MARO

PRODUCT OVERVIEW







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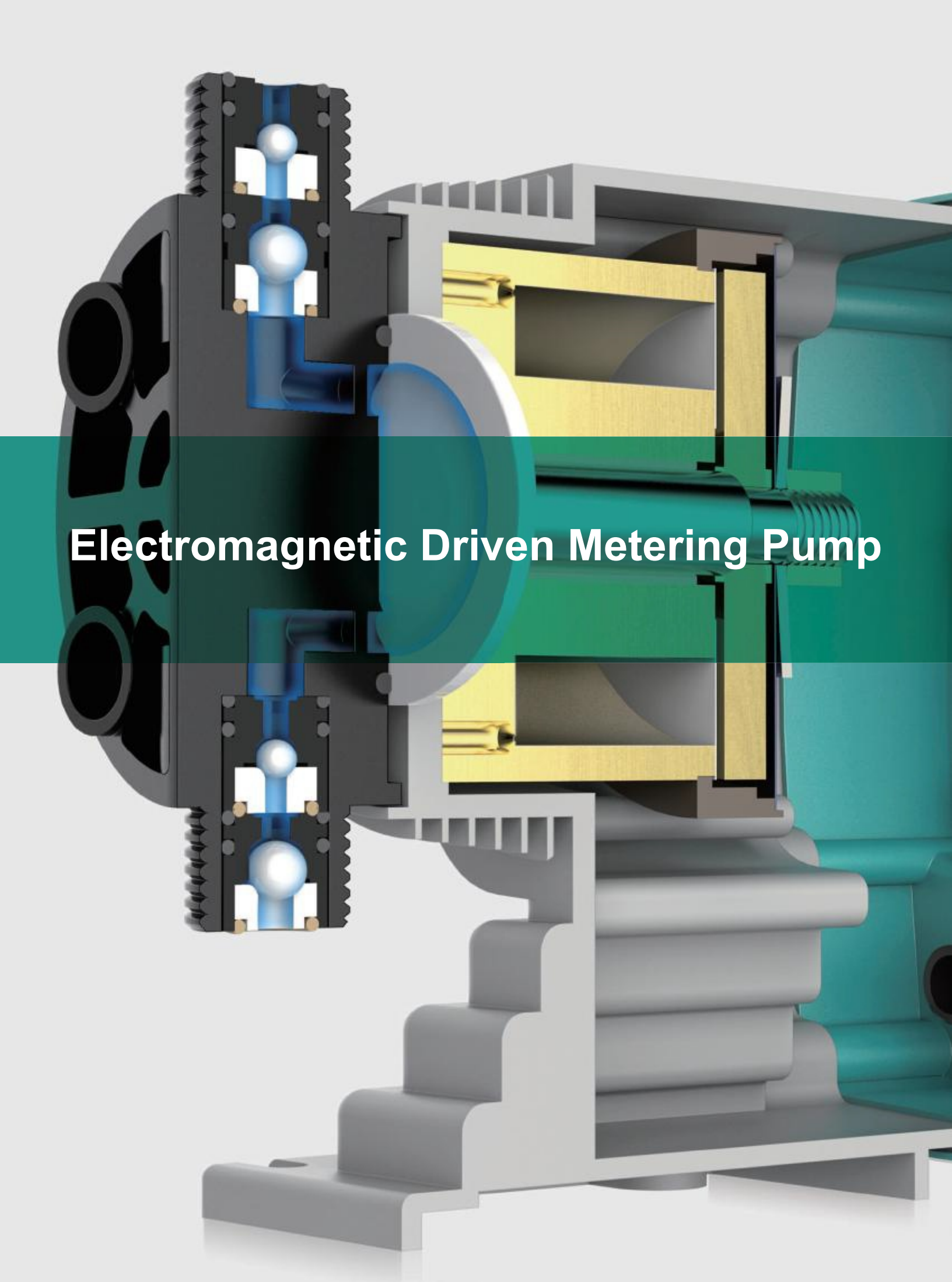
up to 7 bar, up to 18 L/h

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Flow meter pH meter O RP Conductivity



Electromagnetic Driven Metering Pump

Advantages and Features

01

High Efficiency

Accurate dosing,compact design: Benefiting from our independent circuit R&D ability and excellent electromagnetic design experiences, the pump realizes the output capacity the same as that of similar products by lower power and smaller volume to cut cost, and it's high efficiency.

02

Excellent Compact Structure

Adopt space technology to reinforce the strong corrosion resistance: Valve seat, made of PTFE material, has better overall tolerance of liquid contact part, not only guarantees the leakproofness but also protects the rubber ring valve seat against expansion and corrosion after longtime use, or the tightness would decrease and inaccurate dosing may be caused.

03

Optimized Pump Head Structure



Pump head, made of high modified material, full chemical compatibility: As verified in practice, the internal structure of pump head effectively avoids flash gas and cavitation inside pump head, meanwhile, optimizes the procedure of liquid flow, and drops the ultra-large shear force on liquid to maintain the conveying capacity and improve the overall efficiency of pump.

04

Ultra-low Maintenance Cost

Full pure PTFE diaphragm, five-year warranty: Diaphragm is made of full pure PTFE, with superexcellent tolerance and long service life, which will sharply cut the maintenance cost of product. Moreover, we provide five-year lifetime warranty for the diaphragm of dosing pump.

05

Idling to be Allowed

Unique idling capacity: With improved full pure PTFE diaphragm, the dosing pump can still work safely without damage upon diaphragm after quite a long time once the chemical liquid in dosing barrel is used out,and without timely feed or any misoperation occurs.



100% PTFE Diaphragm

06

Simplify Operation

Simple and visual digital display mode and clear parameter setting save time and cut cost, and guarantee the perfect connection of control process.



07

Convenient to Manage Stocking

Uniform valve group, made up of universal size one-way valves, reduces the confusion among parts and components.

08

Customizable Service

Reasonable and flexible internal design makes customization realizable. We can provide solutions for you according to user demand and special working conditions to avoid the embarrassing modification of process design upon the unsuitability of product. We stick to the principle of providing clients with more professional and quicker support all the time. Through the experience and accumulation in the past years, we have comprehended both pumps and the water treatment industry more profoundly. Our strong technical team can provide individualized products or compact dosing system centering on dosing pump for your production process according to your particular requirements.

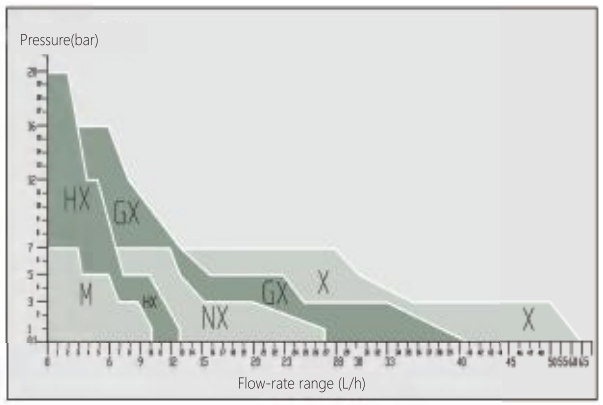
Model Code

Code：

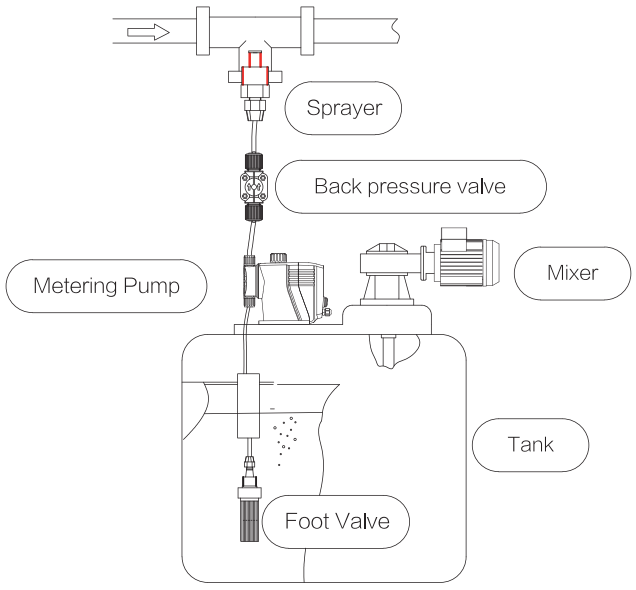
DFD 02 07 M PPV A

Control Version	DFD---Manual Operation DM----Manual & Current Signal (4-20mA) DP----Manual & Pulse Operation DC----Manual & RS485 Communication Protocol					
Capacity	L/h					
Pressure	Mpa					
Model	M/NX/LM/GX/L/X					
Dosing Head Material		Pump Head	Diaph-ragm	Valve Seat	Valve Ball	Seal Ring
	PPV----	PP	PTFE	PTFE	Ceramic	FKM
	PVT----	PVC	PTFE	PTFE	Ceramic	FKM
	PTF----	PTFE	PTFE	PTFE	Ceramic	--
	SST----	SS316	PTFE	SS316	SS316	FKM
Electric Power Supply	A------1ph 220V 50/60Hz B------1ph 110V 50/60Hz C------Special requirements, otherwise noted					

Flow rate-pressure range diagragm



Typical Installation Diagram



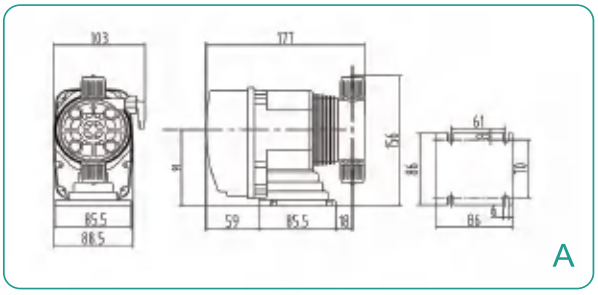
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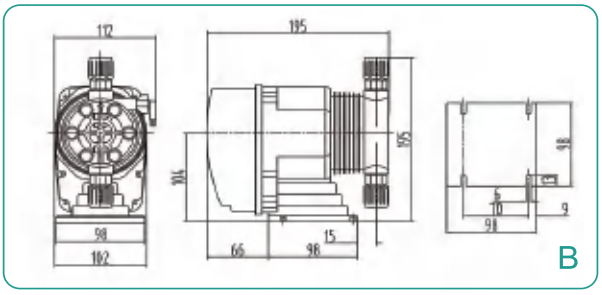
Pump Series

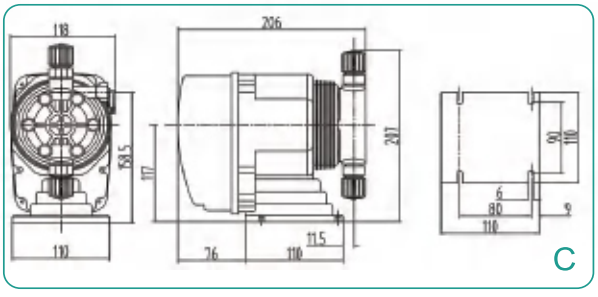
DFD	Manual operation
DP	Pulse signal input,can be connected with ARK flow meter.
DM	4-20mA current signal input, can be connected with ARK pH, ORP, Conductivity Meter.
DC	RS485 communication protocol, can be connected with computer.

