

Uni-Pump Specifications

Explanation of Model No.:

UPV -- 1 A -- 16 N 1 -- 1.5 * -- 4 * * -- *20(40)

Design No. 20: PVS-1B 0.75 - 5.5kW; 1 hp - 7 hp
PVS-2B 3.7 - 7.5kW; 5 hp - 10 hp
40: PVS-0B 0.75 - 3.7kW; 1 hp - 5 hp
*E: Unified Thread

Auxiliary symbol None: Side port type; Z: Axial port type (PVS-1B, 2B)

M: 230 Volt

G: 460 Volt

Symbol None: 200 Volt

Number of motor poles 4: 4 poles

Motor terminal None: Right side viewed from pump side
A: Left side viewed from pump side

Motor output 0.7: 0.75 kW (1hp) 3.7: 3.7kW; (5hp) Note: UPV-^{OA}_{1A} is 0.75-5.5kW; (1 hp - 7 hp)
1.5: 1.5 kW (2hp) 5.5: 5.5kW; (7hp) UPV-2A is 3.7-7.5kW; (5 hp - 10 hp)
2.2: 2.2 kW (3hp) 7.5: 7.5kW; (10hp)

Pressure adjustment range

0: 286-500 psi

1: 286-1000 psi

2: 429-2000 psi

3: 429-3000 psi

Note: Not available at 45 cm³/rev

Variable control mechanism

N: pressure compensation type

(Note) Control option is also standard on the PVS pump.

Max. pump capacity (cm³/rev)

Nominal 8, 16, 22, 35, 45

Motor mounting method

Mounting foot type

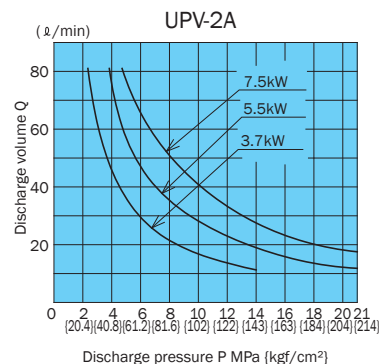
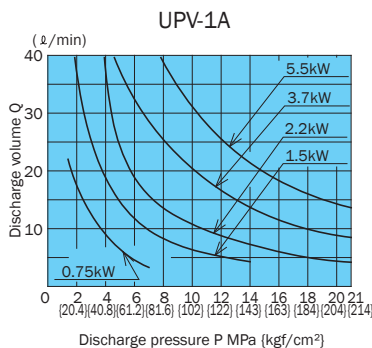
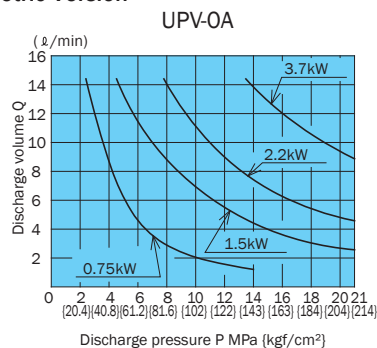
Pump size 0: PVS-0B, 1: PVS-1B, 2: PVS-2B

PVS series uni-pump

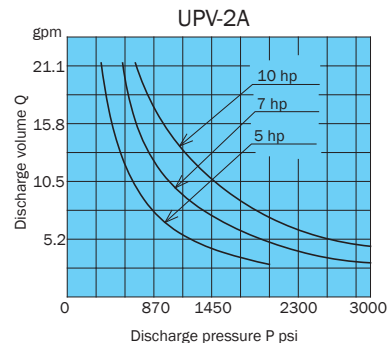
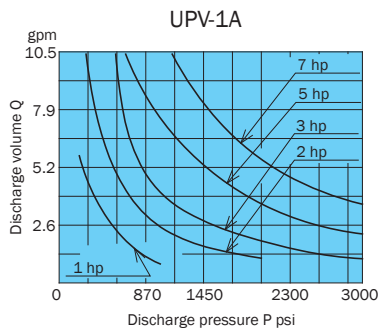
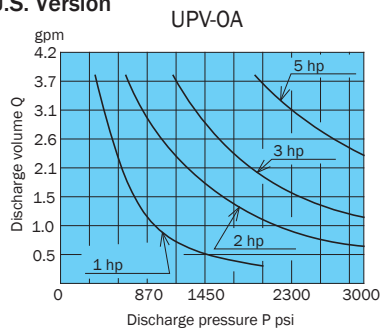
*This Uni-Pump is the metric version from Japan

