

SAM POONG

SAM POONG SUS PUMP



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SAM POONG
SAM POONG SUS PUMP

Acid-Resistance PUMP & Stainless PUMP



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COMPLIMENTS

- SAM POONG SUS PUMP WITH 40 YEARS' TRADITION IS TRUSTWORTHY IS TRUSTWORTHY TO USE
- SAM POONG PRODUCE AND SELL GOODS WITH A STRONG BELIEF OF PERFORMANCE AND LIFE

ESTABLISHMENT : 2ND SEP, 1966 SAM POONG SUS PUMP



SAM POONG SUS PUMP

- No vibration
- Little noise.
- Refined & Neat shape.
- Precision Instrument
- Low electric power consumption.
- Various models & Various choice
- Easy to make an installation in small space.
- All products are standardized goods. So it is easy to replace parts.
- Possible to use for all food due to clean inside.



SPW SUS PUMP Series



SPJ SUS PUMP Series



SPBF SUS PUMP Series



SPS SUS PUMP Series



SPTB SUS PUMP



● **SPW : Wesco PUMP**



Left



Front



Right

● **SPW Records**

Description	Pressure (kg/cm ²)	Q' ty per minute (l /min)
15A × 1/4HP Max. Pressure : 0.9 kg/cm ²	0	45
	0.2	30
	0.3	20
	0.7	10
20A × 1/2HP Max. Pressure : 1.7 kg/cm ²	0	65
	0.3	55
	0.5	45
	0.8	35
	1	25
	1.3	20
25A × 1HP Max. Pressure : 2.5 kg/cm ²	0	100
	0.5	65
	1	62
	1.5	40
	1.8	30
25A × 2HP Max. Pressure : 2.9 kg/cm ²	2	20
	0	150
	0.5	115
	1	95
	1.5	70
40A × 2HP Max. Pressure : 2.5 kg/cm ²	2	45
	2.5	30
	0	340
	0.5	300
	1	275
40A × 3HP Max. Pressure : 3.2 kg/cm ²	1.5	220
	2	140
	0	350
	0.5	310
	1	300
50A × 5HP Max. Pressure : 3.2 kg/cm ²	1.5	260
	2	230
	2.5	175
	3	75
	0	580
50A × 7.5HP Max. Pressure : 4 kg/cm ²	0.5	560
	1	500
	1.5	450
	2	380
	2.5	300
50A × 10HP Max. Pressure : 5.6 kg/cm ²	0	590
	0.5	570
	1	560
	1.5	530
	2	490
	2.5	470
	3	360
	3.5	320
80A × 15HP Max. Pressure : 6 kg/cm ²	3.8	200
	1	650
	3	500
	4	380
	4.5	320
	4.8	260
	5	230
	5.2	200
15A × 1HP (2Pole) Max. Pressure : 3 kg/cm ²	5.4	150
	0	60
	0.5	50
	1	40
	1.5	30
	2	20
	2.5	13
	0	130
20A × 3HP (2Pole) Max. Pressure : 5.7 kg/cm ²	1	110
	2	100
	3	75
	4	45
	5	20
20A × 5HP (2Pole) Max. Pressure : 9.5 kg/cm ²	3	86
	4	80
	5	78
	6	65
	7	50
25A × 3HP (2Pole) Max. Pressure : 6.5 kg/cm ²	8	34
	9	11
	0	130
	1	110
	2	100
25A × 5HP (2Pole) Max. Pressure : 6 kg/cm ²	3	80
	4	55
	5	35
	6	20
	2	140
25A × 7.5HP (2Pole) Max. Pressure : 7.5 kg/cm ²	3	100
	4	80
	5	50
	5.5	25
	2	190
25A × 10HP (2Pole) Max. Pressure : 9 kg/cm ²	3	175
	4	170
	5	150
	6	120
	6.5	100
	1	220
	2	210
25A × 15HP Max. Pressure : 6 kg/cm ²	3	200
	4	190
	5	180
	6	165
	7	125
	0	680
	1	680
25A × 2HP Max. Pressure : 2.5 kg/cm ²	1.5	650
	2	630
	2.5	620
	3	600
	3.5	590
	4	580
	4.5	520
25A × 5HP Max. Pressure : 2.9 kg/cm ²	5	480
	5.5	350
	5.8	250
	0	60
	0.5	50
	1	40
	1.5	30
25A × 10HP Max. Pressure : 5.6 kg/cm ²	2	20
	2.5	13
	0	130
	1	110
	2	100
	3	75
	4	45
25A × 15HP Max. Pressure : 6 kg/cm ²	5	20
	3	86
	4	80
	5	78
	6	65
	7	50
	8	34
25A × 20HP Max. Pressure : 8.5 kg/cm ²	9	11
	0	130
	1	110
	2	100
	3	80
	4	55
	5	35
25A × 30HP Max. Pressure : 11 kg/cm ²	6	20
	2	140
	3	100
	4	80
	5	50
	5.5	25
	2	190
25A × 40HP Max. Pressure : 14 kg/cm ²	3	175
	4	170
	5	150
	6	120
	6.5	100
	1	220
	2	210
25A × 50HP Max. Pressure : 16 kg/cm ²	3	200
	4	190
	5	180
	6	165
	7	125
	0	680
	1	680
25A × 60HP Max. Pressure : 18 kg/cm ²	1.5	650
	2	630
	2.5	620
	3	600
	3.5	590
	4	580
	4.5	520
25A × 70HP Max. Pressure : 20 kg/cm ²	5	480
	5.5	350
	5.8	250
	0	60
	0.5	50
	1	40
	1.5	30
25A × 80HP Max. Pressure : 22 kg/cm ²	2	20
	2.5	13
	0	130
	1	110
	2	100
	3	75
	4	45
25A × 90HP Max. Pressure : 24 kg/cm ²	5	20
	3	86
	4	80
	5	78
	6	65
	7	50
	8	34
25A × 100HP Max. Pressure : 26 kg/cm ²	9	11
	0	130
	1	110
	2	100
	3	80
	4	55
	5	35
25A × 110HP Max. Pressure : 28 kg/cm ²	6	20
	2	140
	3	100
	4	80
	5	50
	5.5	25
	2	190
25A × 120HP Max. Pressure : 30 kg/cm ²	3	175
	4	170
	5	150
	6	120
	6.5	100
	1	220
	2	210
25A × 130HP Max. Pressure : 32 kg/cm ²	3	200
	4	190
	5	180
	6	165
	7	125
	0	680
	1	680
25A × 140HP Max. Pressure : 34 kg/cm ²	1.5	650
	2	630
	2.5	620
	3	600
	3.5	590
	4	580
	4.5	520
25A × 150HP Max. Pressure : 36 kg/cm ²	5	480
	5.5	350
	5.8	250
	0	60
	0.5	50
	1	40
	1.5	30
25A × 160HP Max. Pressure : 38 kg/cm ²	2	20
	2.5	13
	0	130
	1	110
	2	100
	3	75
	4	45
25A × 170HP Max. Pressure : 40 kg/cm ²	5	20
	3	86
	4	80
	5	78
	6	65
	7	50
	8	34
25A × 180HP Max. Pressure : 42 kg/cm ²	9	11
	0	130
	1	110
	2	100
	3	80
	4	55
	5	35
25A × 190HP Max. Pressure : 44 kg/cm ²	6	20
	2	140
	3	100
	4	80
	5	50
	5.5	25
	2	190
25A × 200HP Max. Pressure : 46 kg/cm ²	3	175
	4	170
	5	150
	6	120
	6.5	100
	1	220
	2	210
25A × 210HP Max. Pressure : 48 kg/cm ²	3	200
	4	190
	5	180
	6	165
	7	125
	0	680
	1	680
25A × 220HP Max. Pressure : 50 kg/cm ²	1.5	650
	2	630
	2.5	620
	3	600
	3.5	590
	4	580
	4.5	520
25A × 230HP Max. Pressure : 52 kg/cm ²	5	480
	5.5	350
	5.8	250
	0	60
	0.5	50
	1	40
	1.5	30
25A × 240HP Max. Pressure : 54 kg/cm ²	2	20
	2.5	13
	0	130
	1	110
	2	100
	3	75
	4	45
25A × 250HP Max. Pressure : 56 kg/cm ²	5	20
	3	86
	4	80
	5	78
	6	65
	7	50
	8	34
25A × 260HP Max. Pressure : 58 kg/cm ²	9	11
	0	130
	1	110
	2	100
	3	80
	4	55
	5	35
25A × 270HP Max. Pressure : 60 kg/cm ²	6	20
	2	140
	3	100
	4	80
	5	50
	5.5	25
	2	190
25A × 280HP Max. Pressure : 62 kg/cm ²	3	175
	4	170
	5	150
	6	120
	6.5	100
	1	220
	2	210
25A × 290HP Max. Pressure : 64 kg/cm ²	3	200
	4	190
	5	180
	6	165
	7	125
	0	680
	1	680
25A × 300HP Max. Pressure : 66 kg/cm ²	1.5	650
	2	630
	2.5	620
	3	600
	3.5	590
	4	580
	4.5	520
25A × 310HP Max. Pressure : 68 kg/cm ²	5	480
	5.5	350
	5.8	250
	0	60
	0.5	50
	1	40
	1.5	30
25A × 320HP Max. Pressure : 70 kg/cm ²	2	20
	2.5	13
	0	130
	1	110
	2	100
	3	75
	4	45
25A × 330HP Max. Pressure : 72 kg/cm ²	5	20
	3	86
	4	80
	5	78
	6	65
	7	50
	8	34
25A × 340HP Max. Pressure : 74 kg/cm ²	9	11
	0	130
	1	110
	2	100
	3	80
	4	55
	5	35
25A × 350HP Max. Pressure : 76 kg/cm ²	6	20
	2	140
	3	100
	4	80
	5	50
	5.5	25
	2	190