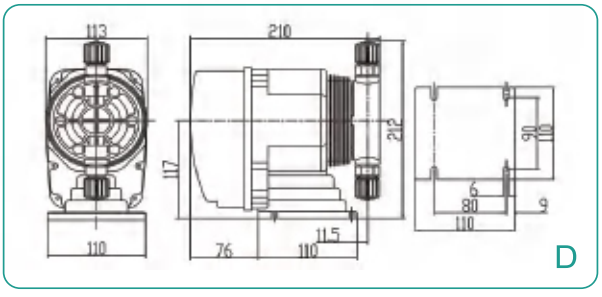
Series & Model				Size	Flow Rate L/h	Pressure bar	Stroke Capacity ml/stroke	Stroke Number stroke/min	Tube Size mm	Consumption W	Power Supply	Dimension	Weight kg	Carton Size cm
DFD	–	–	–	M	1	7	0.14	120	4*6	30	110V 50/60Hz 220V 50/60Hz	A	2.3	26x15x28
					2	7	0.28							
					3	7	0.42							
					6	5	0.56	180		40				
					9	3	0.83							
–	DP –LM	DM –LM	DC –L	LM, L	1	7	0.14	120		30		LM: Size B L: Size C	LM: 3.2 L: 3.8	
					2	7	0.28							
					3	7	0.42							
					6	5	0.71	140		40				
					9	3	0.94	160						
DFD	DP	DM	–	NX	4	12	0.56	120		40	220V 50Hz	B	3.2	
					5/6	10/8	0.69/0.83							
					9	7	0.94	160						
					12	7	1.25							
					15	4	1.25	200						
					20	3	1.67							
					25	2	2.08		6*9					
			DC	GX	3	20	0.31	160	4*6	60	220V 50/60Hz	C	4	
					6	16	0.5	200						
					10	10	0.83							
					20	6	1.67							
					23	5	1.92		6*9					
					33	3	2.75						4.5	
					55	0.1	3.82	240						
				X	2	16	0.28	120	4*6	65	110V 50/60Hz 220V 50/60Hz		3.8	
					6	7	0.56							
					9	7	0.83							
					12	7	1.67							
					15	3	2.08							
					20	3	2.08	160						
					30	3	3.13		6*9		220V 50/60Hz	D	4.5	
					50	2	3.47	240						

Installation Dimension Drawing









Installation Fittings

1.Standard fittings



2m PVC inlet pipe



1.5m PE outlet pipe



Injctor



Filter



Three–piece connection

2. Other optional accessories



Nonadjustable back pressure valve



Adjustable back pressure valve



Connector for DN15



High viscosity valves



Diaphragm



VR Series—Manual Operation

- Manual operation
- Frequency numbers (1-maximum)
- Liquid level switch or time relay interface is optional.

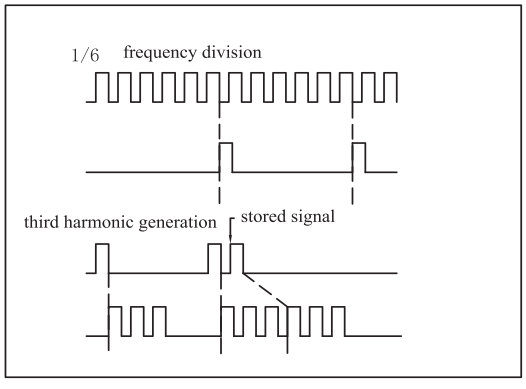
DP Series——Pulse signal

- Manual operation
- Dosing proportionally via external pulse signal.
- Division mode: the frequency division mode is used when input impulse frequency is bigger than maximum working frequency of the dosing pump.
- Multiplication mode: the frequency multiplication mode is used when input impulse frequencyis smaller than maximum working frequency of the dosing pump.



Pulse signal control:

1. The impulse signals (square wave or dry contact signals) that any instruments directly sends out can be received.
2. DP pump has both manual control and automatic controlmode. In manual mode, stroke frequency of the pump can be adjusted by means of a control button, no matter whether the pump is running or in stop state.
3. In automatic mode, two control modes can be set, named frequency division control and frequency multiplication control.
4. In the frequency division mode, when input impulse number is larger than maximum working frequency, the pump should be set as the frequency division mode. According to user's set, the pump identifies and receive the impulse signal, then dose chemicals in proportion.
5. In the frequency multiplication mode, when input impulse number is far less than maximum working frequency of the pump, the pump should be set as the frequency multiplication mode and the pump identify and receive the impulse signal, then dose chemicals in proportion depending on user's set. But when the received impulse interval is less than the interval time of the corresponding pump output, the signal received later will be stored (the pump could still work even though no signal received at this moment), the pump will not stop until it is consumed completely.



Division and Multiplication mode

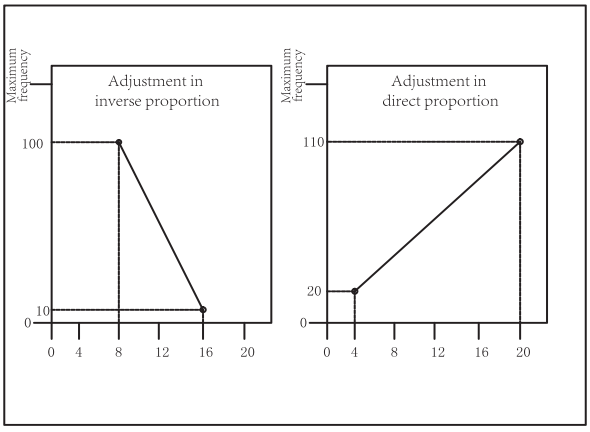
DM Series——4-20 mA Signal



- Manual and 4-20mA signal remote control mode.
- Flow rate can be adjusted Proportional or inverse proportional according to the current signal.
- Proportional adjustment: set when the input signal is 4mA, the stroke number set as A, when the input signal is 20mA, the stroke number set as B, A<B.
- Inverse proportional adjustment: set when the input signal is 4mA, the stroke number set as A, when the input signal is 20mA, the stroke number set as B, A > B.
- Liquid level switch interface is optional.

Current Signal Control (4-20mA):

1. Analog signal can be directly input into the dosing pump, without need of an extra control instrument.
2. DM pump has both manual control and automatic control modes. In manual mode, stroke frequency of the pump can be adjusted by means of a control button, no matter whether the pump is running or in stop state.
3. Set two points and theirs corresponding frequency within 4-20mA, so as to control dosage.
4. The mode could be set in direct and inverse proportions adjustment. The direct proportion means impulse frequency of a pump increases with increase of current signal; adjustment in inverse proportion: impulse frequency of a pump increases with decrease of current signal.



Division and Multiplication mode

DC Series——RS485 Communication Protocol

- Manual and RS485 communication protocol control mode.
- The communication with the upper computer can be achieved; online start and stop and control can be achieved; the pump issuitable for the high-automation production process undercen-tralized control.
- A controller equipped with touch screen can be provided that asimple control system can control at most 128 DC dosing pumpssimultaneously, to achieve quick and simple control, without need ofcomplicated control instruments;state parame-ter of dosing pump isvisually displayed;
- Liquid level switch interface is optional.





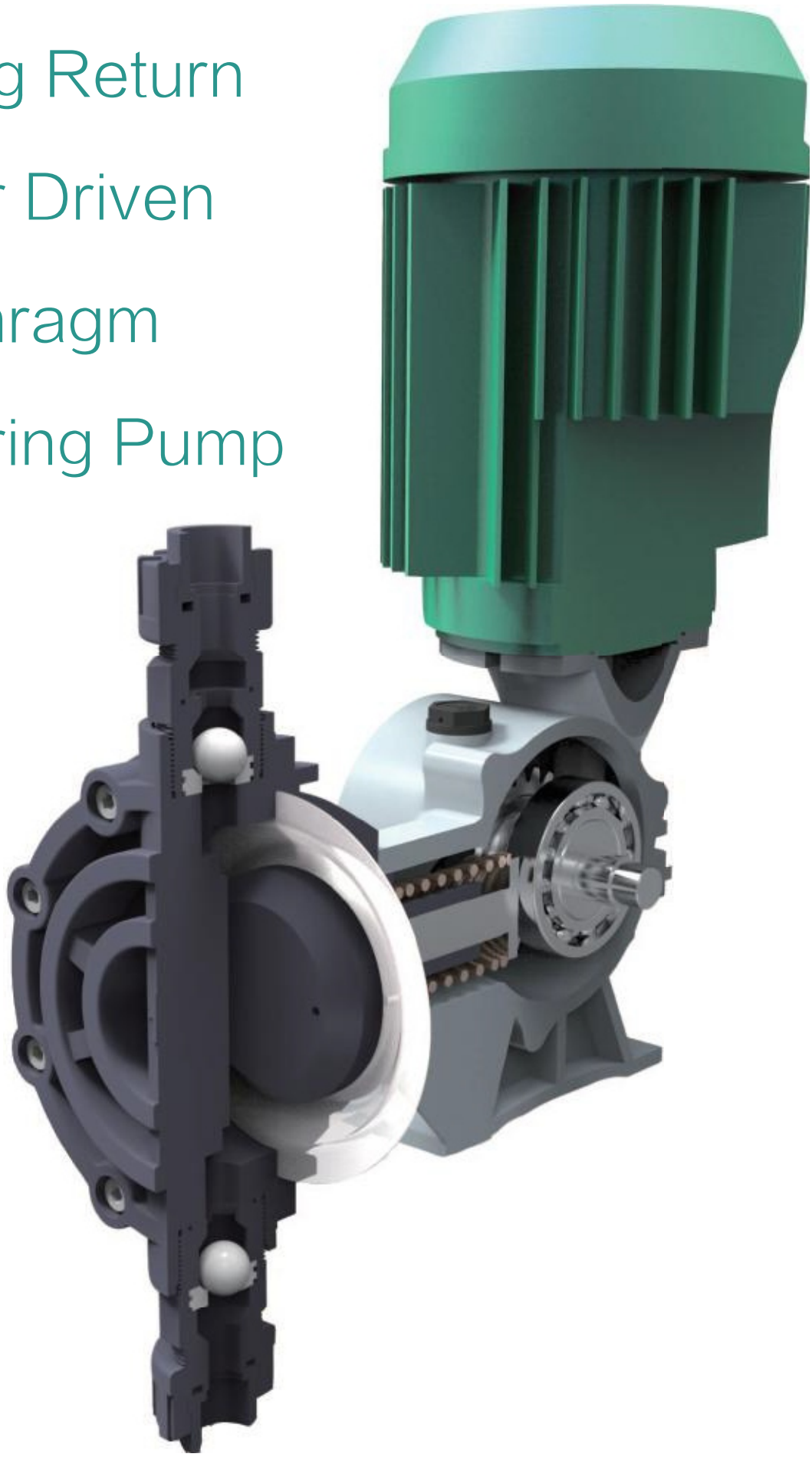


DC Pumps Application Case

Batch control of DC pumps

1. Nice and decent look, easy to monitor
   Display screen replaces former old enclosure, bringing full feel of technology. Both working state and stroke frequency of pumps are easy to monitor.
2. Space saving, convenient installation
   The size of control unit is minimized. Only need to make holes in the enclosure of equipment and put the screen in, so the equipment installation is quick and easy.
   Simple operation, quick control
3. Pump start/stop and stroke frequency can be controlled by touch screen instead of adjusting by one side of pump, and the control response is quick and accurate.

Spring Return Motor Driven Diaphragm Metering Pump



Ultra-strong Anticorrosive Multifunctional Check Valve



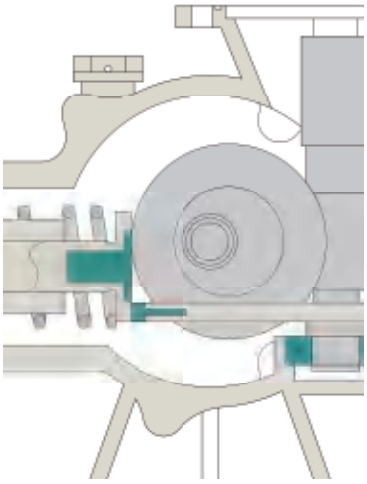
Check Valve Function: Overcome the leak defect caused by the small pressure difference between gravity check valve system and pump head cavity.
Delivery High Viscosity Liquid: Check valves adopt spring return technology, so the dosing pump can maintain its displacement and linearity better when delivering high viscosity liquid.
Back Pressure Ability: The coefficient of elasticity of elastic part can be properly adjusted according to customer's requirements so that the dosing pump outlet has different back pressure values.
Safety Valve function: The coefficient of elasticity of elastic element can be properly adjusted according to pipeline system pressure to realize the safety valve function needed by the pipeline system.
Anticorrosive ElasticPart: Check valves adopt PTFE elastic components, so as to realize the optimal anticorrosive function.