Motor selection curves

Metric Version



U.S. Version



• How to select the motor

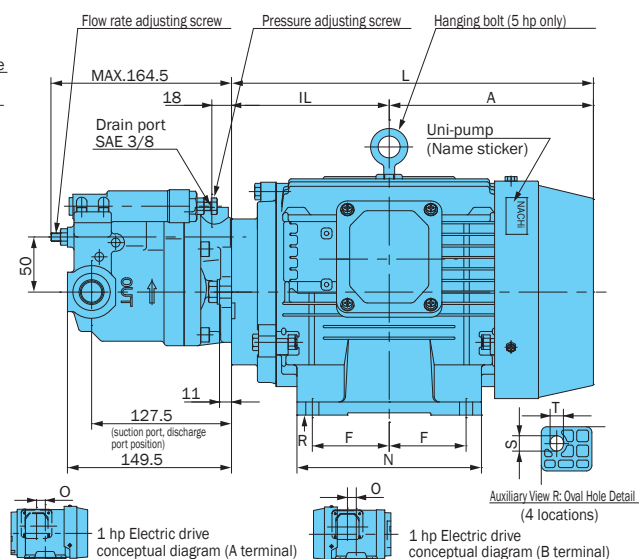
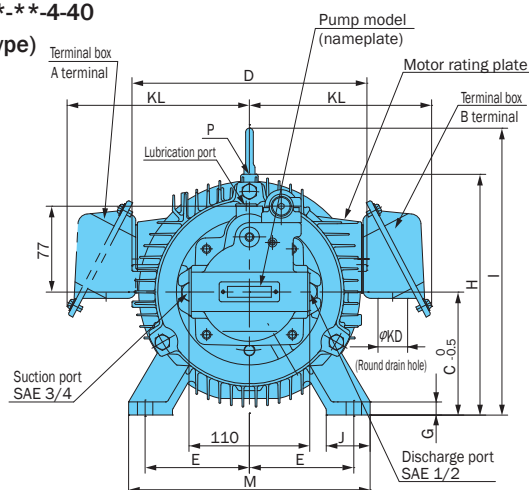
The lower side of the output curves for each of the motors shown above indicates the operating range under rated output for that motor.

* Select a uni-pump that has a pressure and flow rate that is within the range of the drive so that the drive will not overload

Installation Dimension Drawings

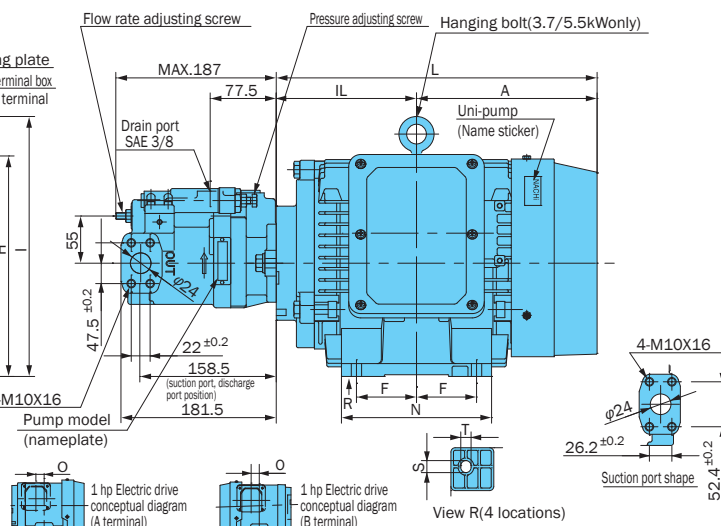
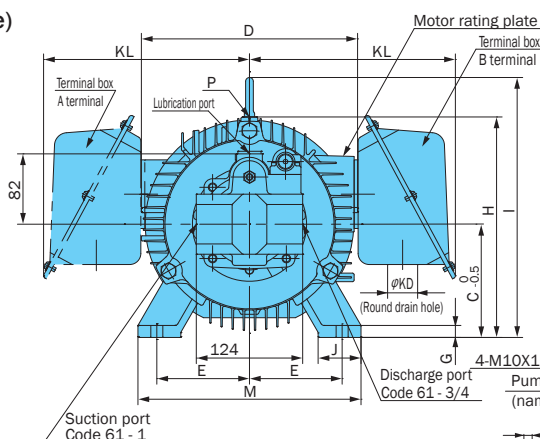
UPV-0A-8***-4-40

(side port type)



