

FLEXFLO® Peristaltic Metering Pumps

Engineering and Technical Data

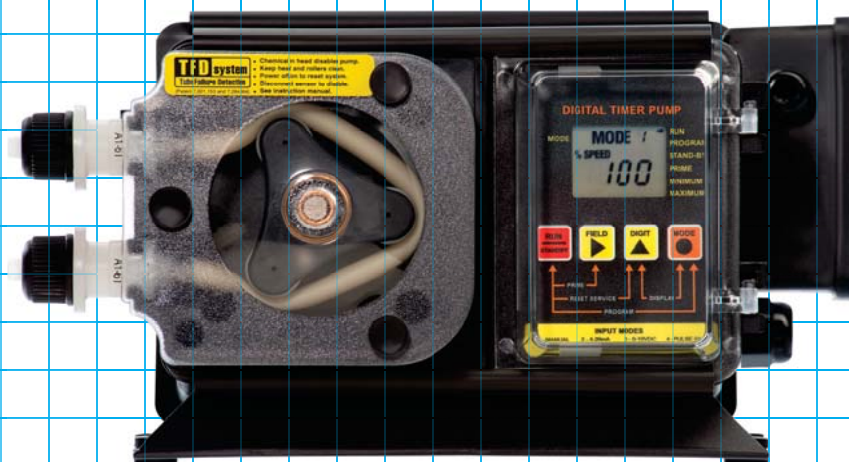
A-100NE

Fixed Speed

Digital Timer Control

Pulse Input Batching

4-20mA on-time cycle control



Features:

- Peristaltic pump design does not have valves that can clog requiring maintenance.
- Self priming - even against maximum line pressure. By-pass valves are not required. Cannot vapor lock or lose prime.
- Outputs to 5.17 GPH (19.56 LPH).
- Output pressures to 100 PSI (6.9 bar).
- Output volume is not effected by changes in back pressure.
- Patented pump tube design installs easily and stays centered on the rollers without manual adjustment.
- Two pump tubes supplied with each pump. No extra tubing required.
- 4 operating modes; manual on time per cycle adjustment, pulse input batching, 4-20mA on time per cycle adjustment, and 0-10v DC on time per cycle adjustment.
- Repeating interval on-time cycle timer is programmable in seconds, minutes, hours and days resulting in near infinite turndown ratio. Example: 5 seconds on per 10 day cycle.
- On time per cycle can be controlled via 4-20mA signal. Note: 20mA must equal maximum pump output.
- Digital interval timer results in a high frequency of small injections per minute.
- Durable housing of chemical resistant Valox (PBT) plastic.

Specifications:

Max. working pressure: 100 psig (6.9 bar)
Max. fluid temperature: 130° F (54° C)
Max. ambient temperature: .. 14° to 110° F/ -10° to 43° C
Output adjustment range: Adjustable 0.1 - 99 seconds
Duty cycle: continuous
Maximum viscosity: 5,000 Centipoise
Maximum suction lift: 30 ft. Water 0 psig
Maximum Solids: 50% by volume
Enclosure: NEMA 3R, (IP23)
Approximate shipping wt: ... 10 lb. (4.5 kg)

Voltage (max amp):

-115VAC/60Hz, 14 & 30 rpm = 1.37 amp
 45 & 60 rpm = 1.87 amp
- 230VAC/60Hz, 14 & 30 rpm = 0.64 amp
 45 & 60 rpm = 0.74 amp
- 220VAC/50Hz, 14 & 30 rpm = 0.68 amp
 45 & 60 rpm = 1.14 amp
- 240VAC/50Hz, 14 & 30 rpm = 0.66 amp
 45 & 60 rpm = 1.04 amp

Power Cord Plug Type:

-115V60Hz = NEMA 5/15 (USA)
- 230V60Hz = NEMA 6/15 (USA)
- 220V50Hz = CEE 7/VII (EUROPE)
- 240V50Hz = CEE 7/VII (EUROPE)

Materials of Construction:

Wetted components:

Pump Tube Assembly:.....Norprene® , Tygothane® or FKM tubing
PVDF tube assembly connection fittings

Suction Tubing:.....Clear PVC

Suction Strainer:.....Natural Polypropylene

Discharge Tubing:.....Natural Polyethylene (LLDPE)

Injection/Check valve:

Body & insert:.....Polypropylene (optional PVDF)

Check Ball:.....Ceramic

Spring:.....Hastelloy C-276

Ball Seat O-ring:.....TFE/P (optional EP)

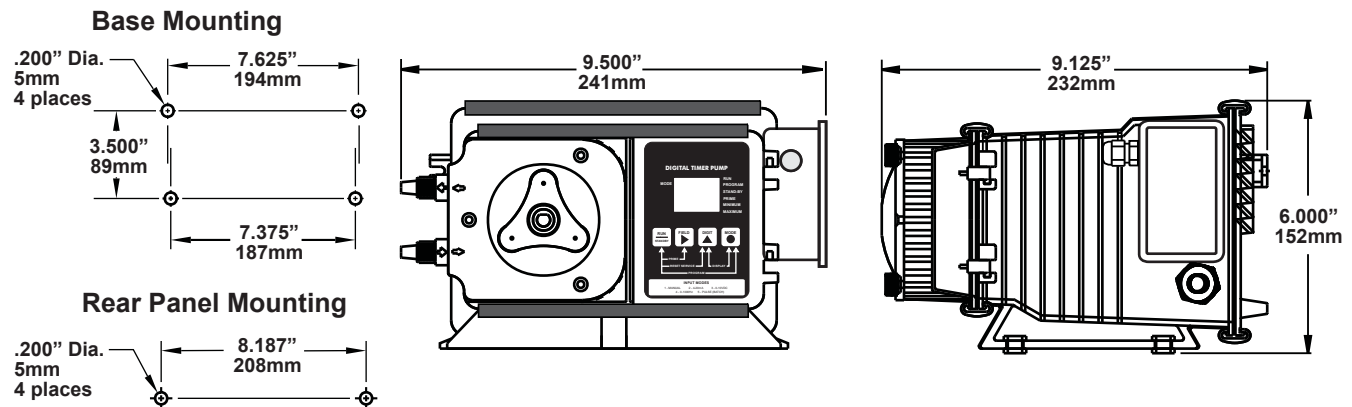
Static Seal O-ring:.....FKM (optional EP)