Up to 3MPa(435psi) 100% PTFE Diaphragm

Excellent Diaphragm Assembly
The diaphragm, which is made of high quality modified PTFE material, and, work together with the matched protection assembly,greatly increase the lift of motor driven diaphragm dosing pump.
The maximum lift is up to 3.0Mpa. Thus some hydraulic diaphragm pumps would be replaced by this pump, thereby saving cost.



Spring Return Quiet and Steady



With damping stroke sliding bar, all motor pumps not only reserve the advantages of traditional spring return dosing pumps including simple structure, low failure rate and easy to maintain, but also overcome their fatal shortcomings including large pipe shock, large mechanical vibration, part damage, poor flow linearity and high noise brought by ineffective eccentric travel.

Lightweight Design

Advanced lightweight structure: For energy saving and emission reduction, the pumps adopt many high specific strength materials and smart structural design, so the pumps have very high power–displacement ratio.



Intelligent Stroke Adjuster

End the Age of Variable Frequency

Remote Control Electric Stroke Adjuster: It can receive analog signal (4–20mA) to change the stroke length of dosing pump in real time, further, accurately modify the displacement of dosing pump. The adjuster overcomes all major defects of modifying the capacity of dosing pump by variable frequency speed control.



Manual Control Electric Stroke Adjuster: The stroke length of dosing pump can be accurately set and displayed via the operation panel of the adjuster. With error compensation function, the adjuster overcomes the error between actual displacement and its set value directly caused by the random change of stroke length of dosing pump, because traditional knob adjuster doesn't have the self-lock function.

Model Code



Code	Example
Model	NDJS NDJL NDWS NDWL ND1000 ND2000 HND
Capacity	L/H
Pressure	MPa

Dosing Head Material	Pump Head	Diaphragm	Valve Seat	Valve Ball	Seal Ring
PVT----	PVC	PTFE	PTFE	Ceramic	FKM
PVDF---	PVDF	PTFE	PTFE	Ceramic	FKM
SST----	SS316	PTFE	SS316	SS316	FKM
PTF----	PTFE	PTFE	PTFE	Ceramic	---

Electric power Supply	A-------	3ph 380V 50Hz/60Hz
	VF----	Variable Frequecncy Motor
	EX----	Explosion-proof Motor Exd II BT4
	B-------	1ph 220v 50Hz/60Hz
	C-------	Special requirements, otherwise noted
Control Version	H------	Manual
	I-------	Electric stroke adjuster

*Example

1. Maximum lift is 6kg,Capacity is 370L/h,380V 50Hz, PVC pump head, 3PH 380V 50Hz, adjustment mode: electric stroke adjustment.
   Selected model:
   NDWL-410/0.6-PVT-A-I
2. Maximum lift is 6kg,Capacity is 370L/h,380V 50Hz, PVDF pump head, 3PH 380V 50Hz variable frequency motor adjustment mode: manual.
   Selected model:
   NDWL-410/0.6-PVDF -AVF-H

NDJ

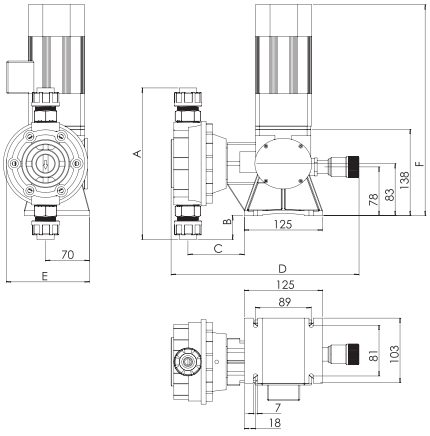
1.Eccentric shaft is supported by bearings in front and rear and the cantilever shaft structure of the most of manufacturers on the market is abandoned; the speed reducing motor does not bear axial force and only transmits torque, and this extends the service life of speed reducing motor and makes the process more stable.
2.Installation and maintenance are simple and convenient; grease is used for lubrication in the box body and grease is added conveniently, making maintenance easy.
3.Stroke length can be adjusted at will during running.
4.PVC, PVDF, PTFE and SS316 materials pump head are applicable to dose different kinds of chemical liquid.
5.The pure PTFE diaphragm that has a super-long service life guarantees the stability and safety of dosing.
6.It can be directly installed on a dosing barrel and this is economical and convenient.



Technical Specifications

Model		Capacity L/h		Max.Pressure Bar		Stroke Length (mm)	Diaphragm Diameter (mm)	Pump Speed (SPM)		Single-stroke Flow (ml/stroke)	Motor Power (W)
		50hz	60hz	50hz	60hz			50hz	60hz		
NDJS-	40/1.0	40	48	10	8	5	90	87	104	9.7	60
NDJS-	60/0.5	60	72	5	4	5	90	104	125	9.7	60
NDJS-	75/0.5	75	90	5	4	5	90	130	156	9.7	60
NDJS-	100/0.5	100	120	5	4	8	90	104	125	16.5	60
NDJS-	130/0.5	130	156	5	4	8	90	130	156	16.5	60
NDJS-	150/0.3	150	180	3	2.4	5	105	130	156	19.2	60
NDJL-	70/1.0	70	84	10	8	8	90	87	104	13.4	90
NDJL-	80/0.7	80	96	7	5.6	5	90	130	156	10.3	90
NDJL-	105/0.7	105	126	7	5.6	8	90	104	125	16.8	90
NDJL-	150/0.5	150	180	5	4	5	105	130	156	19.2	90

Dimensional Drawing



Pump Head Material and Size

Model	Material	A	B	C	D	E	F	Interface Size	
								Thread Size	Socket Pipe Size
NDJS-40/1.0~130/0.5	PVC	224	29	90	300	130	310	G 1"	G1/2"-DN15
	PVDF	224	29	90	300	130	310	G 1"	G1/2"-DN15
	PTFE	178	6	90	300	130	310	G 1"	/
	SS316	178	6	97	302	130	310	G 1"	/
NDJS-150/0.3	PVC	239	42	90	300	137	310	G 1"	G1/2"-DN15
	PVDF	224	29	90	300	130	310	G 1"	G1/2"-DN15
	PTFE	193	14	90	300	137	310	G 1"	/
	SS316	193	14	97	302	137	310	G 1"	/
NDJL 70/1.0~105/0.7	PVC	224	29	90	300	130	325	G 1"	G1/2"-DN15
	PVDF	224	29	90	300	130	310	G 1"	G1/2"-DN15
	PTFE	178	6	90	300	130	325	G 1"	G1/2"-DN15
	SS316	178	6	97	302	130	325	G 1"	/
NDJL 150/0.5	PVC	239	42	90	300	137	325	G 1"	G1/2"-DN15
	PVDF	224	29	90	300	130	310	G 1"	G1/2"-DN15
	PTFE	193	14	90	300	137	325	G 1"	/
	SS316	193	14	97	302	137	325	G 1"	/

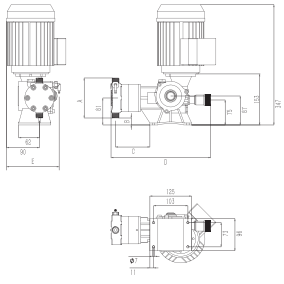
NDWS

1.It is equipped with low pressure die-casting aluminum box with high strength, which ensures solidness and firmness, reduces the mass of the dosing pump and the weight of the overall equipment of later stage.
2.The precise worm gear can make the transmission efficiency increase significantly, gain the same pressure displacement, make the motor power smaller and more energy- saving.
3.High quality modified PTFE diaphragm manufacturing process can make the maximum pressure of mechanical diaphragm dosing pump reach 30 kg, and make the cost of dosing pump under 12-30 kg pressure system substantially decline.
4.The pump head of PVC, PVDF, PTFE, SS316 materials complete series of is suitable for conveying various acids, alkali and salt solutions; non-leakage overflow structure can make sure that the process is stable and orderly.
5.Can be equipped with electric stroke adjuster (4-20mA).
6.Variable frequency motor and explosion-proof motor are optional.

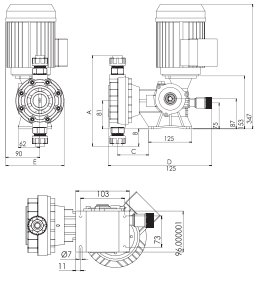


Model		Capacity L/h		Max.Pressure Bar		Stroke Length (mm)	Diaphragm Diameter (mm)	Pump Speed (SPM)		Single-stroke Flow (ml/stroke)	Motor Power (W)
		50hz	60hz	50hz	60hz			50hz	60hz		
NDWS-	8/1.6	8	9.6	16	12.8	2	48	118	142	1.13	180
NDWS-	12/1.6	12	14.4	16	12.8	2	48	177	212	1.13	180
NDWS-	18/1.6	18	21.6	16	12.8	2	60	118	142	2.54	180
NDWS-	24/1.6	24	28.8	16	12.8	2	60	177	212	2.3	180
NDWS-	33/1.0	33	39.6	10	8	4	90	118	142	4.7	180
NDWS-	68/1.0	68	81.6	10	8	6	90	118	142	9.6	180
NDWS-	120/0.7	120	144	7	5.6	4	105	177	212	11	180
NDWS-	143/0.6	143	171.6	6	4.8	6	105	118	142	20.1	180
NDWS-	213/0.5	213	255.6	5	4	6	105	177	212	20.1	180
NDWS-	258/0.4	258	309.6	4	3.2	10	105	118	142	36.4	180
NDWS-	386/0.3	386	463.2	3	2.4	10	105	177	212	36.4	180

Dimensional Drawing



NDWS-8/1.6~24/1.6



NDWS-33/1.0~386/0.3

Pump Head Material and Size

Model	Material	A	B	C	D	E	Connection	
							Thread Size	Socket Pipe Size
NDWS-8/1.6~18/1.6	PVC	95	5	70	290	150	Flexible tube ϕ6*9 or ϕ10*14	Hard tube connections
	PVDF	105	10	75	285	150		
	PTFE	105	10	75	285	150		
	SS316	105	10	75	285	150		
NDWS-33/1.0~68/1.0	PVC	224	31	90	310	150	G 1"	G1/2"-DN15
	PVDF	224	31	90	310	150	G 1"	G1/2"-DN15
	PTFE	178	8	90	310	150	G 1"	/
	SS316	178	8	97	310	150	G 1"	/
NDWS-120/0.7~386/0.3	PVC	239	38	90	310	157.5	G 1"	G1/2"-DN15
	PVDF	224	31	90	310	150	G 1"	G1/2"-DN15
	PTFE	193	18	90	310	157.5	G 1"	/
	SS316	193	18	97	310	157.5	G 1"	/

NDWL

1.Eccentric shaft is supported by bearings in front and rear and the cantilever shaft structure of the most of manufacturers on the market is abandoned; the speed reducing motor does not bear axial force and only transmits torque, and this extends the service life of speed reducing motor and makes the process more stable.
2.Installation and maintenance are simple and convenient; grease is used for lubrication in the box body and grease is added conveniently, making maintenance easy.
3.Stroke length can be adjusted at will during running.
4.PVC, PVDF, PTFE and SS316 materials pump head are applicable to dosing of different kinds of chemical liquid.
5.The pure PTFE diaphragm that has a super-long service life guarantees the stability and safety of dosing.
6.Can be equipped with electric stroke adjuster (4-20mA).
7.Variable frequency motor and explosion-proof motor are optional.



