

UP30 - PIVOT Series

3" Air-operated double diaphragm pump



UP30 Metallic

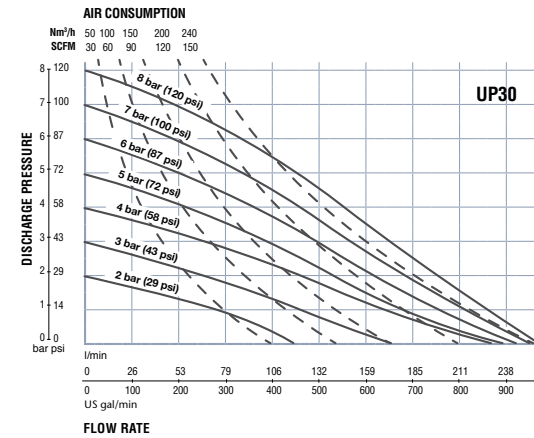
PIVOT SERIES

TECHNICAL DATA

METALLIC UP30 - PIVOT SERIES

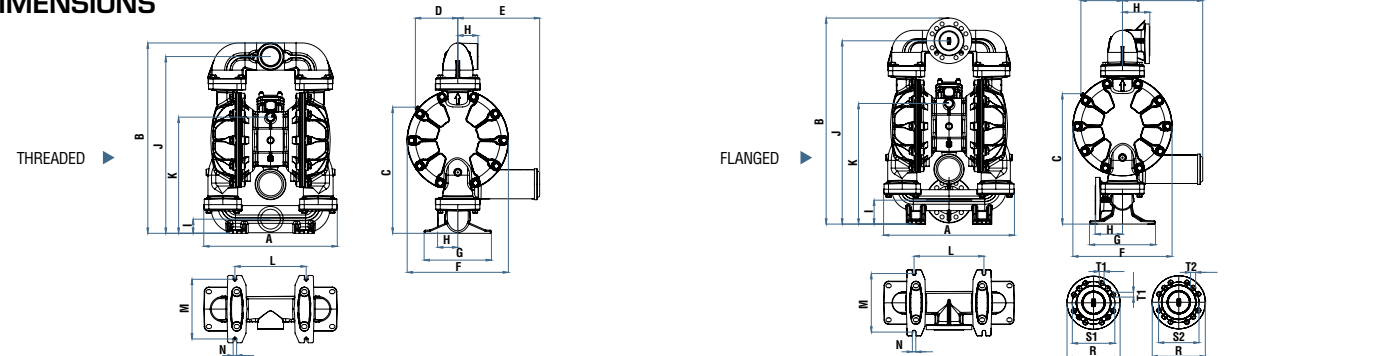
PRESSURE RATIO	1:1	
MAXIMUM FREE DELIVERY	1.000 l/min (264 US gal/min)	
AIR PRESSURE OPERATING RANGE	1,5 to 8 bar (20 to 120 psi)	
MAX. SIZE SOLIDS IN SUSPENSION	12,7 mm (1/2")	
MAXIMUM DRY SUCTION LIFT	6 m (19.7')	
MAXIMUM WET SUCTION LIFT	8 m (26.3')	
DISPLACEMENT PER CYCLE*	10,2 l (2.6 gal)	
FLUID INLET AND OUTLET CONNECTIONS	3" NPT (F) - Threaded 3" BSP (F) - Threaded 3" ANSI/DIN - Flange	
AIR INLET CONNECTION	3/4" NPT (F)	
AIR EXHAUST CONNECTION	1 1/2" NPT (F)	
SOUND LEVEL	83 dB (A) @ 50 cycles/min @ 5 bar	
WEIGHT:	Threaded	Flanged
ALUMINIUM (Central body AL)	68 kg (150 lb)	71 kg (156.5 lb)
STAINLESS STEEL (Central body AL)	120 kg (265 lb)	125 kg (276 lb)

PERFORMANCE CURVES



*Delivery per cycle depends on the diaphragms material, air inlet pressure and fluid viscosity.

