

PRIUS D MF

Data Sheet

Multi-Function motor driven diaphragm metering pump

R130922

Motor-driven diaphragm dosing pump, mechanical actuated, PRIUS combines efficiency and chemical resistance to a wide capacity range for an extensive number of applications.

- Multifunction motor pump with inverter
- Working mode: Constant, ppm, %, mlq, pause-work, weekly, mA, pulse, Volt and Batch
- Level control
- Alarms
- Stand-by
- Double position of the electronic unit (standard or rotated mounting)
- PTFE diaphragm
- Aluminium enclosure
- Spring return mechanism
- Manual degassing valve (PVDF and PP pump heads)
- Flow regulation
- Liquid ends available in different sizes and materials
- Double ball check valve
- Tropicalized motors
- MODBUS option



STANDARD MOUNTING



ROTATED MOUNTING

Identification code

CIRCUIT	
MF	Multifunction 230 VAC
M1	Multifunction 115 VAC
MM	Multifunction+Modbus

CUSTOM.
PACKAGING
INTERNAL

MOTOR
COLOR

REDUCTION GEAR (50Hz)

O RING

CAPACITY			
PRIUS D MF		PRIUS D MF AP	
010060	60 l/h @ 10 bar	100004	4 l/h @ 100 bar
010030	30 l/h @ 10 bar	100002	2 l/h @ 100 bar
010024	24 l/h @ 10 bar	1001,5	1,5 l/h @ 100 bar
010012	12 l/h @ 10 bar	050017	17 l/h @ 50 bar
010016	16 l/h @ 10 bar	050009	9 l/h @ 50 bar
010105	105 l/h @ 10 bar	050005	5 l/h @ 50 bar
010056	56 l/h @ 10 bar	05002,5	2,5 l/h @ 50 bar
010042	42 l/h @ 10 bar	030028	28 l/h @ 30 bar
010021	21 l/h @ 10 bar	030015	15 l/h @ 30 bar
007160	160 l/h @ 7 bar	030010	30 l/h @ 10 bar
007086	86 l/h @ 7 bar	030005	5 l/h @ 30 bar
007064	64 l/h @ 7 bar	030076	76 l/h @ 30 bar
007032	32 l/h @ 7 bar	030041	41 l/h @ 30 bar
005240	240 l/h @ 5 bar	030030	30 l/h @ 30 bar
005128	128 l/h @ 5 bar	030015	15 l/h @ 30 bar
005096	96 l/h @ 5 bar	020091	91 l/h @ 20 bar
005048	48 l/h @ 5 bar	020068	68 l/h @ 20 bar
005350	350 l/h @ 5 bar	020034	34 l/h @ 20 bar
005188	188 l/h @ 5 bar		
005140	140 l/h @ 5 bar		
005070	212 l/h @ 5 bar		
005440	440 l/h @ 5 bar		
005236	236 l/h @ 5 bar		
005176	176 l/h @ 5 bar		
005088	088 l/h @ 5 bar		
005530	530 l/h @ 5 bar		
005284	284 l/h @ 5 bar		
005212	212 l/h @ 5 bar		
005106	106 l/h @ 5 bar		
0021000	1000 l/h @ 2 bar		
0051000	1000 l/h @ 5 bar		
004520	520 l/h @ 4 bar		
005390	390 l/h @ 5 bar		
005180	180 l/h @ 5 bar		
003750	750 l/h @ 3 bar		
005380	380 l/h @ 5 bar		
005290	290 l/h @ 5 bar		

UMS PUMP HEAD MATERIAL	
M	SS
U	PVDF
V	PP

NM/TM PUMP HEAD MATERIAL	
K	PVDF
P	PP
S	SS

REDUCTION GEAR (50Hz)	
1	8:1 175 s/min
2	15:1 94 s/min
4	20:1 70 s/min
5	40:1 35 s/min