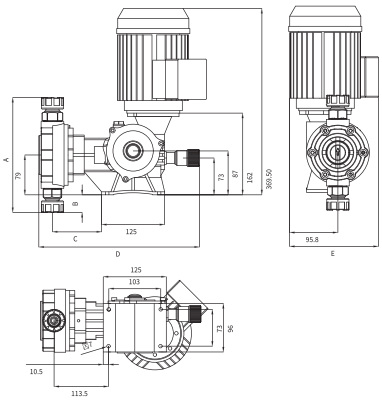
Technical Specifications

Model		Capacity L/h		Max.Pressure Bar		Stroke Length (mm)	Diaphragm Diameter (mm)	Pump Speed (SPM)		Single-stroke Flow (ml/stroke)	Motor Power (W)
		50hz	60hz	50hz	60hz			50hz	60hz		
NDWL	90/1.2	90	108	12	9.6	8	90	177	212	12.8	370
NDWL	120/1.2	120	144	12	9.6	8	105	118	142	17.1	370
NDWL	180/1.0	180	216	10	8	8	105	118	142	25.5	370
NDWL	200/0.8	200	240	8	6	7	105	177	212	28.3	370
NDWL	275/0.7	275	330	7	5.6	8	120	118	142	38.7	370
NDWL	355/0.7	355	426	7	5.6	10	120	118	142	50	370
NDWL	410/0.6	410	492	6	4.8	8	120	177	212	38.7	370
NDWL	530/0.45	530	636	4.5	3.6	10	120	177	212	50	370

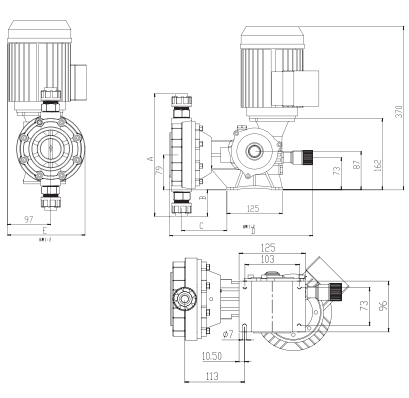
Pump Head Material and Size

Model	Material	A	B	C	D	E	Connection	
							Thread Size	Socket Pipe Size
NDWL-90/1.2	PVC	224	35	97	340	175	G 1"	G1/2"-DN15
	PVDF	224	35	97	340	175	G 1"	G1/2"-DN15
	PTFE	178	11	97	345	175	G 1"	/
	SS316	178	11	97	345	175	G 1"	/
NDWL-120/1.2~180/1.0	PVC	248	45	97	345	175	G 1"	G1/2"-DN15
	PVDF	248	45	97	345	175	G 1"	G1/2"-DN15
	PTFE	193	25	97	350	175	G 1"	/
	SS316	193	25	97	350	175	G 1"	/
NDWL-275/0.7~530/0.45	PVC	259	51	102.5	340	175	G 1"	G1/2"-DN15
	PVDF	259	51	102.5	340	175	G 1"	G1/2"-DN15
	PTFE	213	28	102.5	340	175	G 1"	/
	SS316	213	28	110	340	175	G 1"	/

Dimensional Drawing



NDWL-90/1.2~200/0.8



NDWL-275/0·7~530/0·45

ND1000

1.Motor-driven diaphragm assembly is of simple operation and easy maintenance that the pump head won't leak.
2.The operation is smooth and steady, and the noise is much low.
3.The high precision and high strength transmission components can make the dosing pump efficiently output, at the same time, its maintenance cost is ultra-low.
4.High quality modified PTFE diaphragm assembly can greatly improve the life span of the diaphragm, making it not easy to become a wearing part.
5.PVC, PVDF, PTFE and SS316 materials pump head are applicable to dose different kinds of chemical liquids.
6.Can be equipped with electric stroke adjuster (4-20mA).
7.Variable frequency motor and explosion-proof motor are optional.



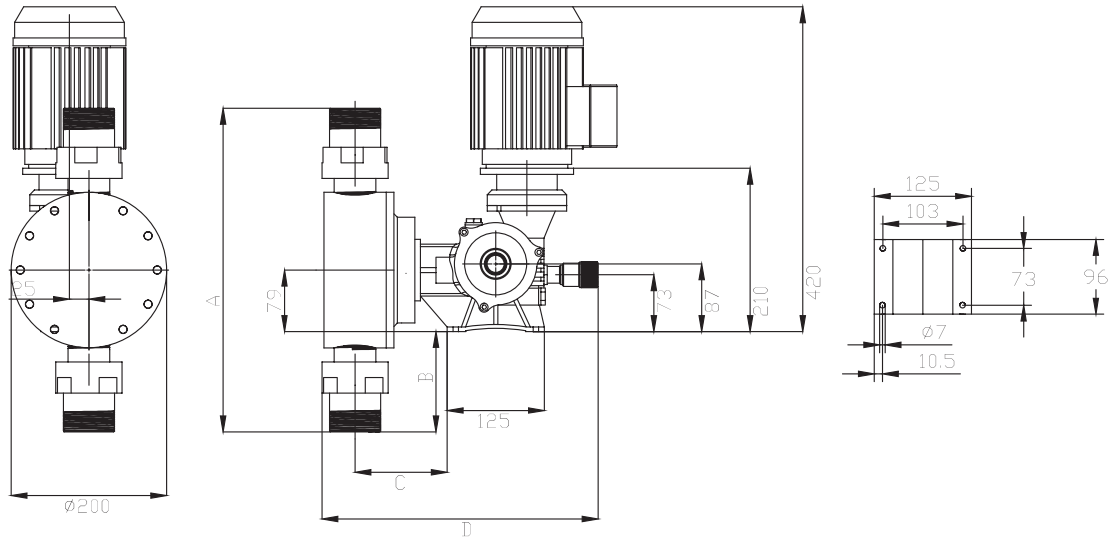
Technical Specifications

Type	Model		Capacity (L/H)	Maximum Pressure (bar)	Stroke Length (mm)	Diaphragm Diameter(mm)	Pump Speed (SPM)	Single-stroke Flow (ml/stroke)	Motor Power (W)
ND1000	ND1000	660/0.5	660	5	10	160	118	93	750
	ND1000	1000/0.4	1000	4	10	160	177	93	750
	ND1000	1200/0.3	1200	3	12	160	177	113	750

Pump Head Material and Size

Model	Material	A	B	C	D	E	Connection
ND1000-660/0.5~1200/0.3	PVC	340	90	120	370	197	G2-1/4" -DN40
	PVDF	340	90	120	370	197	G2-1/4" -DN40
	PTFE	340	90	120	370	197	G2-1/4" -DN40
	SS316	340	95	125	370	197	G2-1/4" -DN40

Dimensional Drawings



ND2000

1.The high-strength casting aluminum box body is used and it is sturdy and durable, and moreover, total weight is reduced greatly.
2.The motor directly drives the eccentric shaft and the spring return structure is used; the structure is simple and stable and easy to maintain.
3.The damping sliding bar structure is applied to overcome the vital shortcomings: large pipe shock, excessive mechanical vibration, parts damage, poor flow linearity and high noise, arising from invalid eccentric travel.
4.High-quality modified PTFE diaphragm assembly is durable and the lift of dosing pump is greatly increased.
5.PVC, PVDF, PTFE and SS316 materials pump head are applicable to dose different kinds of chemical liquids.
6.Can be equipped with electric stroke adjuster (4-20mA).
7.Variable frequency motor and explosion-proof motor are optional.



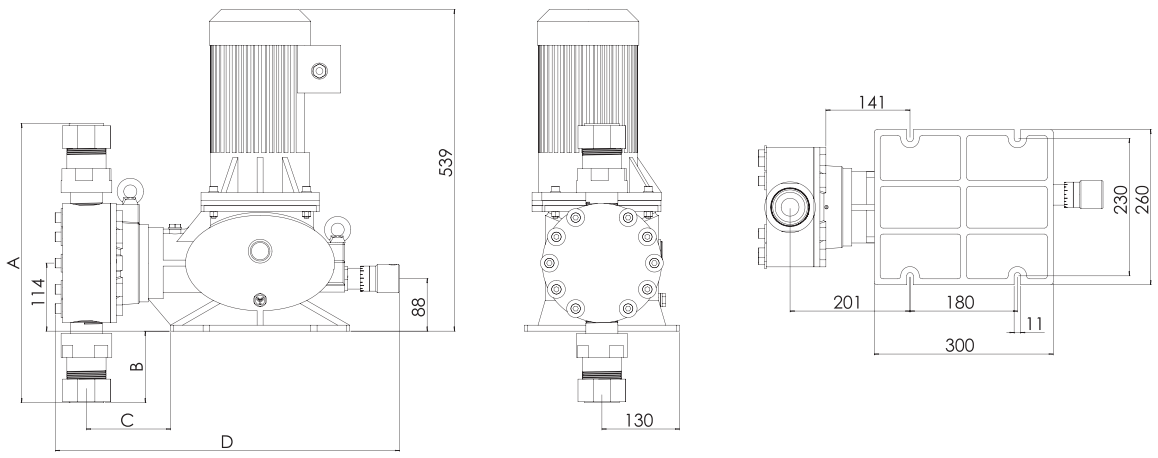
Technical Specifications

Model		Capacity L/h		Max.Pressure Bar		Stroke Length (mm)	Diaphragm Diameter (mm)	Pump Speed (SPM)		Single-stroke Flow (ml/stroke)	Motor Power (W)
		50hz	60hz	50hz	60hz			50hz	60hz		
ND2000	500/1.0	500	600	10	8	8	155	200	240	42	750
ND2000	700/0.9	700	840	9	7.2	10	155	200	240	58	750
ND2000	1000/0.6	1000	1200	6	4.8	12	160	200	240	83	750
ND2000	1300/0.4	1300	1560	4	3.2	14	160	200	240	108	750
ND2000	1600/0.3	1600	1920	3	2.4	15	160	200	240	135	750
ND2000	2000/0.3	2000	2400	3	2.4	16	160	200	240	166	750

Pump Head Material and Size

Model	Material	A	B	C	D	Connection
ND2000-500/1.0~1000/0.6	PVC	340	51	102.5	340	G2-1/4" -DN40
	PVDF	340	51	102.5	340	G2-1/4" -DN40
	PTFE	340	28	102.5	340	G2-1/4" -DN40
	SS316	340	28	110	340	G2-1/4" -DN40
ND2000-1300/0.4~2000/0.3	PVC	460	120	140	580	G2-1/4" -DN40
	PVDF	460	120	140	580	G2-1/4" -DN40
	PTFE	460	120	140	580	G2-1/4" -DN40
	SS316	460	90	147	580	G2-1/4" -DN40

Dimensional Drawings



HND

1.The diaphragm is mechanically driven and spring returned, and the structure is simple and easy to maintain.
2.High-quality modified diaphragm assembly with maximum pressure of 30 Bar can replace low pressure hydraulic diaphragm dosing pumps in a part of application places, greatly reducing the user’s initial input cost.
3.In the post-maintenance, because there is no hydraulic oil chamber and other hydraulic assemblies, the maintenance become very simple. As the high-quality modified PTFE diaphragm assembly is applied, extending the service life of the diaphragm and reducing the post-maintenance cost greatly.
4.Application of damping sliding bar makes the dosing pump run smoothly, with extremely low noise.
5.PTFE elastic component and one-way valve are optional and the high-viscosity corrosive liquid can be conveyed; outlet end has back pressure.
6.It can be matched with electric stroke adjuster (4-20mA).
7.Variable frequency motor and explosion-proof motor are optional.