DIMENSIONS



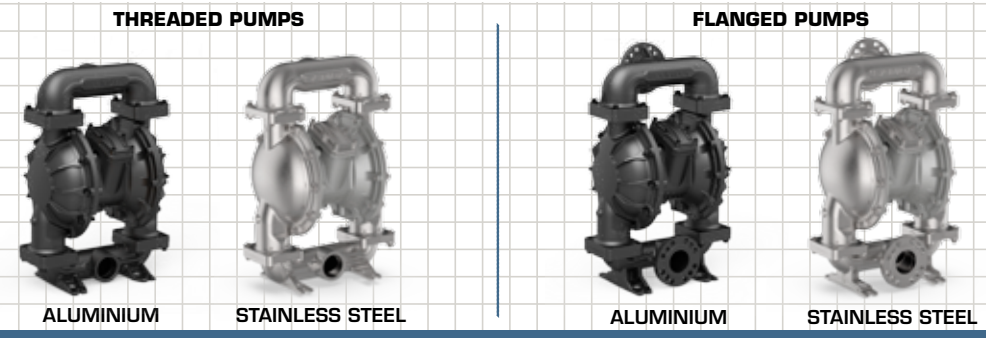
DIMENSIONS (mm)	A	B	C	D	E	F	G	H	I	J	K	L	M	N	R	S1(DIN)	S2(ANSI)	T1(DIN)	T2(ANSI)
FLANGED PUMP	575	905	579	183	353	436	290	140	105	805	536	307	257	15	200	160	152,4	21	21
THREADED PUMP	575	820	543	183	353	436	290	87	61	761	500	307	257	15	-	-	-	-	-

DIMENSIONS (inches)	A	B	C	D	E	F	G	H	I	J	K	L	M	N	R	S1(DIN)	S2(ANSI)	T1(DIN)	T2(ANSI)
FLANGED PUMP	22.64	35.63	22.80	7.21	13.90	17.17	11.42	5.51	4.13	31.69	21.10	12.09	10.12	0.59	7.87	6.30	6	0.83	0.83
THREADED PUMP	22.64	32.28	21.38	7.21	13.90	17.17	11.42	3.43	2.40	29.96	19.69	12.09	10.12	0.59	-	-	-	-	-



3"
Air-Operated
Double Diaphragm Pump

METALLIC
UP30



CONTACT US TODAY!
Visit: www.samoaindustrial.com for more information.



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R-0223 - PDF

UP30 - PIVOT Series

3" Air-operated double diaphragm pump

1.000 l/min
264 gal/min

The new SAMOA UP30 pump combines a Universal design with a unique frictionless Pivot-Shaft Air Valve to provide maximum performance and **energy efficiency**, exceeding market expectations.

UP30 Metallic pumps make the difference through:

- **HIGHER EFFICIENCY.** Maximum fluid flow with reduced air consumption.
- **INCREASED RELIABILITY.** No stall, no icing, reliable start-up and longer air valve and diaphragms life.
- **MAXIMUM VERSATILITY.** Threaded or flanged Aluminium and Stainless Steel pumps with a wide range of diaphragms, seats and balls options offer broad fluid and application compatibility. Highly suitable for outdoors and general applications with presence of abrasives.
- **EASY SERVICING.** Simplified maintenance and cleaning. Components designed for long life and reliability.
- **CONNECTIVITY.** Can be configured to connect a Smart Pump-Controller System to actuate, control and monitor your pumps.

Larger section manifolds reduce flow speed and **minimize wear** caused by abrasion.

Bolted construction utilizing same bolts for covers and manifolds for optimum sealing to **prevent leakage** and **ease maintenance**.

Long-lasting pre-formed elastomer diaphragms reduce wear and break compared to traditional designs.

Air exhaust High efficiency noise reducer included.

High-grade and grinded elastomer valve-balls, moving into formed cages, avoid wearing, weakening, and breaking.

Optimized flow path results in a **larger flow delivery**.

Air motor technology
With well proven SAMOA Frictionless Pivot-Shaft Air Valve:

- Air Valve Cartridge easy to replace.
- Superfast change-over shift.
- No dynamic seals.
- Stall prevention device (3S).
- Shorter and oversized evacuation air passages.

