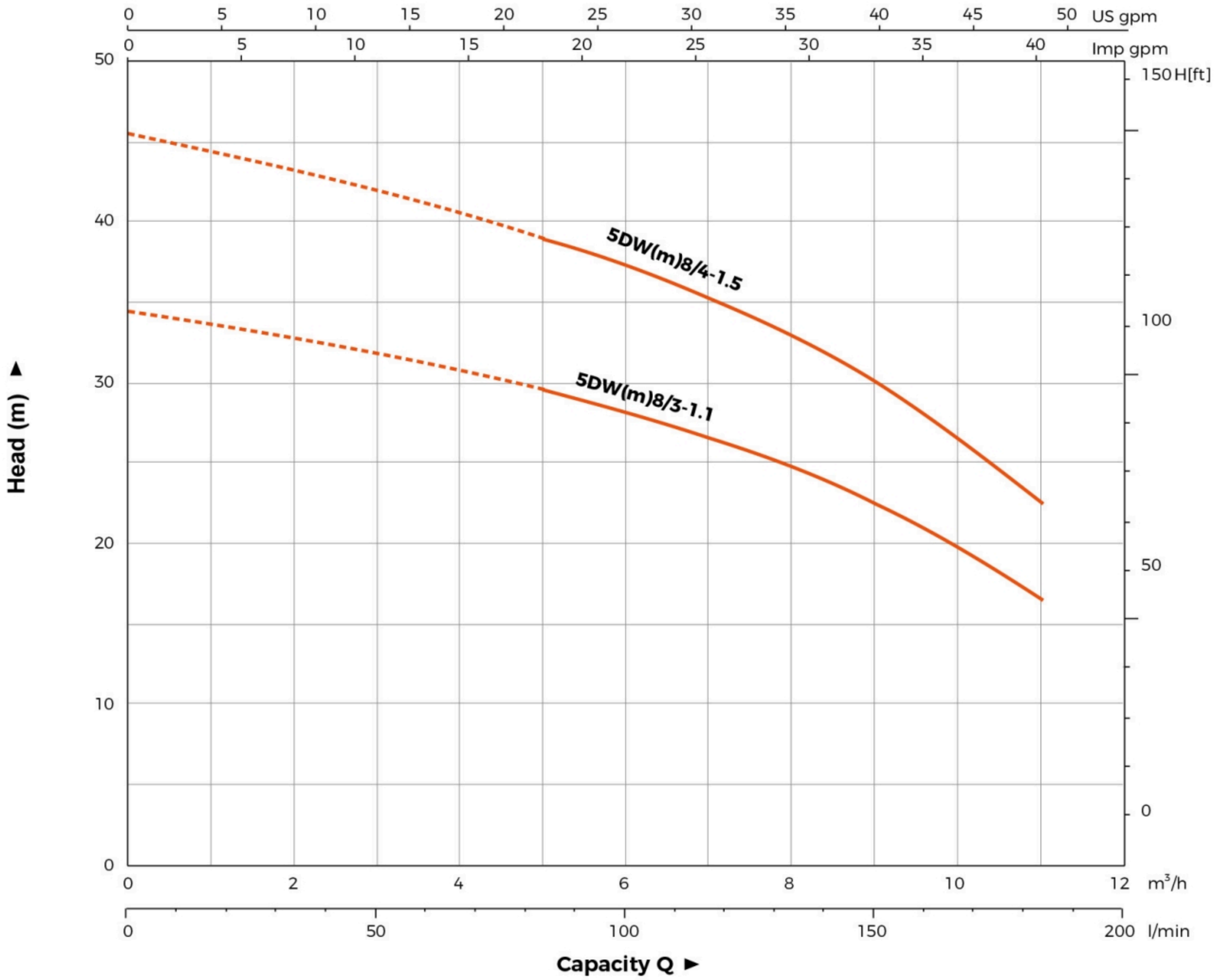
Hydraulic Performance Curves



Technical Data

Model			Power		DELIVERY n≈2850 rpm									
1~	3~		kW	HP	Q(m³/h)	0	2.5	3.0	3.5	4.0	4.5	5.0	6.0	7.0	8.0
230V	230V	400V			Q(l/min)	0	41.6	50	58.3	66.6	75	83.3	100	116	133
5DWm4/4-0.9	5DW4/4-0.9		0.9	1.2	H (m)	43	39	38	36.5	35	33	30	25.5	19.5	13
5DWm4/5-1.1	5DW4/5-1.1		1.1	1.5		53	48	46.5	45	43	40	37.5	32	24	15
5DWm4/6-1.1	5DW4/6-1.1		1.1	1.5		66	60	58	56	54	51.5	49	42	34	20.5
5DWm4/7-1.5	5DW4/7-1.5		1.5	2		77	70	68	65.5	63	60	57	49	39.5	24
5DWm4/8-1.5	5DW4/8-1.5		1.5	2		88	80	77.5	75	72	68.5	65	56	45	27.5