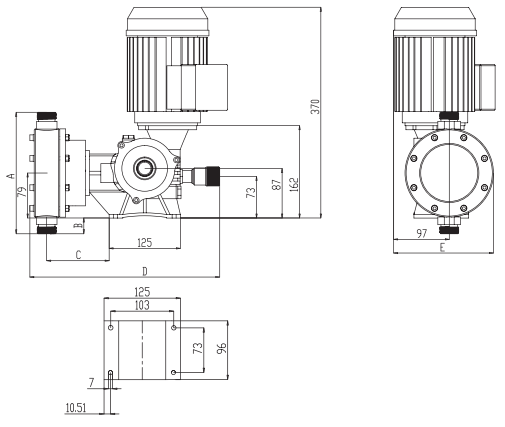
Technical Specifications

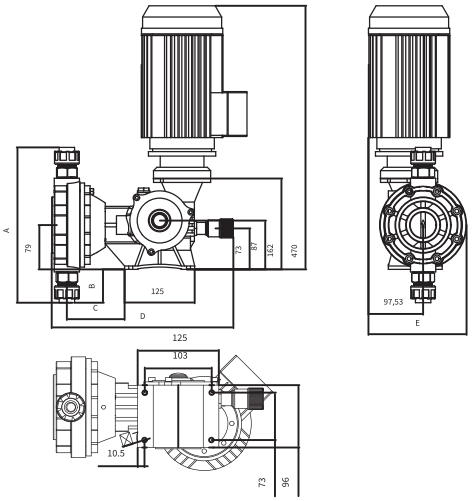
Model		Capacity L/h		Max.Pressure Bar		Stroke Length (mm)	Diaphragm Diameter (mm)	Pump Speed (SPM)		Single-stroke Flow (ml/stroke)	Motor Power (W)
		50hz	60hz	50hz	60hz			50hz	60hz		
HND	47/3.0	47	56.4	30	24	4	90	118	142	6.6	370
HND	70/2.0	70	84	20	16	4	90	177	212	6.6	370
HND	115/1.8	115	138	18	14.4	6	105	118	142	16.2	750
HND	135/1.6	135	162	16	12.8	7	105	118	142	19	750
HND	160/1.2	160	192	12	9.6	8	105	118	142	22.6	750
HND	330/1.0	330	396	10	8	7	120	118	142	31.1	750
HND	400/0.8	400	480	8	6.4	6	120	177	142	37.7	750

Pump Head Material and Size

Model	Pump head	A	B	C	D	E	Connection	
							Threaded	Socket pipe
HND-47/3.0~70/2.0	SS316	178	10	105	334	157	G 1”	G1/2”-DN15
HND-115/1.8~400/0.8	SS316	193	18	105	335	166	G 1”	G1/2”-DN15
	PVC	259	51	102.5	345	175	G 1”	G1/2”-DN15
HND-330/1.0~400/0.8	PVDF	259	51	102.5	345	175	G 1”	G1/2”-DN15
	PTFE	213	28	102.5	350	175	G 1”	/
	SS317	213	28	110	350	175	G 1”	/

Dimensional Drawings





Electric Stroke Adjuster

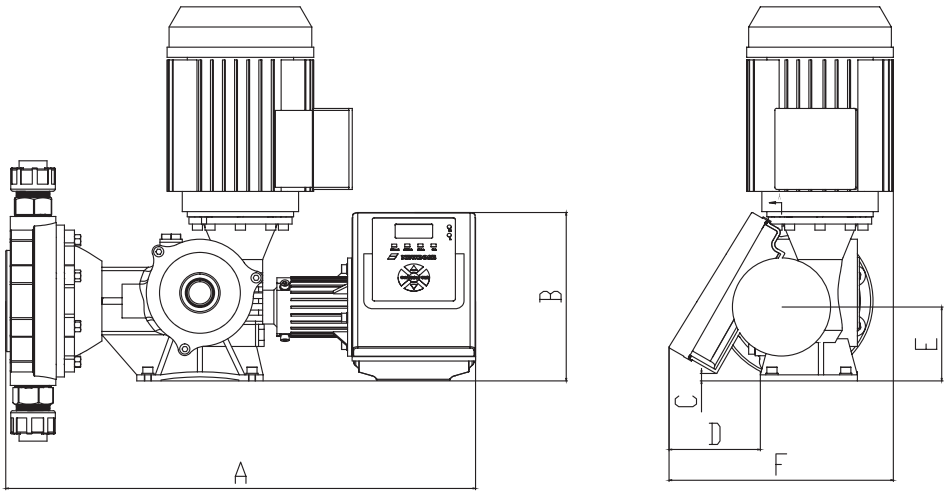


1.The adjuster can be both manual operation and current signal control.
2.In manual mode, stroke length of dosing pump can be accurately set and displayed via the operation panel of the adjuster. With error compensation function, the adjuster overcomes the error between actual displacement and its set value directly caused by the random change of stroke length of dosing pump because traditional knob adjuster doesn't have the self-lock function.
3.The return-to-zero operation in the functions, simply and effectively calibrates the accuracy of electric stroke adjuster, making dosing more accurate.
4.In the analog signal (4-20mA) control mode, dosing in direct proportion or in inverse proportion can be achieved according to the user requirements. And the stroke length of dosing pump could be adjusted in real time, further, accurately modify the displacement of dosing pump.
5.Modular interface design can customize a linkage to change the dosing pumps that only allow variable frequency adjustment into the dosing pumps of which stroke length can be adjusted intelligently.

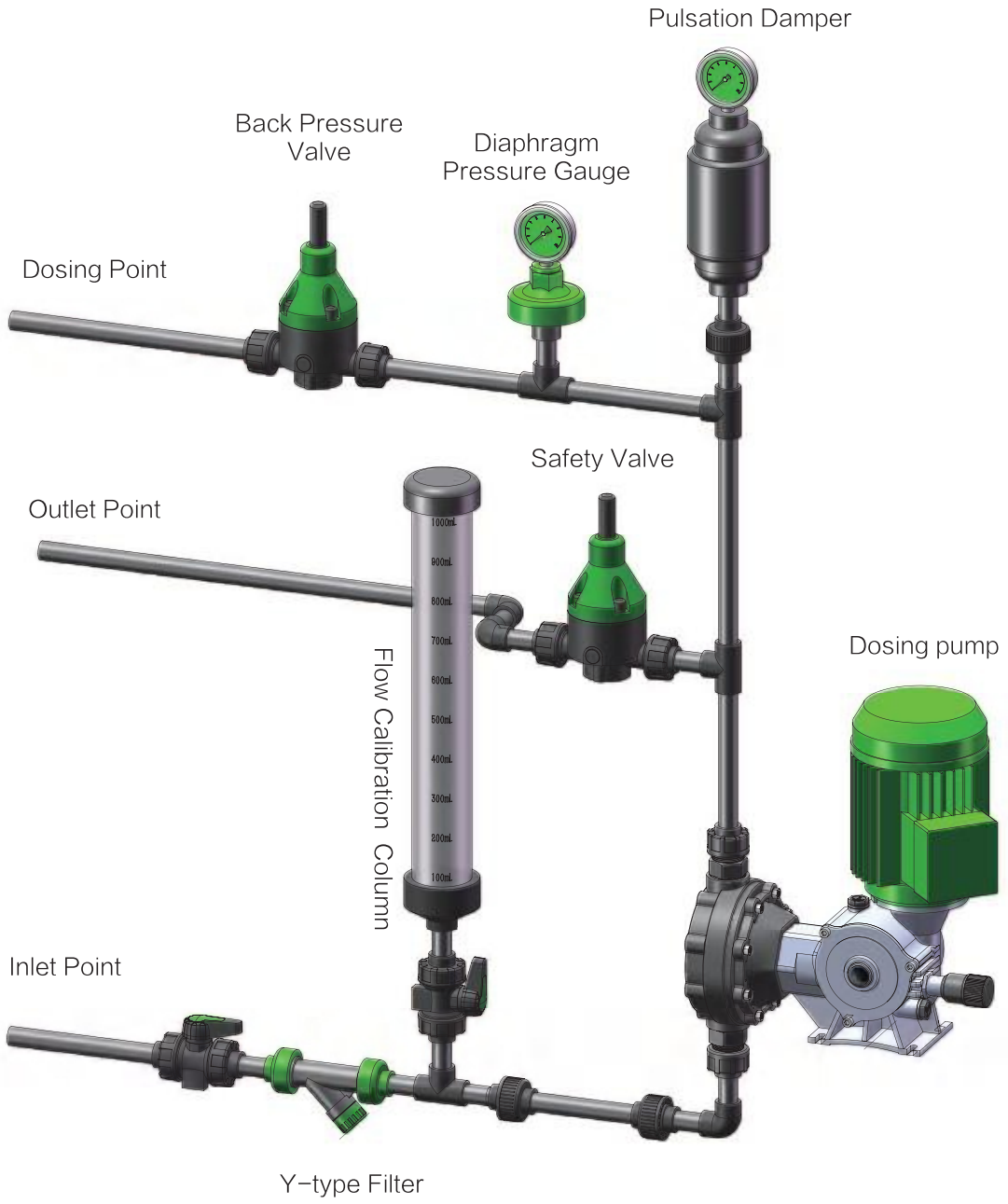
Pumps and Adjuster Size

Model	A	B	C	D	E	F
NDWS-33/1.0~68/1.0	445	170	8	90	73	205
NDWS-117/0.7~386/0.3	455	170	8	90	73	205
NDWL-90/1.2~530/0.45	470	170	8	90	73	222
ND1000-660/0.5~1200/0.3	515	170	8	90	73	273
ND2000-500/1.0~2000/0.3	702	182	16	2	88	262
HND-47/3.0~70/2.0	470	170	8	90	73	222
HND-115/1.8~400/0.8	490	170	8	90	73	245

Dimensional Drawings



Typical Installation Diagram



◆ E series motor dosing pump



- Flow rate: 9-150 L/H
- Maximum Pressure: 7 Bar
- Power Supply: 220V single phase, 380V three-phase
- Pump Head: — PP with ceramic ball valves, FKM seal
  — PVC, PTFE and SS316 are optional
- Stroke length adjustment: Manual control 0-100%
- Function: — 220V, can be equipped with switch box (start/stop) and the float switch.
  — 380V, manual operation
- Installation Kit: 2m each of suction and delivery tube, foot valve, connectors for hard pipe.

◆ Technical Specifications

Model	Capacity L/h		Presssure Bar		Stroke Length	Diaphragm Diameter	Pump Speed spm		Single Stroke Capacity	Pipe Size	Power	Electricity
	50Hz	60Hz	50Hz	60Hz	mm	mm	50Hz	60Hz	mL/stroke	mm	W	
E-9/1.0	9	10.8	10	8	2	70	54	65	2.8	6*9		
E-15/1.0	15	18	10	8	2	70	90	108	2.8	6*9		
E-30/0.7	30	36	7	5.6	4	70	90	108	5.6	6*9		
E-42/0.7	42	50.4	7	5.6	3	70	180	216	3.9	6*9		A: 380V 3-phase
E-60/0.5	60	72	5	4	4	70	180	216	5.6	6*9	40	B: 220V single phase
E-72/0.5	72	86.4	5	4	5	70	180	216	6.67	6*9		
E-90/0.3	90	108	3	2.4	3	88	180	216	8.34	10*14		
E-120/0.3	120	144	3	2.4	4	88	180	216	11.11	10*14		
E-150/0.3	150	180	3	2.4	5	88	174	209	14.37	10*14		

◆ Technical Features

- The unique structure design is in high effcience andenergy saving that reduce much more energy consuption than equality motor.
- The diaphragm part is made of 100%PTFE material /Teflon with best quality under the long-term experience, that the pump could work without liquids and no damage to diaphragm.
- The duckbill valve are being applied in foot valve, no reversed flow, even the pressure become higher and the valve will be sealed better.
- There are independent switch and fuse in the multi-functional terminal box. It can work with float switch to control the start-stop, being widely used in single pump dosing system.