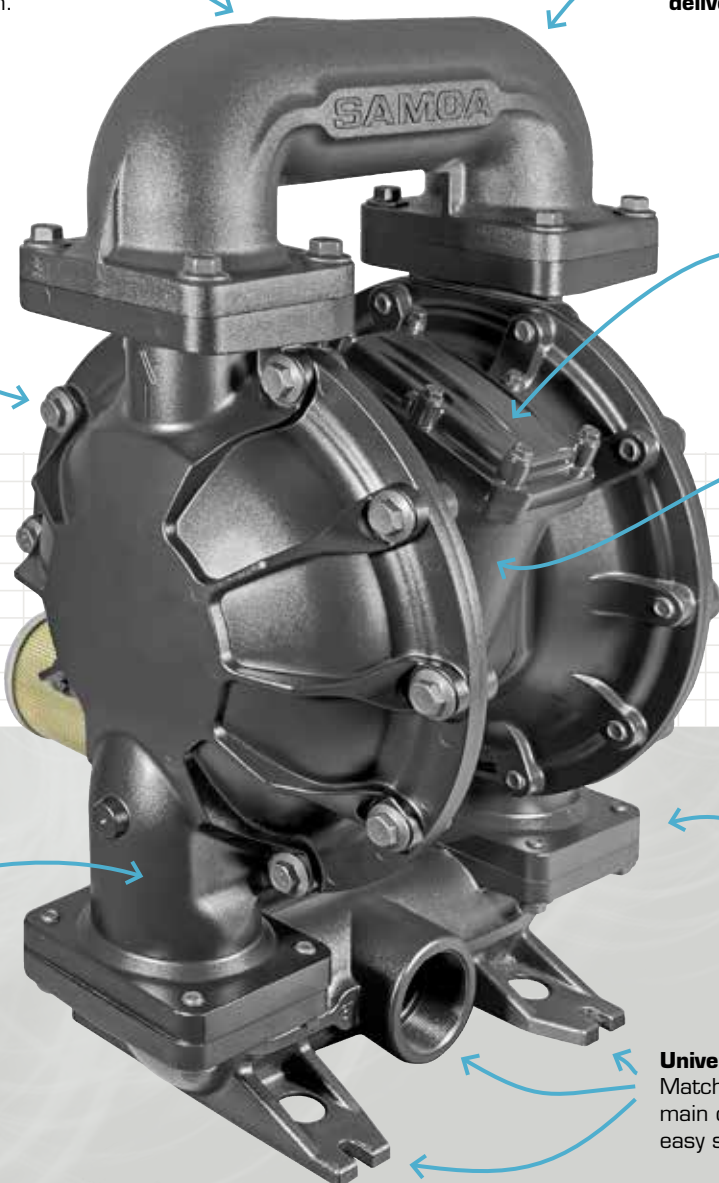
Robust air motor

- Threaded and bolted construction.
- Air cap protects valve as a shield.
- Fully groundable ATEX versions.
- Durable diaphragm shaft.

Metallic construction structure

- Electrophoretic epoxy coating in Aluminium version for enhanced corrosion resistance.
- Superior abrasion resistance.
- Stainless Steel versions for increased resistance to corrosive fluids, harsh atmospheres, high tensile, and aggressive temperatures.
- Very robust design for longer operation lifetime compared to clamped pumps.

Universal pump standards
Matches relative dimensions of main competitive brands, allowing easy swap-over.



PIVOT SERIES
UNIVERSAL DESIGN

Exclusive frictionless PIVOT-SHAFT Air Valve

Patented®



Incredibly fast changeover shift:

- High flow delivery.
- Smooth pump operation.
- Reduced flow pulsation.
- No pump vibration.
- Reduced air consumption.

Patented Smooth Start Shifter (3S):

- Low-pressure start up.
- No stall operation.

Shorter and oversized evacuation air passages:

- No icing, even during long pump runs at high pressure.
- No whistle noise.