● SPS : Centrifugal PUMP



Left



Front



Right

● SPS Records

Description	Pressure (kg/cm ²)	Q' ty per minute (l /min)
20A × 1/4HP Max. Pressure : 0.4 kg/cm ²	0	65
	0.2	50
	0.3	35
25A × 1/2HP Max. Pressure : 0.8 kg/cm ²	0	100
	0.3	80
	0.5	60
	0.6	50
25A × 1HP Max. Pressure : 0.8 kg/cm ²	0	133
	0.3	120
	0.5	82
	0.6	64
40A × 1HP Max. Pressure : 0.9 kg/cm ²	0	300
	0.3	300
	0.5	200
	0.7	120
	0.8	60
40A × 2HP Max. Pressure : 1 kg/cm ²	0	400
	0.3	350
	0.5	330
	0.7	210
	0.8	140
	0.9	50
50A × 2HP Max. Pressure : 1.3 kg/cm ²	0	630
	0.3	550
	0.5	480
	0.8	350
	1.0	175
50A × 3HP Max. Pressure : 1.3 kg/cm ²	0	650
	0.3	550
	0.5	480
	0.8	350
	1	270
	1.1	150
65A × 3HP Max. Pressure : 1.3 kg/cm ²	0	750
	0.3	670
	0.5	570
	0.8	470
	1	340
	1.2	200

Description	Pressure (kg/cm ²)	Q' ty per minute (l /min)
80A × 5HP Max. Pressure : 1.6 kg/cm ²	0	1290
	0.3	1290
	0.5	1100
	0.8	870
	1	800
	1.3	650
80A × 7.5HP Max. Pressure : 1.65 kg/cm ²	1.4	400
	0.5	1200
	0.8	1200
	1	1100
	1.3	860
100A × 10HP Max. Pressure : 2.5 kg/cm ²	1.5	600
	0	1450
	0.5	1250
	1	1200
	1.5	1050
	2	650
100A × 15HP Max. Pressure : 3.2 kg/cm ²	2.3	480
	0	1950
	0.5	1800
	1	1620
	1.5	1500
	2	1300
25A × 2HP (2Pole) Max. Pressure : 3.1 kg/cm ²	2.5	1150
	3	850
	0	250
	1	220
	2	130
	2.5	100
40A × 2HP (2Pole) Max. Pressure : 3.1 kg/cm ²	2.8	40
	1.0	380
	1.5	300
	1.8	220
40A × 5HP (2Pole) Max. Pressure : 3.2 kg/cm ²	2.0	130
	0	600
	1	600
	2	500
50A × 10HP (2Pole) Max. Pressure : 4.8 kg/cm ²	2.5	300
	3	150
	3	700
	3.5	600
	4	500
	4.5	200

● **SPJ : Self-Priming PUMP**



Left



Front



Right

● **SPJ Records**

Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)
25A × 1/2HP Max. Pressure : 0.9 kg/cm ²	0	120
	0.3	110
	0.5	100
	0.6	75
	0.7	50
25A × 1HP Max. Pressure : 1 kg/cm ²	0	125
	0.3	120
	0.5	110
	0.7	75
	0.9	45
40A × 1HP Max. Pressure : 1.1 kg/cm ²	0	300
	0.3	265
	0.5	250
	0.7	200
	0.8	185
40A × 2HP Max. Pressure : 1.1 kg/cm ²	1	110
	0	330
	0.3	285
	0.5	270
	0.8	200
50A × 2HP Max. Pressure : 1.3 kg/cm ²	1	140
	0	510
	0.3	480
	0.5	400
	0.8	300
50A × 3HP Max. Pressure : 1.3kg/cm ²	1.0	280
	1.1	200
	0	510
	0.3	480
	0.5	440
50A × 5HP Max. Pressure : 1.5 kg/cm ²	0.8	360
	1	320
	1.2	200
	0	600
	0.3	570
80A × 5 HP Max. Pressure : 2.2 kg/cm ²	0.5	500
	0.8	440
	1	340
	1.2	220
	1.3	170

Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)
80A × 5 HP Max. Pressure : 2.2 kg/cm ²	0	1000
	0.5	950
	1	850
	1.5	750
	1.8	500
80A × 7.5HP Max. Pressure : 2.3 kg/cm ²	2	370
	0	1100
	0.5	1000
	1	900
	1.5	800
25A × 3HP (2Pole) Max. Pressure : 3 kg/cm ²	1.8	500
	2	400
	1.0	250
	1.5	190
	2.0	160
40A × 5HP (2Pole) Max. Pressure : 4.2 kg/cm ²	2.5	115
	0.5	400
	1	375
	1.5	355
	2	325
40A × 7.5HP (2Pole) Max. Pressure : 4.2 kg/cm ²	2.5	225
	3	145
	3.5	75
	4	30
	0.5	500
50A × 7.5HP (2Pole) Max. Pressure : 3.1 kg/cm ²	1	500
	1.5	450
	2	345
	2.5	285
	3	195
50A × 10HP (2Pole) Max. Pressure : 4.4 kg/cm ²	3.5	100
	4	80
	4.5	40
	1	700
	1.5	580

● **SPBF : Vacuum -Suction PUMP**



● **SPBF Records**

Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)	Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)
20A × 1/2HP Max. Pressure : 0.7 kg/cm ²	0	50	40A × 3HP (2Pole) Max. Pressure : 1.3 kg/cm ²	0	270
	0.2	40		0.3	240
	0.4	30		0.5	220
	0.6	20		0.7	180
25A × 1HP Max. Pressure : 1 kg/cm ²	0	100	20A × 2HP (2Pole) Max. Pressure : 3 kg/cm ²	0	111
	0.2	70		0.5	100
	0.4	50		1.5	60
	0.6	30		2.5	24
	0.7	20	25A × 5HP (2Pole) Max. Pressure : 3.8 kg/cm ²	1.0	150
40A × 2HP Max. Pressure : 1.2 kg/cm ²	0	200		1.5	120
	0.5	150		2.5	70
	0.9	90		3.5	15