◆ Installation Kit



Sprayer



Filter



PE Delivey tube
2m,6x9mm



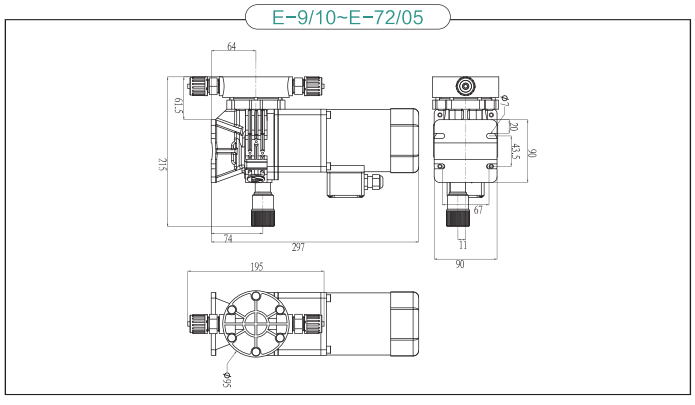
PVC Sucition tube
2m,6x9mm



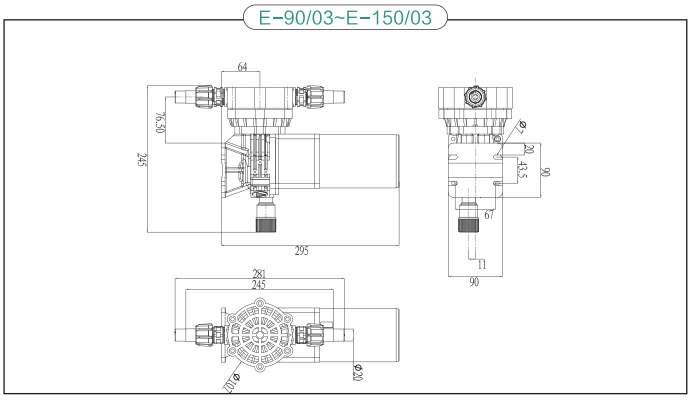
DN15 pipe adapter (optional)

◆ Installation Dimensional Drawing

E-9/10~E-72/05



E-90/03~E-150/03



Motor X Micro Mechanical Metering Pump

Function Introduction：

1. Full PTFE material diaphragm
2. Integrated pump head with check valves
3. 2% metering accuracy
4. Various operation position
5. Lower noise
6. Higher protection class IP65
7. Capacity adjust by stroke length 10~100%
8. Power supply: 220V 50Hz single phase



Technical Parameter Sheet

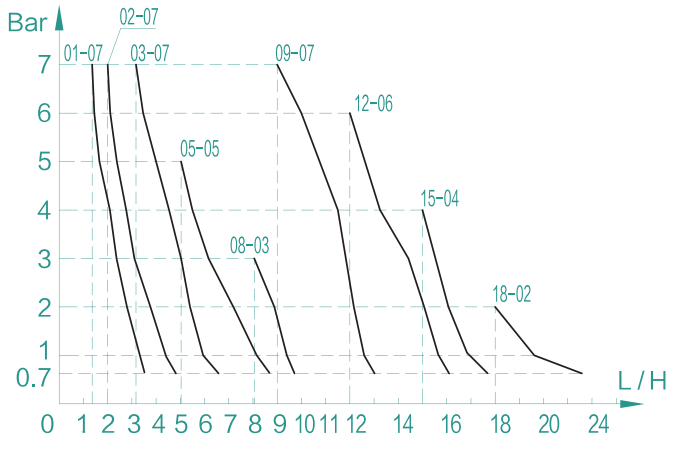
Specification Model		Capacity	Pressure	Stroke Length	Diaphragm Diameter	Speed	Motor
		L/h	Bar	mm	mm	spm	w
MX30	01-07	1	7	1	35	80	28
	02-07	2	7	2	35	115	28
	03-07	3	7	2	35	80	28
	05-05	5	5	2.5	35	80	28
	08-03	8	3	3	35	115	28
MX40	09-07	9	7	2	47	115	41
	12-06	12	6	3	47	80	41
	15-04	15	4	3	47	115	41
	18-02	18	2	4	47	115	41

Material Sheet

Pump Head Assembly

	PPV	PVT	PTF	SST
PUMP HEAD	PP(FRPP)	PVC	PTFE	SS316
DIAPHRAGM	PTFE	PTFE	PTFE	PTFE
VALVE BALL	CERAMIC	CERAMIC	CERAMIC	SS316
VALVE SEAT	PTFE	PTFE	PTFE	SS316
VALVE BODY	PP(FRPP)	PVC	PTFE	SS316
SEALS	FKM	FKM	PTFE	PTFE

Pump Flow Diagragm



Kits



Foot valve



Iniection valve

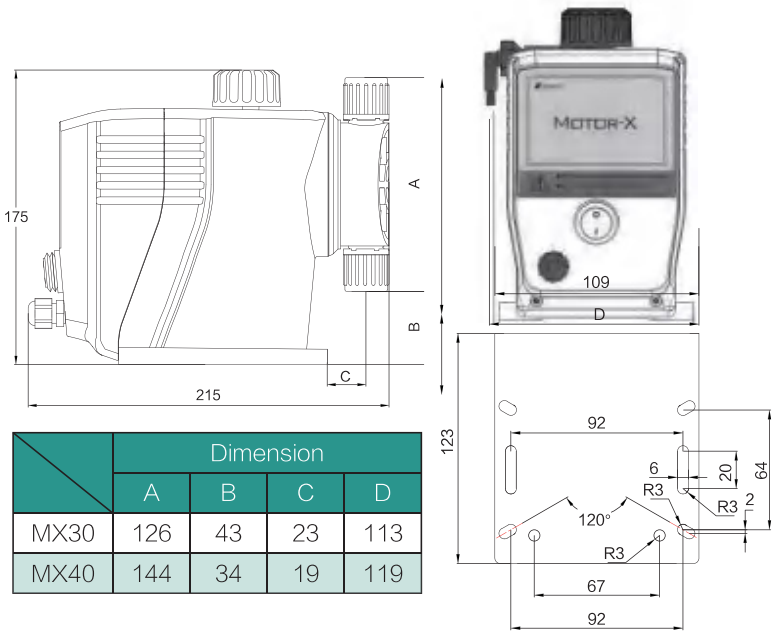


PE Delivey tube
2m,6x9mm



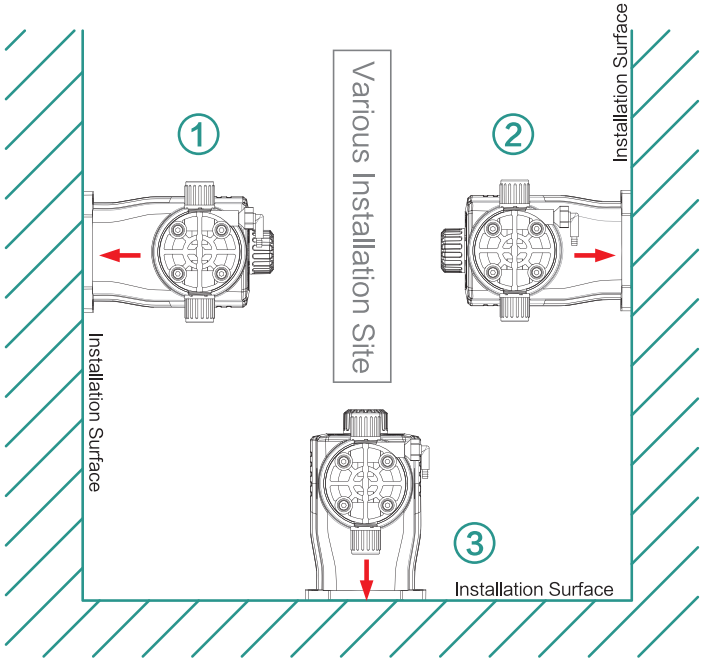
PVC Sucition tube
2m,6x9mm

Installation Drawing



	Dimension			
	A	B	C	D
MX30	126	43	23	113
MX40	144	34	19	119

The base support could be installed to the wall in various direction, only need to ensure the check valves be perpendicular to the ground.





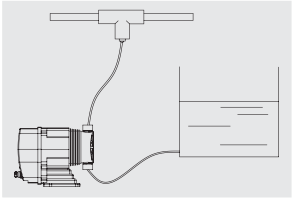
TANK60 Integrated Dosing System

- Can be equipped with NEWDOSE electromagnetic dosing pumps;
- The flow calibration tube shows the liquid level in real time;
- Simple installation, disassembly and washing, and sewage can be discharged at any time;
- Multiple safety protection design to prevent damage caused by liquid leakage and corrosion;
- Integrated design, without the need to prepare other accessories as a base;
- Can be equipped with mixer, liquid level sensor,controller, electrical panel, fault alarm, remote signal adjustment;
- The integrated complete set of dosing device is safe, efficient, simple and beautiful.

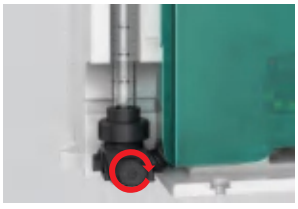
Model Table

Model	Volume L	Pump Quantity Unit	Pump Model
TANK 60-1-M	60	1	All solenoid dosing pump series/Motor-X
TANK120-2-M	120	2	All solenoid dosing pump series/Motor-X

Multifunctional Integrated Design

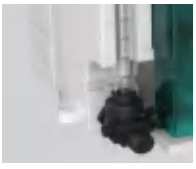


Ideal installation position: the position of the pump in the system is the best condition, and cavitation is not easy to produce, the amount of gas generated and accumulated inside the pipe is small, and it is not easy to produce blockage of gas.



Flow Calibration: Turn the knob clockwise to calibrate and calibrate the dosing pump flow.

Actual flow = difference between initial and final liquid level * 2 * 60 (L/h)



Unscrew the outer cable plug to drain, easy to operate, and the maintenance barrel and pipe can be cleaned at any time.



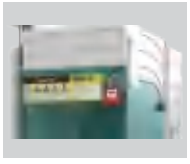
PVC calibration tube, clean and read the value of the liquid level in the barrel.



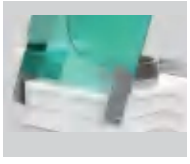
Three sets of bolt holes are reserved at the bottom of the barrel, which can be fitted with a full range of new Dotz electromagnetic pumps and Motor-X miniature mechanical diaphragm pumps.



The installation position of the mixer is reserved at the top to perform the mixing function.



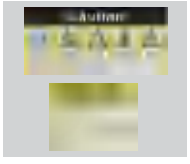
Equipped with a transparent bucket cover to protect the pump and prevent malfunction by on-site personnel.



The connection between the barrel cap and the barrel is made of a stainless steel plate, which is durable and not brittle.



The bottom is equipped with fixing bolts to prevent accidental operation falling off.