O RING	
V	FKM B
D	Dutral

BAR
L/H

LUBRICANT TYPE	
BRAND	MODEL
MOBIL	MOBILGEAR 632
SHELL	OMALA OIL 320
BP	ENERGOL GR-XP 320
IP	MELLANA OIL 320
ESSO	SPARTAN EP 320
AGIP	BLASIA 320

P D M F 0 1 0 0 6 0 M V 1 2 0 0 N 0 0 0

“PRIUS D MF” SERIES - SINGLE PHASE SUPPLY

Features

- Aluminium enclosure (epoxy coating)
- Spring return mechanism
- Power supply: 230 VAC (+/-10%) - 50/60 Hz - single-phase
- Consumption 230VAC 2.3Arms 530VA | 115VAC 4.6Arms 530VA
- Environment temperature: -10-40°C (14-104°F)
- Chemical temperature with PVDF pump head: -10-65°C (14-149°F)*
- Chemical temperature with SS pump head: -10-90°C (14-194°F)*
- Chemical temperature with PP pump head: -10-40°C (14-104°F)
- Installation class II
- Pollution level 2
- Audible noise.....78 dbA (± 5 dB)
- Protection degree IP 55
- Max suction height 3 m
- Oil capacity.....0,3 lt (Refer to “Lubricant type” table)

High pressure ranges available (SS pump head).

* The specified temperature can be exceeded temporarily (max 15') for sterilization or flushing with hot water.



PVDF PUMP HEAD



SS PUMP HEAD



PP PUMP HEAD

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PRIUS D MF										
PRIUS D MF	Pressure bar	Capacity l/h	Stroke length	stroke/1'	Motor	HOSE CONNECTION			PUMP HEAD Model	ACCESSORIES
						PVDF	SS	PP		
010060	10	60	3 mm	175	0,37 kW	1/2" 13 mm (i.d.)	R1/2" G1/2"	1/2" 13 mm (i.d.)	NM	A
010030		30		94						
010024		24		70						
010012		12		35						
010016	10	16	4 mm	35	0,37 kW	1/2" 13 mm (i.d.)	R1/2" G1/2"	1/2" 13 mm (i.d.)	NM	A
010105	10	105	3 mm	175	0,37 kW	3/4" 13 mm (i.d.)	R3/4" G3/4"	3/4" 13 mm (i.d.)	TM	A
010056		56		94						
010042		42		70						
010021		21		35						
007160	7	160	4 mm	175	0,37 kW	3/4" 13 mm (i.d.)	R3/4" G3/4"	3/4" 13 mm (i.d.)	TM	A
007086		86		94						
007064		64		70						
007032		32		35						
005240	5	240	6 mm	175	0,37 kW	3/4" 18 mm (i.d.)	R3/4" G3/4"	3/4" 18 mm (i.d.)	UM	B
005128		128		94						
005096		96		70						
005048		48		35						
005350	5	350	4 mm	175	0,37 kW	G1-1/2" 30 mm (i.d.)	R1"	G1-1/2" 30 mm (i.d.)	UM	C
005188		188		94						
005140		140		70						
005070		70		35						
005440	5	440	5 mm	175	0,37 kW	G1-1/2" 30 mm (i.d.)	R1"	G1-1/2" 30 mm (i.d.)	UM	C
005236		236		94						
005176		176		70						
005088		88		35						
005530	5	530	6 mm	175	0,37 kW	G1-1/2" 30 mm (i.d.)	R1"	G1-1/2" 30 mm (i.d.)	UM	C
005284		284		94						
005212		212		70						
005106		106		35						
0051000	5	1000	10 mm	175	0,55 kW	G1-1/2" 30 mm (i.d.)	R1"	G1-1/2" 30 mm (i.d.)	UM	C
0021000	2	1000		94						
004520	4	520		70						
005390	5	390		35						
005180	180	35								
003750	3	750	8 mm	175	0,37 kW	G1-1/2" 30 mm (i.d.)	R1"	G1-1/2" 30 mm (i.d.)	UM	C
005380	5	380		94						
005290		290		70						
005140		140		35						