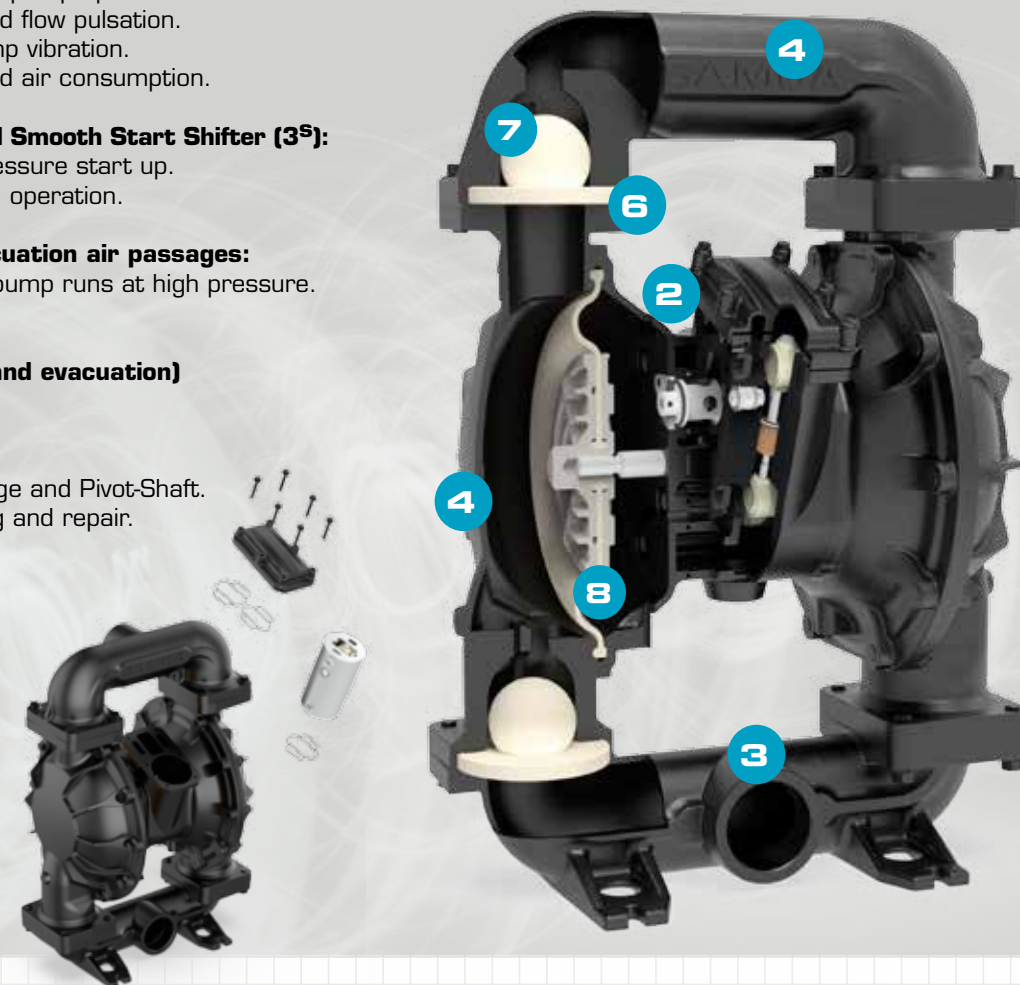
Long-life Pivot-Pads (shift and evacuation)

Modular air valve:

- Pivot-Shaft cartridge design
- Precision machined cartridge and Pivot-Shaft.
- Quick teardown for cleaning and repair.

No dynamic seals:

- No parts subject to wear.
- Reliably work with dry or humid air.
- No lubrication required.



3S
Smooth-Start-Shifter

AVAILABLE MATERIALS

SAMOA offers a wide range of material options for chemical compatibility and to withstand abrasion, temperature and fatigue caused by demanding conditions.

Example: **UP30X-XXX-XXX**

UP30X		XXX			XXX		
PUMP TYPE	AIR MOTOR	HOUSINGS			WETTED PARTS		
1 Pump Type & Size	2 Central Body & Air Chambers	3 Fluid Ports / Location Multiport manifolds: central and lateral	4 Fluid Chambers & Manifolds	5 Hardware Bolts & Inserts	6 Valve Seats	7 Valve Balls	8 Diaphragms Type & Material
UP30 Universal Pump (Bolted)	ATEX Certified A* = Aluminium	B = 3" BSP Threaded Ports / Centre Horizontal C = 3" ANSI/DIN Flanged Ports / Centre Horizontal N = 3" NPTF Threaded Ports / Centre Horizontal	ATEX Certified A* = Aluminium S* = Stainless Steel	C = Carbon Steel S = Stainless Steel	A = Aluminium D = AISI 440 Hardened Stainless Steel H = Hytrel® M = Santoprene® N = Nitrile (Buna-N) S = AISI 316 Stainless Steel	H = Hytrel® M = Santoprene® N = Nitrile (Buna-N) S = AISI 316 Stainless Steel T = PTFE (Teflon®) V = FKM (Viton®)	Conventional A = Santoprene® C = Hytrel® G = Nitrile (Buna-N) V = FKM (Viton®) Two-piece Z = PTFE (Teflon® with Santoprene backer)

* **ATEX Certified pumps** for use in hazardous locations ATEX Group II 2GDx.

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