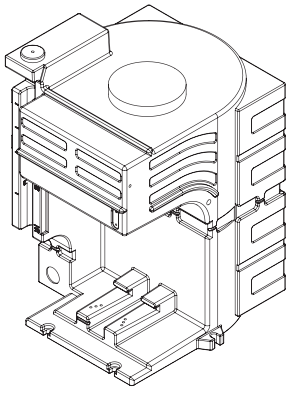


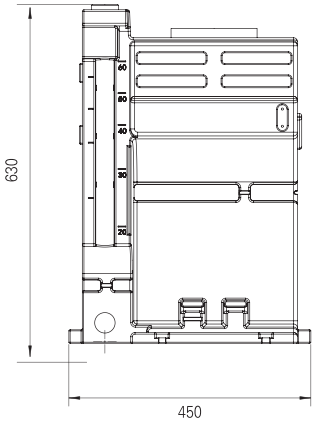
Equipped with safety stickers to warn the scene and standardize the operation.

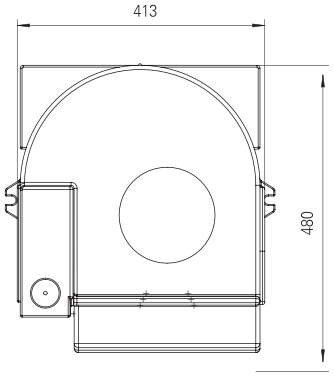
Parameters Table

Model	Volume(L)	Material	Water contact Material	Weight(KG)
TANK 60-1-M	60	PE	PE,PVC,PP,FPM etc.	9.5
TANK120-2-M	120	PE	PE,PVC,PP,FPM etc.	/

Dimension







Pump Mode



All electromagnetic series / Motor-X



All electromagnetic series / Motor-X

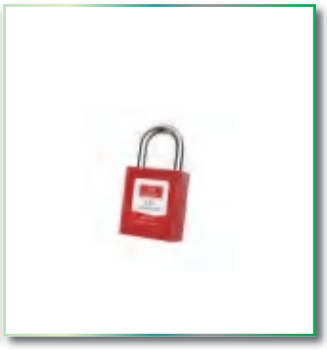
Optional equipments



Stirrer



liquid level sensor



safety lock



meter or controller

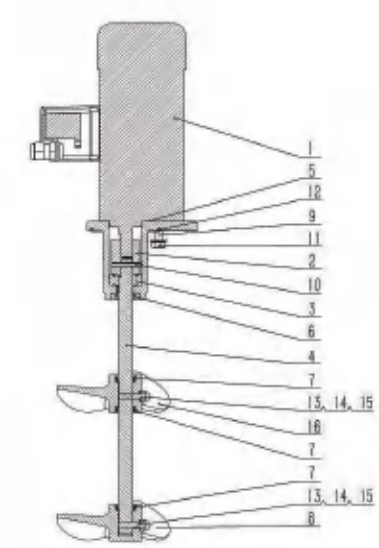
NDM Top Entry Mixer

DESIGN FEATURES

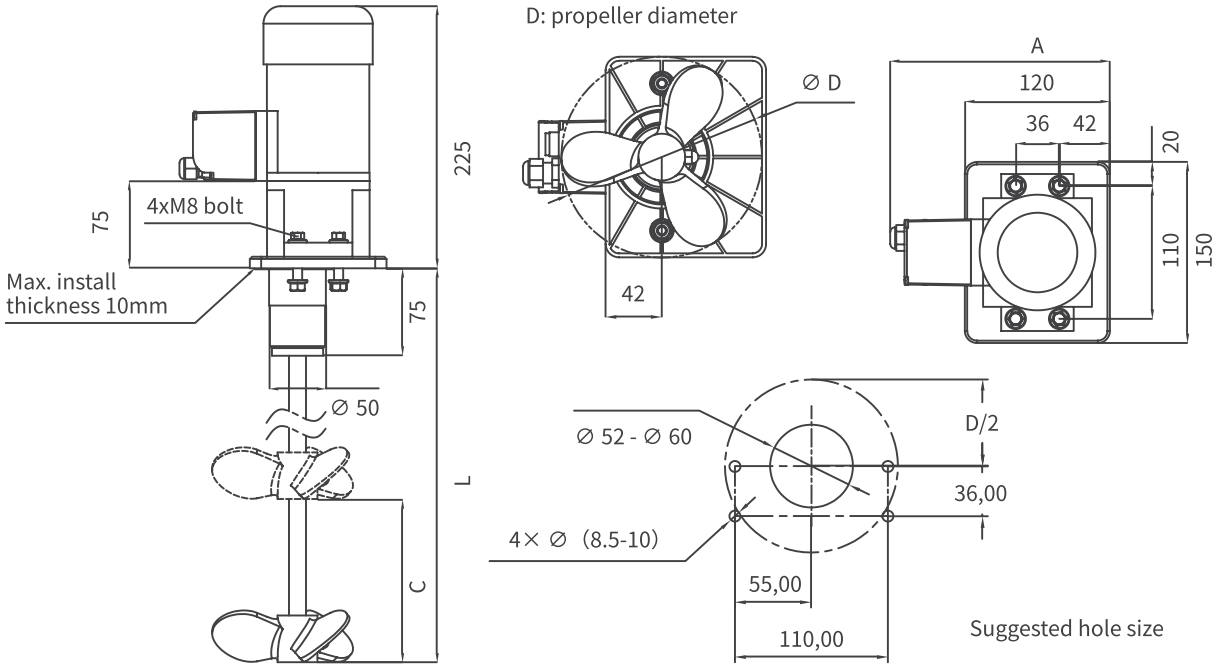
- The mixer propeller is processed and molded by high-pressure injection molding, which can use a variety of materials, such as PP, PVC, PVDF and other materials. It can mix a variety of concentrations, media, suspended substances and even some complex applications.
- The way of high-pressure injection molding method can realize the precise manufacture of complex curved surfaces, which greatly reduces the resistance of the paddle when advancing and reduces the shear force, greatly enhancing the efficiency of advancing mixing and stirring, and by efficiently promoting the movement of the water in the pool (barrel), thus fully combining and reacting with the water, shortening the mixing time between the chemical and the water, and greatly improving the efficiency of using the chemical.
- A base with rolling bearings is a feature of the entire mixing system. When the mixer is in use, the swinging causes oscillation to lessen and increase mixing effectiveness.
- The mixer life is effectively extended, the vibration and noise levels are dramatically lowered, the motor shaft radial force is greatly reduced, and the operation is more stable.
- The mixer base is outfitted with shaft seals to handle erratic mixing situations and stop the internal base components from corroding. The quality of the operating environment outside can be substantially enhanced by installing seals on the base and the barrel (kettle) to stop gas leakage. The mixer is easy to store and travel thanks to the quick assembly module, which can also be put together and used right away.



PART NUMBER



Part No.	Desigenation	Qt.
1	Motor	1
2	D type shaft cover	1
3	Deep groove ball bearing	1
4	Complete shaft	1
5	Support plate	1
6/7	Rotary oil seal	1
8	Impeller	1
9/11	Nuts&Bolts	4
10	Spring pin	1
12	Sealing ring	1
13/14/15	Screws, nuts and gasket	1



SELECTION GUIDE

Model	Tank Volume	Propeller Diameter	Shaft Length	Rated Power	Speed Ratio rpm		Rotation Speed	Shaft Material	Propeller Material	Power Supply
	L	mm	mm	W	50Hz	60Hz				
NDM-	100	150	600	40	200	240	7.5	Outside: PVC Shaft: Stainless steel S: SS304	Standard: PP Optional: SS304	A: 380V 50Hz 3-phase B: 220V 50Hz 1-phase C: Others
NDM-	200	220	700	40						
NDM-	300	220	800	40	150	180	10			
NDM-	500	280	800	40						
NDM-	1000	330	1000	40	100	120	15			
NDM-	1500	330	1200	40	75	90	20			
NDM-	2000	330	1500	40						

Remarks
1. Propeller code: S — Stainless steel 304 D — Double Propellers
2. Model Example:
NDM100-150BD
Default configuration: It's for 100L tank,150rpm, with 3-propeller double-deck, PP material propeller, diameter is150mm, shaft is PVC column and 600mm length. Themotor is40w, power supply is 220V 50Hz single phase.

ARK81 Flow Transmiting Contoller



- Digital circuit design,high level gaist interruption.
- SMT bonding process, highly integrated, stable measurement low power dissipation, good repeatabiity for electric unit.
- Powertul function, combined with transmiting and controling ability, control fiow in batch.
- Wonderul appearance, strong structure, anticorrosion from chemicals, disc-mounting or wall surface.

Technical Parameters

ARK81 Flow Transmitting Controller	• Output:
• Measuring Scale: 0-10KHz(n < 120000rpm)	• Instant flow on and low outpu(relay output)
• Accuracy:	• 4-20mA proportional control/transmitting output
Linearity: ±1%	• RS485 communication output
Repeatability: ±0.5%	• Pulse signal output
• Environment Requirement	• Installation: Disc, wall surface, integrated mounting
Temperature: -20 - 70℃(-4 - 158° F)	• Display: LCD of lattice with lights of the background.
Humidity: 0-95% RH, no hydrometeor.	• Protection Glass IP65, anticorrosive from chemicals
• Input	• Power Supply: DC24V, 220V adaptor is optional.
• ARK61 plug -in impeller flow sensor	• Size: 96*96*48 mm
• Others of the same type(impulse) fiow sensor.	• Power:1W

Instrucction



Disc-mounting

90.5 × 90.5 × 40mm



Hole size of disc-mounting



Wall surface mounting



Integrated mounting

Order Code

Installation	1	Disc-mounting
	2	Wall surface mounting
Work Mode	1	Transmitting mode
	2	Multi-functional mode
For example: ARK81-21 Installation: Disc-mounting Work Mode: Transmitting mode		

ARK61 Rotor Flow Sensor

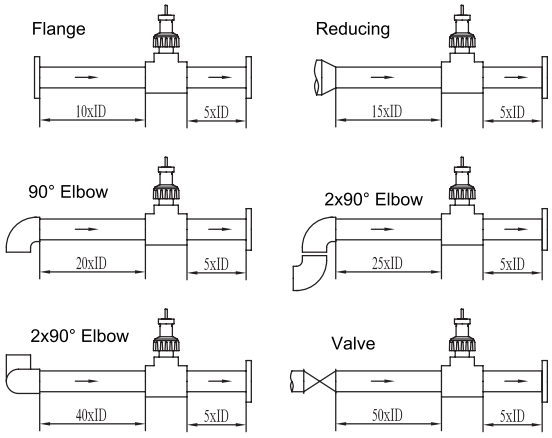


- Output with Hal implulse, stable rectagle waves with open collector NPN, strong capacity of driving.
- Anticorrosive materials(PP, SS316) for the flowing pipeline, superior abrasion-fesistance.
- Solely output of impulse signals, directly control execution device.
- Simple to install, tee, flange, saddle, weld ways for installation, strong struction,can be installed with transmitter as seperated or integrated ways, suit to complex project environments.
- IP68, can be used in cruel environments.
- High reliabity and without any maintenance.

Technical Parameters

Flowing Scale	0.1-6 m/s(0.3-20 inch/s)	Flowing Part Material	Sensor body: PP/PTFE/SS316	
Pipe Diamter	DN15-DN600(1/2-24inch)		O-ring: FPM	
Output Signal	Impulse signal, open collector NPN		Rotor: PP/PTFE	
Supply Voltage	DC 5-24V		Bearing: Zirconia (Ceramics)	
IP	IP68		Spin Axis: Zirconia (Ceramics)	
Accuracy	Linearity: ±5%	Pressure /Temp	PP	10bar @ 25℃, 1.5bar@90℃
	Repeatability: ±0.5%		SS316	25bar @ 100℃

Installation Method



Order Code

Piping Selection	1	DN25-DN100
	2	DN125-DN600
Installation	1	Integrated installation
	2	Separate installation
Sensor Body	P	PP(Standard)
	S	SS316(Strong acid)

For example:ARK61-1-2-P
DN50(Specify Diameter)/Separate/PP material

ARK82 PH Transmiting Controller



- Digital circuit design, high level against interruption.
- Resistance reach to 10^16Ω, high accuracy, good repeatabilty.
- SMT bonding process, highiy integrated, stable test, low power dissipation, good repeatability for electric unit.
- Powerful function integrated with transmiting and controling, high&low limit, control output for relay.two outputs 4-20mA.
- RS485 interface output, connect directly with digital system.
- Can be disc, wall surface or integrated mounting.