ACCESSORIES

A. INSTALLATION KIT INCLUDED

- 1/2" foot filter with 13 mm (int diam.) hose fitting
- 3/4" injection valve
- 13 x16 PVDF or 12 X 18 PVC delivery hose
- 13 x16 PVDF or 12 X 18 PVC suction hose

B. INSTALLATION KIT (OPTION)

- 1 1/2" foot filter with 18 mm (int diam.) hose fitting (G1 1/2 - 18 mm)
- 1 1/2" injection valve

C. INSTALLATION KIT (OPTION)

- 1 1/2" foot filter with 30 mm (int diam.) hose fitting (G1 1/2 - 30 mm)
- 1 1/2" injection valve

Stainless Steel pump does not fit installation kit

Packaging of all models always includes:

- LEVEL PROBE
- INPUT / STANDBY CABLE
- ALARM CABLE

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PRIUS D MF - HIGH PRESSURE

PRIUS D MF AP / HIGH PRESSURE							
PRIUS D MF AP	Pressure bar	Capacity l/h	Stroke length	stroke/1'	Motor	HOSE CONNECTION	PUMP HEAD
						SS	Model
100004	100	4	1.5 mm	175	0,37 kW	3/8"	L1
100002		2		94			
1001,5		1,5		70			
050017	50	17	2 mm	175	0,37 kW	1/2"	M1
050009		9		94			
050005		5		70			
05002,5		2,5		35			
030028	30	28	2 mm	175	0,37 kW	1/2"	N
030015		15		94			
030010		10		70			
030005		5		35			
030076	30	76	4 mm	175	0,37 kW	1/2"	S
030041		41		94			
030030		30		70			
030015		15		35			
020091	20	91	6 mm	94	0,37 kW	3/4"	T
020068		68		70			
020034		34		35			

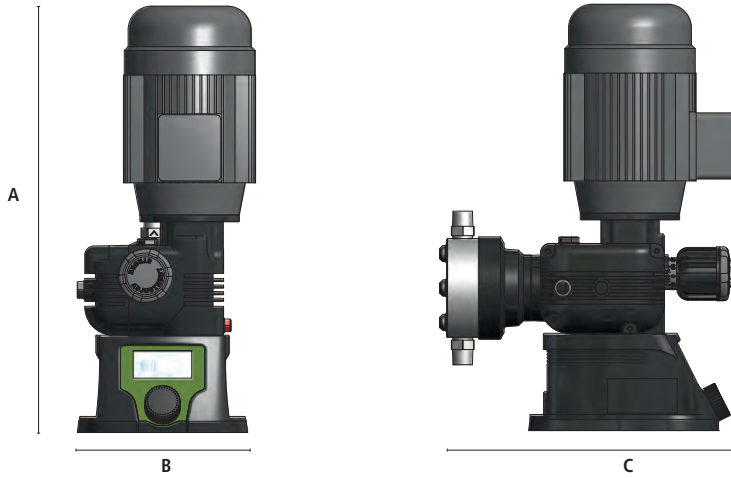
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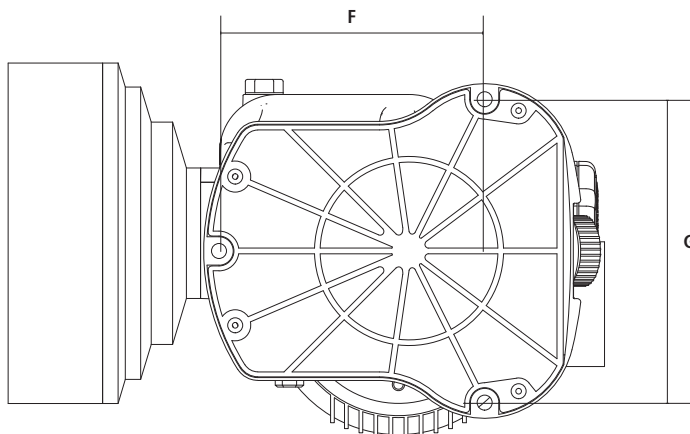
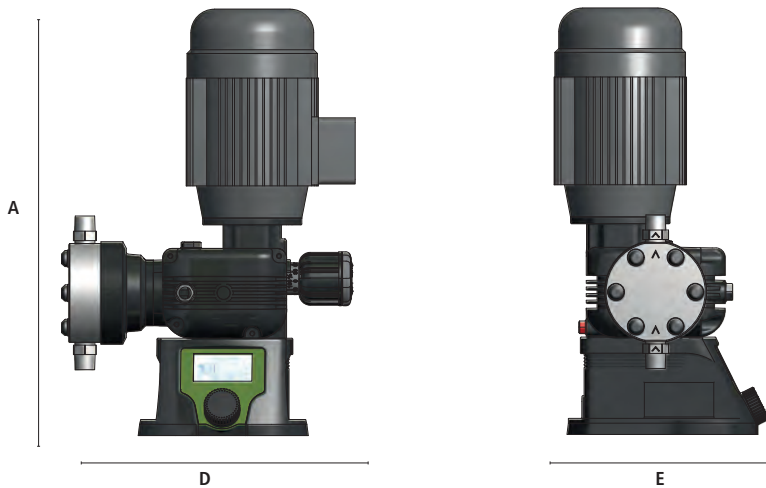
Dimensions