Hydraulic Performance Curves



Technical Data

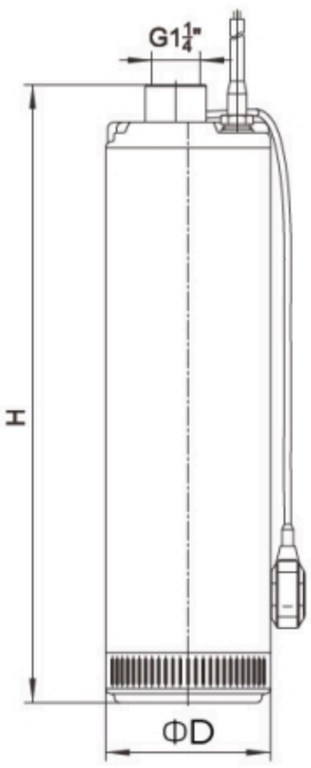
Model			Power		DELIVERY n≈2850 rpm							
1~	3~		kW	HP	Q(m³/h)	0	5	6	7	8	9	10	11
230V	230V	400V			Q(l/min)	0	83.3	100	116	133	150	166	183
5DWm8/3-1.1	5DW8/3-1.1		1.1	1.5	H (m)	34.5	29.5	28	26.5	24.5	22.5	20	16.5
5DWm8/4-1.5	5DW8/4-1.5		1.5	2		45.5	39	37	35	32.5	30	26.5	22.5

5DW
Submersible Borehole Pump

Dimension

Model			ΦD (mm)	DN	Dimension(mm)		Weight(kg)			
1~	3~									
230V	230V	400V			H(s)	H(T)	N.W(s)	N.W(T)	G.W(s)	G.W(T)
5DWm2/3-0.55	5DW2/3-0.55		Φ128	1¼"	409	409	14	12.4	14.8	13
5DWm2/4-0.55	5DW2/4-0.55		Φ128	1¼"	433	433	14.5	12.8	15.4	13.5
5DWm2/5-0.75	5DW2/5-0.75		Φ128	1¼"	481	457	16.8	14.7	17.8	15.4
5DWm2/6-0.9	5DW2/6-0.9		Φ128	1¼"	517	493	18.1	16	19.2	16.8
5DWm2/7-0.9	5DW2/7-0.9		Φ128	1¼"	541	517	18.6	16.5	19.8	17.4
5DWm2/8-1.1	5DW2/8-1.1		Φ128	1¼"	577	553	20	17.8	21.3	18.7
5DWm4/4-0.9	5DW4/4-0.9		Φ128	1¼"	469	445	17	15	18.2	15.7
5DWm4/5-1.1	5DW4/5-1.1		Φ128	1¼"	505	481	18.5	16.3	19.6	17
5DWm4/6-1.1	5DW4/6-1.1		Φ128	1¼"	529	505	19	16.8	20.2	17.6
5DWm4/7-1.5	5DW4/7-1.5		Φ128	1¼"	589	553	22.6	18.9	23.9	19.8
5DWm4/8-1.5	5DW4/8-1.5		Φ128	1¼"	613	577	23.1	19.4	24.5	20.2
5DWm8/3-1.1	5DW8/3-1.1		Φ128	1¼"	475	451	18.5	15.8	19.6	16.5
5DWm8/4-1.5	5DW8/4-1.5		Φ128	1¼"	541	505	21.5	16.6	22.7	17.4

Stainless steel impeller+External capacitors



Model			ΦD (mm)	DN	Dimension(mm)		Weight(kg)			
1~	3~									
230V	230V	400V			H(s)	H(T)	N.W(s)	N.W(T)	G.W(s)	G.W(T)
5DWm2/3-0.55	5DW2/3-0.55		Φ128	1¼"	433	409	13.9	12.6	14.5	13.2
5DWm2/4-0.55	5DW2/4-0.55		Φ128	1¼"	457	433	14.4	13	15.1	13.7
5DWm2/5-0.75	5DW2/5-0.75		Φ128	1¼"	505	457	16.3	14.9	17	15.6
5DWm2/6-0.9	5DW2/6-0.9		Φ128	1¼"	541	493	17.9	16.2	18.7	17
5DWm2/7-0.9	5DW2/7-0.9		Φ128	1¼"	565	517	18.4	16.7	19.3	17.6
5DWm2/8-1.1	5DW2/8-1.1		Φ128	1¼"	601	553	19.7	18	20.6	18.9
5DWm4/4-0.9	5DW4/4-0.9		Φ128	1¼"	493	445	16.8	15.2	17.5	15.9
5DWm4/5-1.1	5DW4/5-1.1		Φ128	1¼"	529	481	18.2	16.5	18.9	17.2
5DWm4/6-1.1	5DW4/6-1.1		Φ128	1¼"	553	505	18.7	17	19.5	17.8
5DWm4/7-1.5	5DW4/7-1.5		Φ128	1¼"	613	553	21.6	19.1	22.5	21
5DWm4/8-1.5	5DW4/8-1.5		Φ128	1¼"	637	577	22.1	19.6	22.9	20.4
5DWm8/3-1.1	5DW8/3-1.1		Φ128	1¼"	499	451	17.7	16	18.5	16.7
5DWm8/4-1.5	5DW8/4-1.5		Φ128	1¼"	565	505	19.3	16.8	20.1	17.6

Stainless steel impeller + Built-in capacitors