Duckbill Valve:.....Santoprene®

Non-Wetted components:

Pump Head & Enclosure:Valox® (PBT) thermoplastic
Pump Head Cover:Clear Acrylic
Cover Screws:300 Stainless, Polypropylene cap
Roller Assembly:
 Rotor:Valox® (PBT)
 Rollers:Nylon
 Roller Bearings:Bronze
Motor Shaft:Nickel plated steel
TFD System Sensor pins:Hastelloy C-276
Power Cord:3 conductor, SJTW-A Water-resistant

Dimensions:



Model Number Matrix:

MODEL A1N ☐ ☐ E - ☐ ☐ - ☐

Maximum Motor RPM

0 = 14 RPM
1 = 30 RPM
2 = 45 RPM
3 = 60 RPM

Power Supply

0 = 115V60Hz
1 = 220V50Hz
2 = 230V60Hz
8 = 240V50Hz

Output Control

V = Digital speed control with external input
F = Analog speed control
E = Digital batch timer with external input
A = Analog timer, 60 sec. Cycle - 100% duty
C = Analog timer, 5 sec. Cycle - 100% duty
S = Analog timer, 60 sec. Cycle - 10% duty
X = No output control - fixed feed rate

Miscellaneous Options (not required)

1 = T140-6V injector replaces A-014N-6A
2 = C-340V footvalve replaces C-342-6 strainer
5 = A-014NK-6A injector PVDF
6 = Jumper set for digital square wave input
T7 = 7 gallon chemical tank system
T15 = 15 gallon chemical tank system
T30 = 30 gallon chemical tank system
X = NSF61 certified (ships without accessories)

Tubing Connection Type

T = Compression tube nuts

Pump Tube Size and Material

1 = 1/4" OD Tygothane
2 = 3/8" OD Tygothane
3 = 7/16" OD Tygothane
4 = 1/4" OD Norprene
5 = 5/16" OD FKM
6 = 3/8" OD Norprene
7 = 7/16" OD Norprene
8 = 7/16" OD Norprene Chemical

Maximum Flow rate and pressure capacities:

Tube no.	Tubing Material	14 RPM MODELS					30 RPM MODELS					45 RPM MODELS					60 RPM MODELS				
		ml/m	oz/m	lph	gph	PSI(bar)	ml/m	oz/m	lph	gph	PSI(bar)	ml/m	oz/m	lph	gph	PSI(bar)	ml/m	oz/m	lph	gph	PSI(bar)
1	Tygothane	15	0.51	0.90	0.24	65(4.5)	35	1.18	2.10	0.55	65(4.5)	54	1.83	3.24	0.86	65(4.5)	67	2.26	4.02	1.06	65(4.5)
2	Tygothane	32	1.08	1.92	0.51	65(4.5)	75	2.54	4.50	1.19	65(4.5)	115	3.89	6.90	1.82	65(4.5)	140	4.73	8.40	2.22	65(4.5)
3	Tygothane	73	2.47	4.37	1.16	50(3.5)	173	5.85	10.38	2.74	50(3.5)	261	8.82	15.66	4.14	50(3.5)	326	11.01	19.56	5.17	50(3.5)
4	Norprene	6	0.20	0.36	0.10	100(6.9)	13	0.44	0.78	0.21	100(6.9)	21	0.71	1.26	0.33	100(6.9)	25	0.85	1.50	0.40	75(5.2)
5	FKM	11	0.37	0.66	0.17	25(1.7)	26	0.88	1.56	0.41	25(1.7)	39	1.31	2.34	0.62	25(1.7)	48	1.62	2.88	0.76	25(1.7)
6	Norprene	18	0.61	1.08	0.29	100(6.9)	42	1.42	2.52	0.67	100(6.9)	63	2.13	3.78	1.00	100(6.9)	79	2.67	4.74	1.25	75(5.2)
7	Norprene	57	1.92	3.42	0.90	50(3.5)	138	4.66	8.28	2.19	50(3.5)	200	6.76	12.00	3.17	50(3.5)	250	8.45	15.00	3.96	50(3.5)
8	Nor Chem	40	1.35	2.40	0.63	50(3.5)	84	2.80	5.04	1.31	50(3.5)	140	4.73	8.40	2.22	50(3.5)	180	6.10	10.80	2.85	50(3.5)

Gallons shown are U.S. Gallons

Replacement Pump Tubes:

Pump Model Number Suffix	Pump Tube Part Number	Pump Tube Material	Nominal Pump Tube OD
-1T	A1-1T	Tygothane	1/4" (6.4mm)
-2T	A1-2T	Tygothane	3/8" (9.5mm)
-3T	A1-3T	Tygothane	7/16" (11.1mm)
-4T	A1-4T	Norprene	1/4" (6.4mm)
-5T	A1-5T	FKM	5/16" (7.9mm)
-6T	A1-6T	Norprene	3/8" (9.5mm)
-7T	A1-7T	Norprene	7/16" (11.1mm)
-8T	A1-8T	Norprene Chemical	7/16" (11.1mm)

Get a quote on Blue-White Pumps today:

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