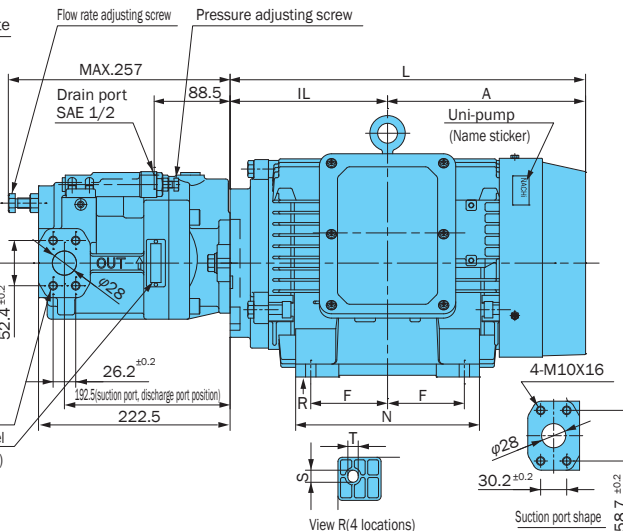
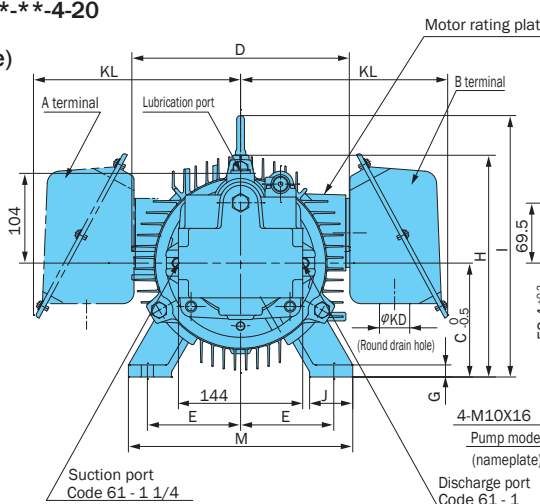
UPV-1A-16***-4-20

(side port type)



UPV-2A-35***-4-20

(side port type)



*These Pumps are Metric Versions from Japan

1. Drive motor is fully enclosed fan cooled, 1 to 5 hp is E type, and 7 to 10 hp is B type.
2. Standard voltage for drive motor is 200 VAC, 50/60 Hz or 220 VAC, 60 Hz; EM - 230 VAC, EG - 460 VAC
3. Viewed from the pump side, suction port is on the left and discharge port is on the right.
4. Broken lines indicate instances for the A terminal. Broken lines pass through to the other side of the pump along its center.

Note: A terminal measurements are in parentheses ().

Motor Specifications

Output hp	Motor Dimensions																	Frame No.	Weight lbs
	A	IL	C	D	E	F	G	H	I	J	L	M	N	S×T	KD	KL	O		
1	133	107.5	80	170	62.5	50	4.5	165	–	35	240.5	165	130	18×10	φ27	157	27.5	80M	14.5
2	143	118.5	90	198	70	62.5	10	190	–	40	261	176	150	12×10	φ27	159	–	90L	16
3	157.5	133	100	198	80	70	12	200	–	40	290.5	200	168	14×12	φ27	159	–	100L	21
5	186	143.5	112	214	95	70	12	–	261	40	329.5	220	168	14×12	φ27	166	–	112M	27
7	210.5	163.5	132	252	108	70	15	–	303	50	374	260	175	14×12	φ85	240	–	132S	42
10	229.5	182.5	132	252	108	89	15	–	303	50	412	260	213	14×12	φ85	240	–	132M	48

Characteristics of drive motor for unipump (domestic standard 3 rating)

Output hp	Poles	(Note1) Model Number TYPE (N)	Voltage [V]	Frequency [Hz]	Current rating [A]	RPM rating [min ⁻¹]	Heat resistance
.5	4	VBDA (VDS series only)	200	50	2.2	1400	B
			200	60	2.0	1680	
			230-460	60	2.0	1710	
1	4	V*DA-*A4*07	200	50	3.8	1410	B
			200	60	3.4	1690	
			230-460	60	3.4	1720	
2	4	V*DA-*A4*15	200	50	7.0	1410	B
			200	60	6.2	1690	
			230-460	60	6.0	1710	
3	4	V*DA-*A4*22	200	50	9.8	1400	B
			200	60	8.9	1680	
			230-460	60	8.5	1710	
5	4	V*DA-*A4*37	200	50	16.0	1410	B
			200	60	14.8	1690	
			230-460	60	14.0	1710	
7	4	V*DA-*A4*55	200	50	23.8	1430	B
			200	60	21.0	1730	
			230-460	60	20.0	1740	
10	4	V*DA-*A4*75	200	50	31.8	1435	B
			200	60	28.2	1730	
			230-460	60	27.0	1740	

- The asterisks * indicate variations in the hydraulic pump series, size, and position of terminal box.
Check the ratings sticker on the top of the drive motor.
- Contact us for variations in voltage.