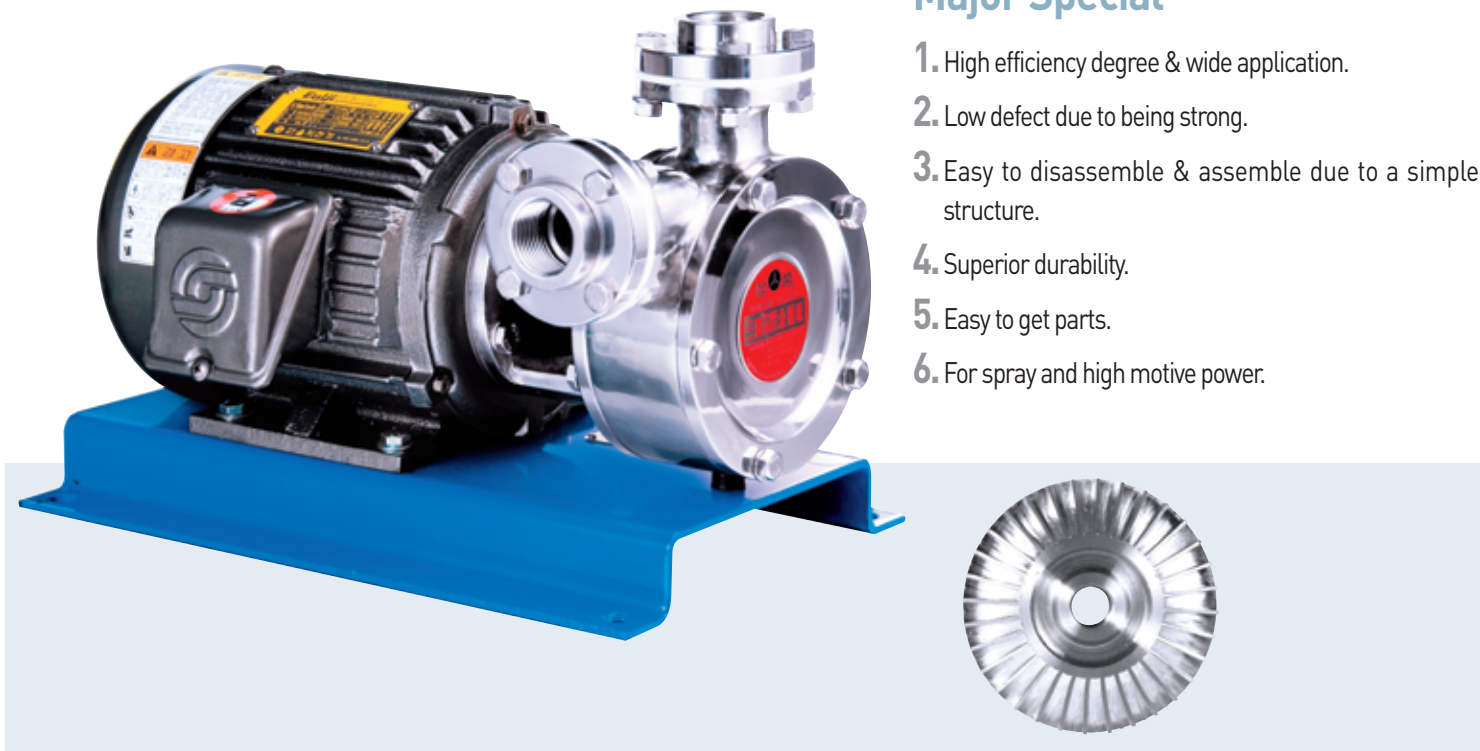
● **SPTB : Turbine PUMP**



● **SPTB Records**

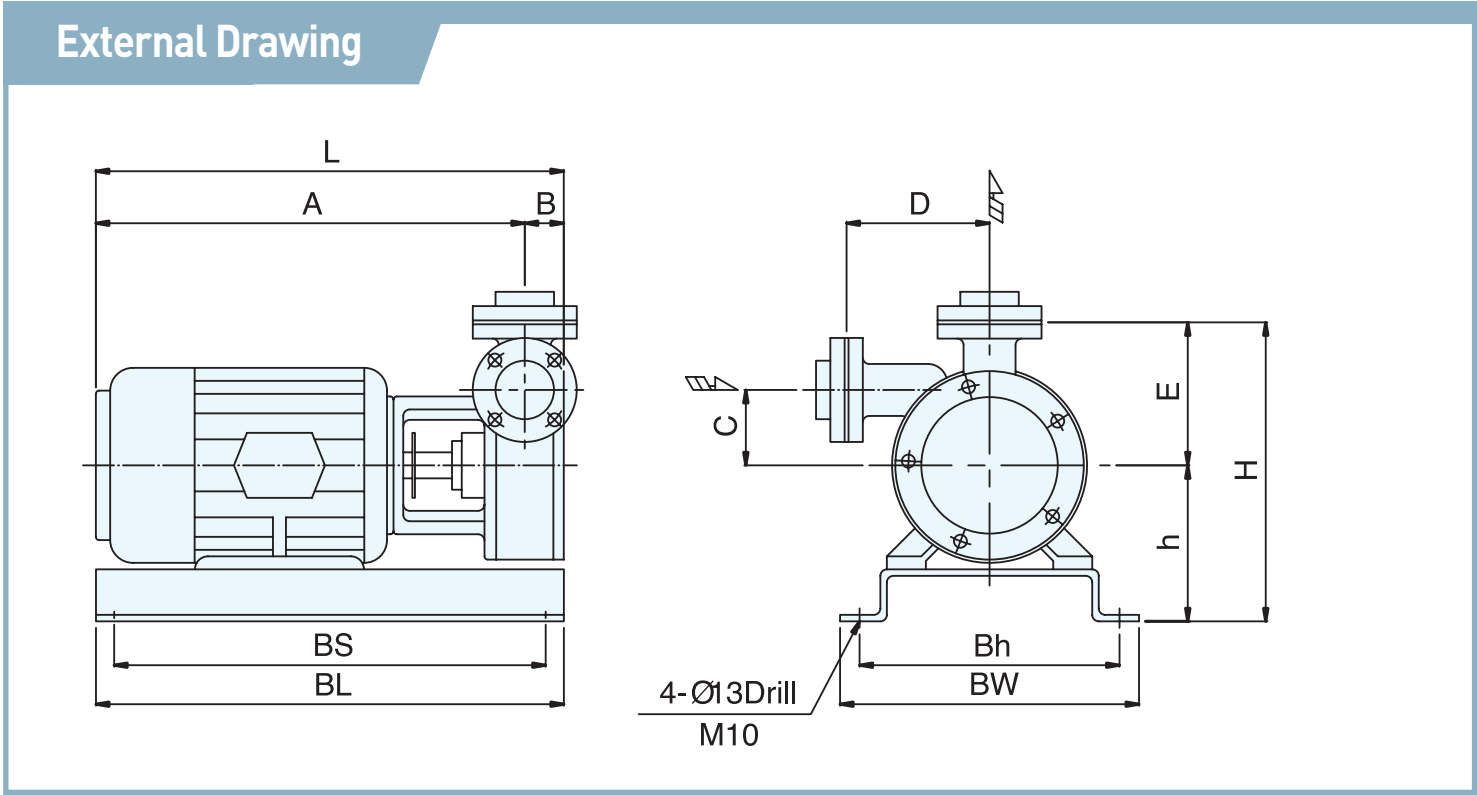
Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)	Description	Pressure (kg/cm ²)	Q' ty per minute (ℓ /min)
40A × 3HP Max. Pressure : 2.5 kg/cm ²	1.5	380	50A × 7.5HP Max. Pressure : 3.1 kg/cm ²	0	700
	2	300		0.5	700
	2.2	250		1	680
50A × 5HP Max. Pressure : 2.7 kg/cm ²	0	680		1.5	670
	0.5	580		2	650
	1	650		2.5	620
	1.5	620		2.8	380
	2	550		3	300
	2.5	400			

● SPW SUS 304~316 PUMP



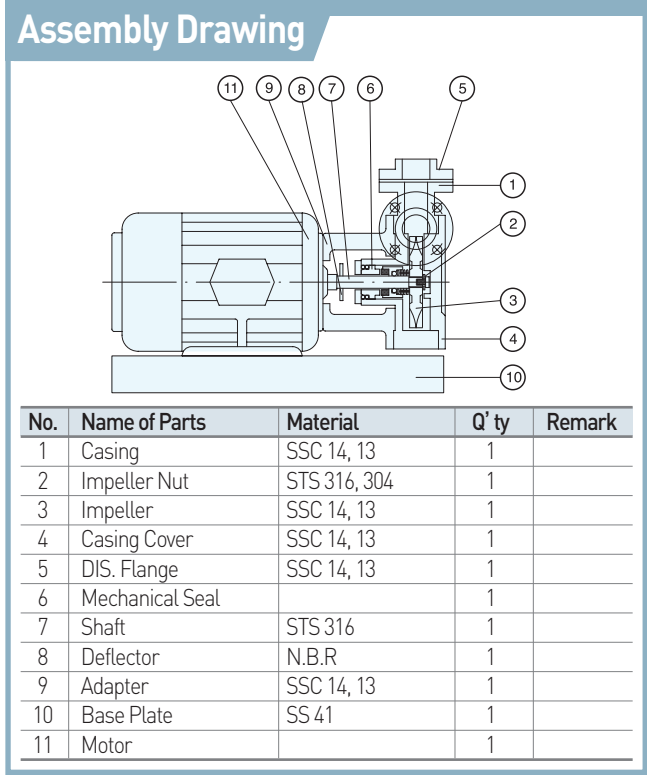
Major Special

- 1. High efficiency degree & wide application.
- 2. Low defect due to being strong.
- 3. Easy to disassemble & assemble due to a simple structure.
- 4. Superior durability.
- 5. Easy to get parts.
- 6. For spray and high motive power.



SPW Specification

Description & Specification		L	A	B	C	D	E	h	H	BL	BS	BW	Bh	Base
15A	3Phase 1/4 HP 4Pole	320	295	25	38	85	83	110	193	310	280	230	200	40
	3Phase 1 HP 2Pole	355	330	25	38	85	83	114	197	310	280	230	200	40
20A	3Phase 1/2 HP 4Pole	340	310	30	41	95	95	116	211	310	280	230	200	40
	3Phase 3 HP 2Pole	398	368	30	41	95	95	137	232	400	365	250	220	40
25A	3Phase 5 HP 2Pole	432	402	30	41	95	95	178	273	410	385	323	298	65
	3Phase 1 HP 4Pole	360	327	33	58	110	110	120	230	360	330	230	200	40
	3Phase 2 HP 4Pole	406	373	33	58	110	110	130	240	400	365	250	220	40
	3Phase 3 HP 2Pole	398	368	30	41	95	95	137	232	400	365	250	220	40
	3Phase 5 HP 2Pole	432	402	30	41	95	95	178	273	410	385	323	298	65
40A	3Phase 7.5 HP 2Pole	483	450	33	58	110	110	200	310	460	435	345	320	65
	3Phase 10 HP 2Pole	531	498	33	58	110	110	200	310	460	435	345	320	65
	3Phase 2 HP 4Pole	415	380	35	70	140	138	132	270	400	365	250	220	40
50A	3Phase 3 HP 4Pole	435	400	35	70	140	138	180	318	410	385	323	298	65
	3Phase 5 HP 4Pole	450	405	45	78	160	158	179	337	410	385	323	298	65
80A	3Phase 7.5 HP 4Pole	498	453	45	78	160	158	199	357	460	435	345	320	65
	3Phase 10 HP 4Pole	537	492	45	78	160	158	199	357	460	435	345	320	65
80A	3Phase 15 HP 4Pole	635	580	55	82	175	175	260	435	535	480	315	280	100
	3Phase 20HP 4Pole	80	625	55	82	175	175	260	435	630	533	315	280	100