WEIGHTS AND DIMENSIONS ARE REFERRED TO MOTOR PUMPS WITH UM PUMP HEAD MOD.

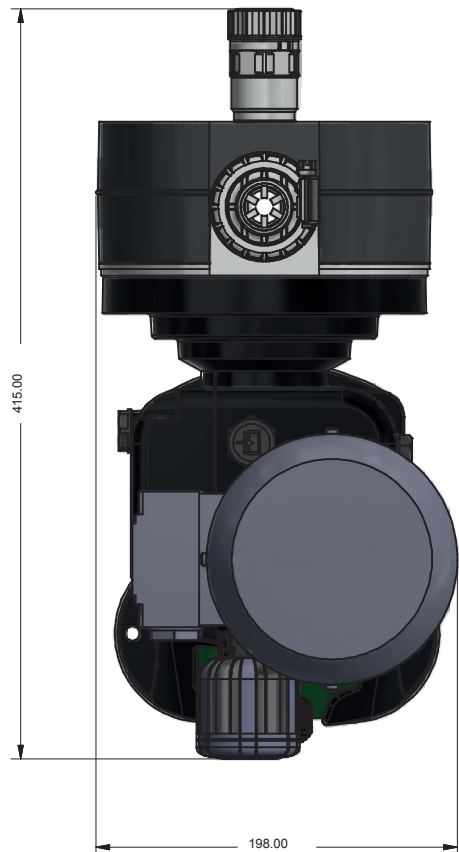
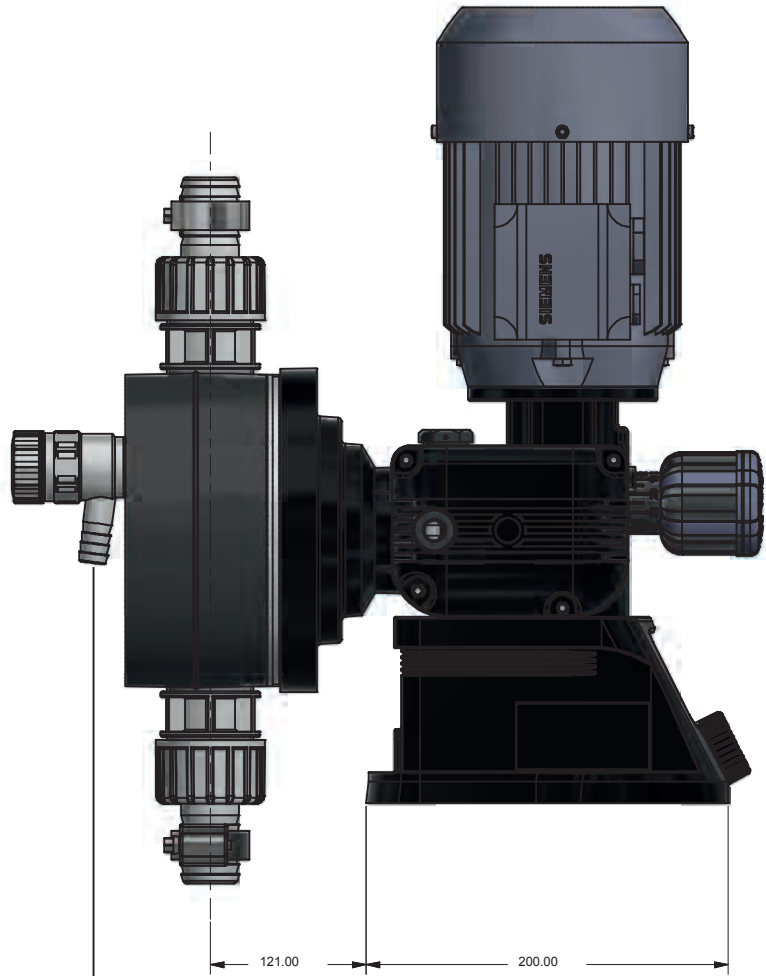
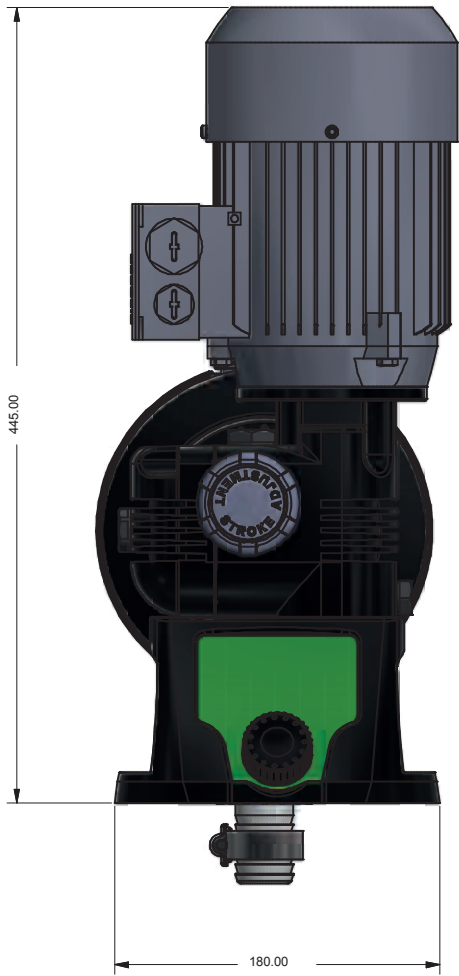


DIMENSIONS (mm)	
	UM pump (PP)
A	440 (0,37 kW) , 540 (0,55 kW)
B	200
C	340
D	340
E	200
F	140
G	160
∅ fixing hole	8

WEIGHT (kg)	
with PP pump head	16
with SS pump head	25



DIMENSIONS (MM) PRIUS WITH UMS PUMP HEAD (0,37KW)



WARNING: AUTOMATIC PURGE VALVE FOR HIGH PRESSURE. CONNECT THE EXHAUST PIPE 16X22 PVC AND INSERT THE OTHER END IN THE TANK OF THE PRODUCT TO BE DOSED. THE EXHAUST PIPE MUST BE FIXED AND NOT LEFT FREE TO MOVE.