Technical Parameters

ARK82 PH Transmiting Controller	• Output:
• Measuring Scale: pH: 0-14 pH	• Instant flow on and low outpu(relay output)
• Accuracy(the whole system) pH: 0.01pH Temp: 0.01℃	• 4-20mA proportional control/transmitting output
• Environment Requirement	• RS485 communication output
Temperature: -20~70℃	• Installation: Disc, wall surface, integrated mounting
Humidity: 0-95%, no hydrometeor.	• Display: LCD of lattice with lights of the background.
Others: no oscilation, no interuption of magnetic field.	• Protection Glass IP65, anticorrosive from chemicals
• Input	• Power Supply: DC24V, 220V adaptor is optional.
• ARK62 Series pH electrode	• Size: 96*96*48 mm
• Other pH electrode of same type.	• Power:1W

Instrucction



Disc-mounting

90.5 × 90.5 × 40mm



Hole size of disc-mounting



Wall surface mounting



Integrated mounting

Order Code

Installation	1	Integrated mounting
	2	Disc-mounting
	3	Wall surface mounting
For example: ARK82-2 Installation: Disc-mounting		

Accessories	
Disc-Mounting	
Wall Mounting	

ARK83 ORP Transmiting Controller



- Digital circuit design, high level against interruption.
- Resistance reach to 10^16Ω, high accuracy, good repeatabilty.
- SMT bonding process, highiy integrated, stable test, low power dissipation, good repeatability for electric unit.
- Powerful function integrated with transmiting and controling, high&low limit, control output for relay.two outputs 4-20mA.
- RS485 interface output, connect directly with digital system.
- Can be disc, wall surface or integrated mounting.

Technical Parameters

ARK83 ORP Transmiting Controller	• Output:
• Measuring Scale: ORP: -2000mV-2000mV	• Instant flow on and low outpu(relay output)
• Accuracy: ORP: 1 mV Temp: 0.01℃	• 4-20mA proportional control/transmitting output
• Environment Requirement	• RS485 communication output
Temperature: -20~70℃	• Installation: Disc, wall surface, integrated mounting
Humidity: 0-95%, no hydrometeor.	• Display: LCD of lattice with lights of the background.
Others: no oscilation, no interuption of magnetic field.	• Protection Glass IP65, anticorrosive from chemicals
• Input	• Power Supply: DC24V, 220V adaptor is optional.
• ARK63 Series ORP electrode	• Size: 96*96*48 mm
• Other ORP electrode of same type.	• Power:1W

Instrucction



Disc-mounting

90.5 × 90.5 × 40mm



Hole size of disc-mounting



Wall surface mounting

Order Code

Installation	1	Disc-mounting
	2	Wall surface mounting
For example: ARK83-1 Installation: Disc-mounting		

Accessories	
Disc-Mounting	
Wall Mounting	

ARK84 Conductivity Transmiting Controller



- Digital circuit design, high level against interruption.
- SMT bonding process, highiy integrated, stable test, low power dissipation, good repeatability for electric unit.
- Powerful function integrated with transmiting and controling,high&low limit, control output for relay.two outputs 4-20mA.
- RS485 interface output, connect directly with digital system.
- Can be disc, wall surface or integrated mounting.

Technical Parameters

ARK84 Con.Transmiting Controller	• Input
• Measuring Scale:	• ARK64 Series CM electrode
Conductivity: K=0.01 0.055—20 μ s/cm	• Other CM electrode of same type.
K=0.1 0.0—200 μ s/cm	• Output:
K=1.0 1.0—2000 μ s/cm	• Instant flow on and low outpu(relay output)
K=10 10—20000 μ s/cm	• 4-20mA proportional control/transmitting output
Temp: 0.00-130.00℃	• RS485 communication output
• Temp Compensation:	• Installation: Disc, wall surface, integrated mounting
Auto Temp Compensation: PT1000 Mode	• Display: LCD of lattice with lights of the background.
Manual Temp Compensation: Buttons Settings	• Protection Glass IP65, anticorrosive from chemicals
• Environment Requirement	• Power Supply: DC24V.
Temperature: -20~70℃	• Size: 96*96*48 mm
Humidity: 0-95%, no hydrometeor.	• Power:1W

Instrucction



Disc-mounting

90.5 × 90.5 × 40mm



Hole size of disc-mounting



Wall surface mounting

Order Code

Installation	1	Disc-mounting
	2	Wall surface mounting
For example: ARK84-1 Installation: Disc-mounting		

Accessories	
Disc-Mounting	
Wall Mounting	

ARK Electrode

pH electrode

- Cable for output reach to 800m, stable signal.
- Use large quantity of ethylene solution as interface, not easily to be blocked up, stable penetration.
- Use high polymer as electrolyte and solid gel salt bridge, assure stability of electrode measurement and even extend lifetime.
- Use low-resistance&sensitive glass film and salt ring of Germany technology.
- Eliminate all kinds of interruption effectively, increase stock of ion, respond fast, stable, long-lifetime.

ORP electrode

- Use Teflon diaphragm of ring- shape with large dimension, against pollution, blocked up, meanwhile keep stable potential in the solution.
- Solid gel as reference electrolyte, no need to compensate electrolyte solution.
- Use special sealing technology to protect electrode from corrosion of strong acid&alkali,assure its reliability in bad environment.

Conductivity electrode

- Stable performance, long lifetime.
- Convenient to install, uninstall, and clean.
- Compatiable with all the geneal con.transmitter in worldwide.

All the above probes could be used in industrial waste water, electroplating, pool water and other water disposal system and chemical industry, dyeing, biological medication, papermaking, food&drink area, RO, purified-water disposal, chemical industry cleanness, sea-water desalting, circulated cool water etc.

PH sensor


ARK62-11


ARK62-21

ORP sensor


ARK63-1

Conductivity Sensor


ARK64-1


ARK64-2


ARK64-3

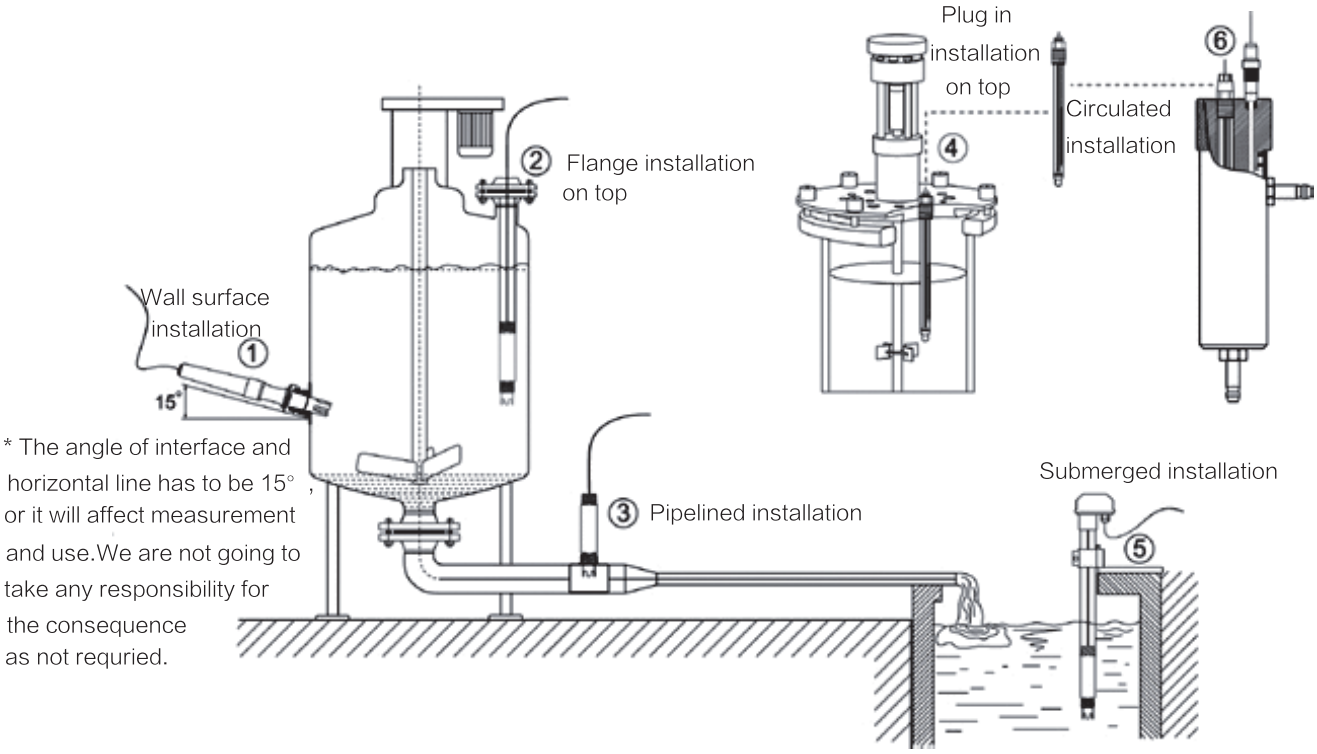

ARK64-4

Model	ARK62-1	ARK62-2	ARK63-1	ARK64-1	ARK64-2	ARK64-3	ARK64-4
Electrode Type	ARK62-11 pH		ORP	Conductivity Sensor			
Constant	Co. > 0.1 μ s/CM pure water	waste water		0.01 ± 0.002	0.1 ± 0.02	1.0 ± 0.2	10 ± 2.0
Measuring Scale	2-12	2-12	-2000~2000	0.055-20	0-200	1-2000	10-20000
Measuring Unit	pH	pH	mV	μ S/cm	μ S/cm	μ S/cm	μ S/cm
Accuracy	0.01 pH 0.01℃		1 mV	± 1%/0.3			
Temp. Compensation	PT100/1000			PT100/1000			
Electrode Structure	Bipolar	Bipolar	Bipolar	Bipolar	Bipolar	Bipolar	Bipolar
Max. Pressure	0.6 Mpa			1.0 Mpa			
Temp. Scale	0-60℃	0-60℃	0-80℃	0-120℃	0-120℃	0-80℃	0-80℃
Body Material	PPS	PPS	PPS	SS316	SS316	PPS	PPS
Electrode Material				SS316	SS316	Platinum	Graphite Platinum
Connection	3/4NPT, flow-through, submersible type						
Cable Length	Standard 5m						

ARK91 Meters Installation Accessories

Item	Product	Specification	Diagram
ARK91-1	Three-way Installation Part(PVC)	DN25 DN32 DN40	
ARK91-2	Flange Installation Part(PP)	DN50 DN65 DN80 DN100 DN125 DN150 DN200 DN250 DN300	
ARK91-3	Welded Installation Part(SS316)	DN40 DN50 DN65 DN80 DN100 DN125 DN150 DN200 DN250 DN300	

pH/ORP Electrode Series



1 Wall surface installation(weld), assure the angle should be more than 15° .
2 Flange installation, used in the tank.
3 Piping installation, tee or weld pipe as accessary.
4 Plug in installation on top.
5 Submerged installation, mostly used in open pool.
6 Circulated installation, collect samples bypass, lower flowing speed&pressure.



CE ISO 9001:2015 MARO