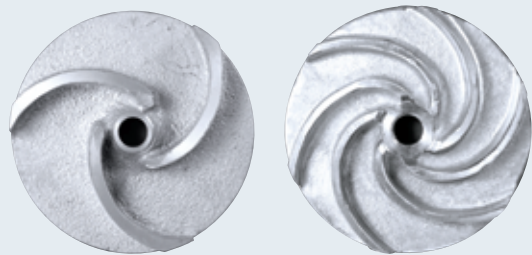


● SPS SUS 304~316 PUMP

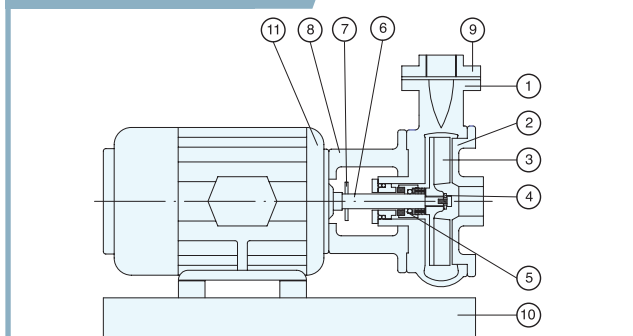


Major Special

- 1. High efficiency degree & wide application.
- 2. Low defect due to being strong.
- 3. Easy to disassemble & assemble due to a simple structure.
- 4. Superior durability.
- 5. Easy to get parts.
- 6. Easy to pass residue due to impeller is open-typed.
- 7. For circulatory and low motive power



Assembly Drawing



No.	Name of Parts	Material	Q'ty	Remark
1	Casing	SSC 14, 13	1	
2	Suction Cover	SSC 14, 13	1	
3	Impeller	SSC 14, 13	1	
4	Impeller Nut	STS 316, 304	1	
5	Mechanical Seal		1	
6	Shaft	STS 316	1	
7	Deflector	N.B.R	1	
8	Adapter	SSC 14, 13	1	
9	DIS. Flange	SSC 14, 13	1	
10	Base Plate	SS 41	1	
11	Motor		1	

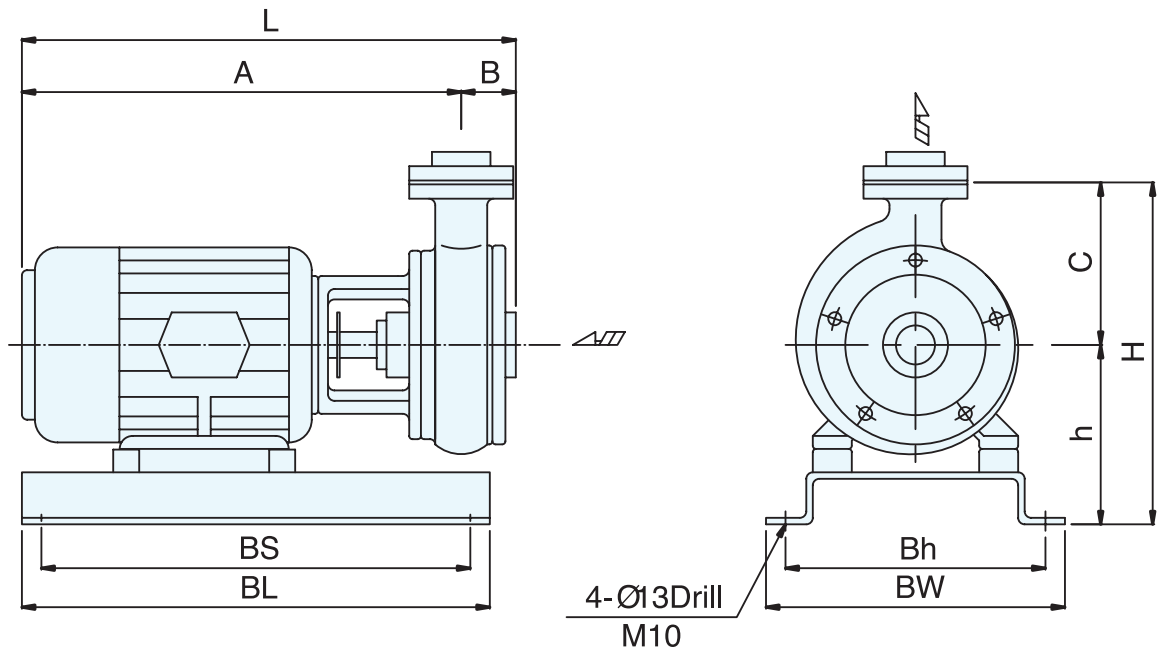
SPW Parts



Parts

- ① Casing
- ② Front Cover
- ③ Middle Flange
- ④ Impeller
- ⑤ Shaft
- ⑥ Gland
- ⑦ Flange
- ⑧ Deflector

External Drawing



SPS Specification

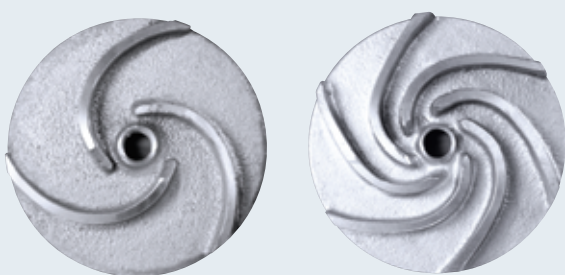
Description & Specification		L	A	B	C	h	H	BL	BS	BW	Bh	Base
20A	3Phase 1/4 HP 4Pole	350	305	45	110	110	220	310	280	230	200	40
	3Phase 1/2 HP 4Pole	365	320	45	130	135	265	310	280	230	200	40
25A	3Phase 1 HP 4Pole	382	337	45	130	130	260	360	330	230	200	40
	3Phase 2 HP 2Pole	422	377	45	130	130	260	400	365	250	220	40
40A	3Phase 1 HP 4Pole	400	340	60	140	145	285	360	330	230	200	40
	3Phase 2 HP 4Pole	443	383	60	140	143	283	400	365	250	220	40
	3Phase 5 HP 2Pole	486	426	60	140	178	318	410	385	323	298	65
50A	3Phase 2 HP 4Pole	453	388	65	177	180	357	410	385	323	298	65
	3Phase 3 HP 4Pole	475	410	65	177	190	367	410	385	323	298	65
65A	3Phase 3 HP 4Pole	470	405	65	177	190	367	410	385	323	298	65
	3Phase 5 HP 4Pole	485	420	65	177	190	367	410	385	323	298	65
80A	3Phase 5 HP 4Pole	500	420	80	200	220	420	410	385	323	298	65
	3Phase 7.5 HP 4Pole	558	478	80	200	220	420	460	435	345	320	65
100A	3Phase 10 HP 4Pole	570	490	80	220	250	470	560	525	345	320	65
	3Phase 15 HP 4Pole	665	585	80	220	240	460	600	564	370	345	65

● SPJ SUS 304~316 PUMP

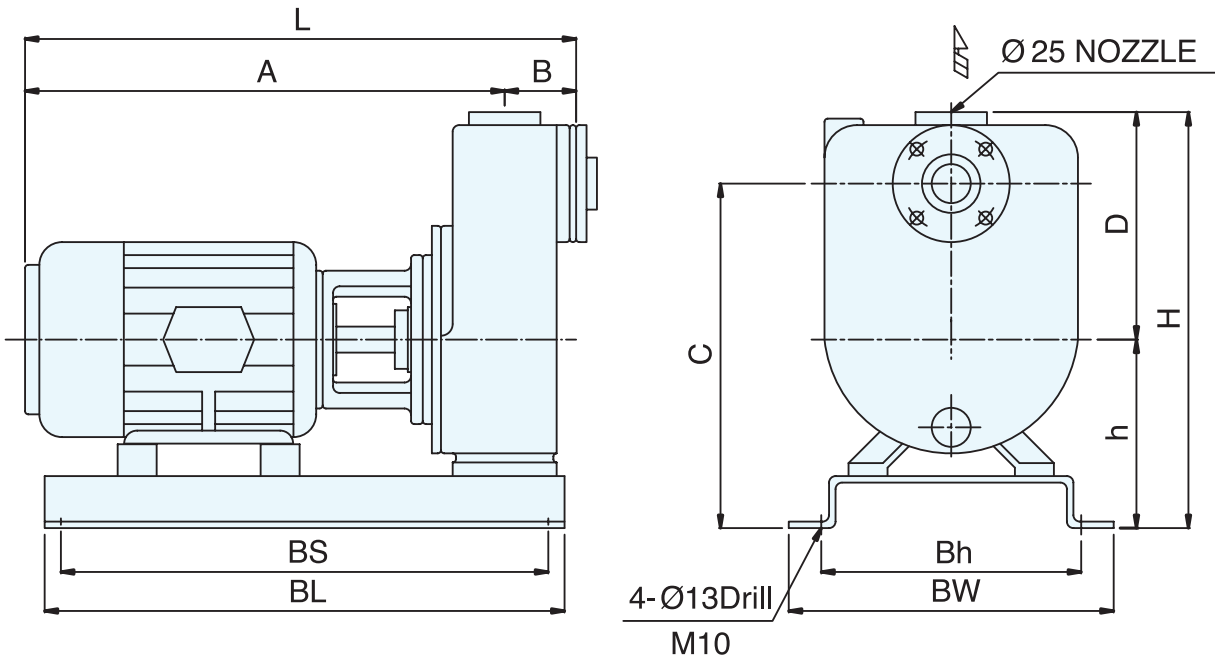


Major Special

- 1. SPJ Pump is used without check valve. It is for sewage disposal because that impeller is open-typed.
- 2. Self-priming space is extensive in pump, so it takes short time in suction.
- 3. If operation is started once, it will be free to make a quick pumping job.



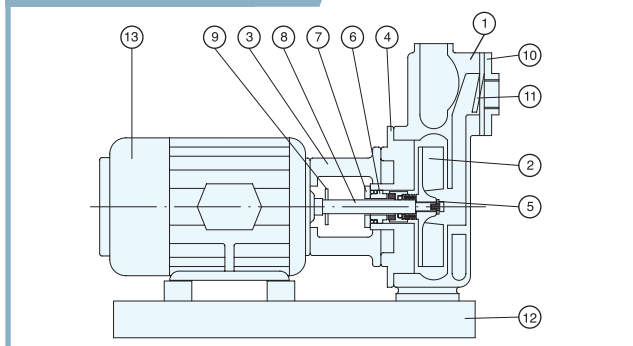
External Drawing



SPJ Specification

Description & Specification			L	A	B	C	H	BL	BS	BW	Bh	Base
25A	3Phase 1/2 HP 4Pole		393	343	50	255	328	400	365	250	220	40
	3Phase 1HP 4Pole		415	365	50	255	328	400	365	250	220	40
40A	3Phase 1HP 4Pole		435	375	60	270	350	400	365	250	220	40
	3Phase 2HP 4Pole		480	420	60	270	350	400	365	250	220	40
	3Phase 5HP 2Pole		520	460	60	255	370	510	475	323	298	65
	3Phase 7.5 HP 2Pole		565	505	60	295	395	460	435	345	320	65
50A	3Phase 2 HP 4Pole		500	430	70	315	413	410	385	323	298	65
	3Phase 3HP 4Pole		525	455	70	315	413	510	475	323	298	65
80A	3Phase 5 HP 4Pole		578	493	85	397	514	510	475	323	298	65
	3Phase 7.5 HP 4Pole		625	540	85	397	514	560	525	345	320	65

Assembly Drawing



No.	Name of Parts	Material	Q'ty	Remark
1	Casing	SSC 14, 13	1	
2	Impeller	SSC 14, 13	1	
3	Adapter	SSC 14, 13	1	
4	Stuffing Box	SSC 14, 13	1	
5	Impeller Nut	STS 316, 304	1	
6	Mechanical Seal		1	
7	Gland	SSC 14, 13	1	
8	Shaft	STS 316	1	
9	Deflector	N.B.R	1	
10	Suction Flange	SSC 14, 13	1	
11	Check Valve	N.B.R	1	
12	Base Plate	SS 41	1	
13	Motor		1	

SPW Parts



Parts

- ① Casing
- ② Back Cover
- ③ Middle Flange
- ④ Impeller
- ⑤ Shaft
- ⑥ Gland
- ⑦ Flange
- ⑧ Check Rubber

● SPBF SUS 304~316 PUMP

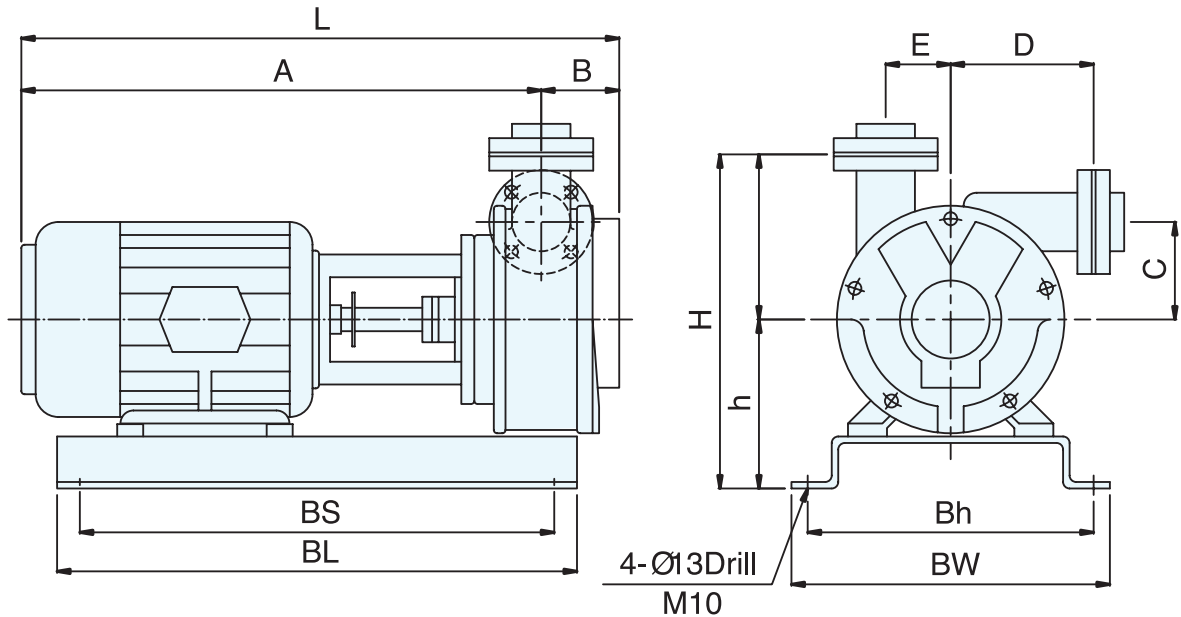


Major Special

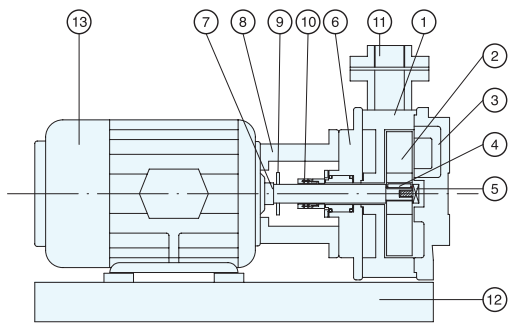
- 1.SPBF Pump can transfer a food, medicine strong volatile liquid such as alcohol, monuma, solvent, toluene. An efficiency of SPBF Pump is prominent, so it can take a supplementary liquid and waste liquid - M.C.E, T.C.E, D.M.F, V.D.T- out of a ultrasonic clearer.
- 2.SPBF Pump is operated without a liquid inside pump.
- 3.Please note that fill pump with a liquid up to mechanical seal in order to protect mechanical seal. (Mechanical seal is liable to be damaged by friction)



External Drawing



Assembly Drawing



No.	Name of Parts	Material	Q'ty	Remark
1	Casing	SSC 14, 13	1	
2	Impeller	SSC 14, 13	1	
3	Casing Cover	SSC 14, 13	1	
4	Impeller Key	STS 316, 304	1	
5	Impeller Nut	STS 316, 304	1	
6	Stuffing Box	SSC 14, 13	1	
7	Shaft	STS 316	1	
8	Adapter	SSC 14, 13	1	
9	Deflector	N.B.R	1	
10	Mechanical Seal		1	
11	Flange	SSC 14, 13	1	
12	Base Plate	SS 41	1	
13	Motor		1	

SPW Parts



Parts

- ① Casing
- ② Front Cover
- ③ Middle Flange
- ④ Impeller
- ⑤ Shaft
- ⑥ Seal Box
- ⑦ Flange
- ⑧ Gland

SPBF Specification

Description & Specification		L	A	B	C	D	E	h	H	BL	BS	BW	Bh	Base
20A	3Phase 1/2 HP 4Pole	390	335	55	55	92	40	120	219	360	330	230	200	40
	3Phase 2 HP 2Pole	446	391	55	55	92	40	130	400	400	365	250	220	40
25A	3Phase 1HP 4Pole	416	356	60	75	110	50	138	255	360	330	230	200	40
	3Phase 2HP 4Pole	470	410	60	75	110	50	140	257	400	365	250	220	40
	3Phase 5HP 2Pole	500	400	60	75	110	50	177	300	385	385	323	298	40
40A	3Phase 2HP 4Pole	487	410	77	80	117	55	152	290	400	365	250	220	40
	3Phase 3HP 4Pole	497	420	77	80	117	55	177	322	410	385	323	298	65

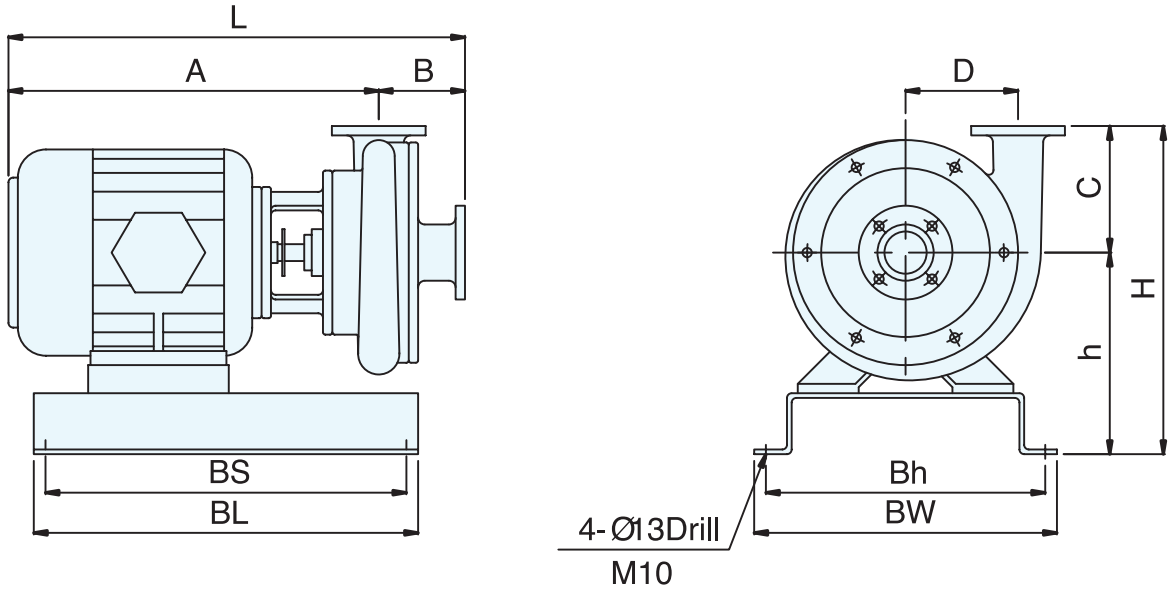
● SPTB SUS 304~316 PUMP

Major Special

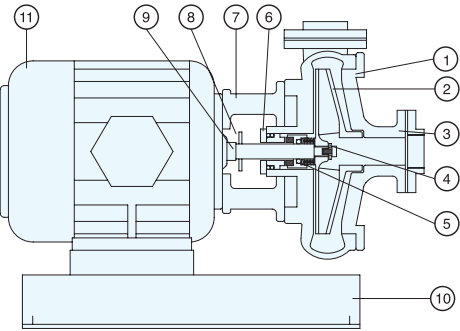
1. SPTB pump can raise volumes of liquid and it has a high motive power.
2. High efficiency and Superior durability.
3. Used for circulation of swimming pool, cooling tower and supply sea water in a fish farm.
3. Usually used for circulation of cooling water in high frequency machinery.



External Drawing



Assembly Drawing



No.	Name of Parts	Material	Q' ty	Remark
1	Casing	SSC 14, 13	1	
2	Impeller	SSC 14, 13	1	
3	Suction Cover	SSC 14, 13	1	
4	Impeller Nut	STS 316, 304	1	
5	Mechanical Seal		1	
6	Gland	SSC 14, 13	1	
7	Adapter	SSC 14, 13	1	
8	Deffector	N.B.R	1	
9	Shaft	STS 316, 304	1	
10	Bass Plate	SS 41	1	
11	Motor		1	

SPTB Specification

Description & Specification				L	A	B	C	D	h	H	BL	BS	BW	Bh	Base
40A	3Phase	3HP	4Pole	477	386	91	143	110	210	353	410	385	323	298	65
	3Phase	5HP	4Pole	517	422	95	165	130	235	400	410	385	323	298	65
50A	3Phase	7.5 HP	4Pole	565	470	95	165	130	235	400	460	435	345	320	65

● Product Guide

Instruction Manual

1. Make an operation without liquid in pump for a few seconds.
And then, set a direction of revolution.
If a motor is revolved inversely on condition that liquid is full in pump, the impeller get loosen.
As a result, it makes a big noise and the motor doesn't work.
If the impeller get loosen, open the front cover and then hold a shaft in its place with an impeller again.
2. Don't be get into a foreign substance inside pump.
The impeller or shaft might be damaged by jam which is caused by a welding material or metallic kind in.
3. Arrange pipes precisely.
4. The impeller might be frictional to the front cover because of a motor's stroke. In this case, open the front cover and tie Tefron tape round the front cover.
5. [Gland Packing] Type ; Make a periodical check-up. If there is a leakage of gland packing, drive a screw. A leakage of liquid prevents pump from working.
6. [Mechanical Seal] Type ; Don't make an operation without liquid in pump. The mechanical seal might be broken by friction.
7. When the location of suction part is higher than a surface of liquid, if there is a concavity in pipe, it doesn't work.

■ Special Feature

- No vibration
- Little noise.
- Easy to make an installation in small space.
- Refined & Neat shape.
- Low electric power consumption.
- All products are standardized goods. So it is easy to replace parts.
- Precision Instrument
- Possible to use for all food due to clean inside.
- Various models & Various choice

■ Motive Power

- Motive power stands for maximum perpendicular height that a pump can pump up a liquid.
Generally, motive power is that add actual perpendicular height to a loss of pipe, elbow and valve what is calculated in terms of the perpendicular height.
The loss depends on the length · diameter · quantity · kind and condition of pipe · elbow · valve and temperature of liquid

■ Installation

- Wesco type PUMP requires equipment for deflation to suction part. Be certain to equip with check valve, when you make a pump installation underground.
Wesco type PUMP takes a low load at a low motive power and when it gets up toward high motive power, a load gets more.
- Centrifugal type PUMP and Turbine type PUMP takes a high load at a low motive power and when it gets up toward low motive power, a load gets more.

■ Selection

- Diameter of flange is various. [15A(1/2")~100A(4")]
- You can make a choice either SUS304 or SUS316 in material depend on quality of medicine and food.
- You may make a choice of Hastelloy-C, if a corrosion is strong in chemicals.
- Liquid influences a power(motor), material and mechanical seal. When you take a choice of pump, you take liquid's kind, density and temperature into consideration.

■ Application

- Chemicals, Medicine, Food, Phosphide, Anti-Alkali, T.C.E, V.D.T, M.C.E, D.M.F
- Ultrasonic Spray-type Cleaner & Circulation-type Cleaner, Sewage Disposal

■ Corrosion Resistance

E : Excellent S : Safty Actory G : Good

Medicine	Density	Temperature	SUS 304	SUS 316	SUS 316 JI	Carpenter 20	Hastelloy B	Hastelloy C
HCl (Hydrochloric)	10%	Normal Temp					G	G
	20 %	〃					G	G
	35 %	〃					G	G
H ₂ SO ₄ (Sulfuric Acid)	25 %	〃			S	G	E	E
	50 %	〃			S	G	E	E
HF (Fluoric Acid)	10 %	〃					G	G
	50 %	〃					G	G
H ₃ PO ₄ (Phosphoric Acid)	85 %	〃	G	G	G	E	E	E
H ₂ SO ₄ (Sulfuric Acid)	10 %	〃	G	G	G	E	E	E
CR ₂ O ₁ —H ₂ O (Chrome Acid)	5 %	〃				E	E	E
	30 %	〃				E	E	E
NaOH(Caustic Soda)	50 %	〃	G	G	G	E	E	E

■ Power

Suction Diameter (D)		D=90 √ Q : Q > 2 D=100 √ Q : Q < 2	
Power	W.H.P (Water Horse Power)	WHP (KW) = 0.163 γ Q H WHP (HP) = 0.222 γ Q H	γ : Specific Gravity (kg/m³) Q : Quantity (m³/min) H : Height (m) ηp : Efficiency of Pump marked KS (Based on 「B」Efficiency) α : Tolerance Factor η : Transmission Factor
	B.H.P (Brake Horse Power)	BHP = [0.163 γ Q H] / ηp = WHP / ηp	
	M.H.P (Motor Horse Power)	MHP = BHP(1+α) / η	
	How to calculate 「Total Power Motive」	Ht = Hs + Hd + Hf	Ht : Total Power Motive Hs : Power Motive of a Suction Pipe Hd : Power Motive of an Emission Pipe Hf : Loss
	Motor Tolerance Factor (α)	The Range of Power (kw)	Tolerance Factor (α)
		less than 0 ~ 0.75 kw	0.30
		less than 19 kw	0.25
		22 ~ 55 kw	0.15
	Transmission Factor	more than 55 kw	0.01
		Transmission Method	Efficiency
		Coupling Type	1.0
		Level Belt	0.9 ~ 0.93
		V Belt	0.95
		Level Gear	0.92 ~ 0.95
		Helical Gear	0.95 ~ 0.98
		Spiral Gear	0.90 ~ 0.95

■ Resistance Loss

※ Marked "mm"

Inside Diameter of Parts	15	20	25	32	40	50	65	80	100	125	150
90° Elbow	0.60	0.75	0.90	1.20	1.50	2.10	2.40	3.00	4.20	5.10	6.00
45° Elbow	0.36	0.45	0.54	0.54	0.90	1.20	1.50	1.80	2.40	3.00	3.60
90° T type Pipe (A)	0.9	1.2	1.5	1.5	2.1	3.0	3.6	4.5	6.3	7.9	9.9
90° T type Pipe (B)	0.18	0.24	0.27	0.27	0.45	6.0	0.75	0.90	1.20	1.5	1.80
Gate Valve	0.12	0.15	0.18	0.18	0.30	0.39	0.48	0.63	0.81	0.99	1.20
Glove Valve	4.50	6.00	7.50	10.5	13.5	16.5	19.5	24.0	37.5	42.0	49.5

■ Selection Requisite

1. Motive Power	Vertical distance from a suction surface of water to an emission surface of water adds to friction less. In case that you don't know that quality of the friction loss, state as follows. 1) The length of the suction pipe and the kinds and numbers of the various link. 2) The length of an emission pipe and the kinds and numbers of the various link.		
2. Quantity	Stands for a required quality per minute. m³ / min		
3. Liquid	1) The kinds of liquids (ex: clear water, acid, alkali, brine, and so on) 2) Gravity (kg / ℓ or ton / m³) 3) Temperature (°C or °F) 4) Density (Cp, Cst, SSU) 5) Conecentration (%)		
4. RPM	The numbers of revolutions take an economic choice of an impeller.		
5. Material	SSC.BC.DI. CD4MCU ALLOY-20	DURIMET CARPENTER-20	HASTELLOY-C SCS-24

■ Friction Coefficient

※ Torisima Coefficient [In case of an iron pipe]

Nominal Diameter	Friction Coefficient	Nominal Diameter	Friction Coefficient	Nominal Diameter	Friction Coefficient	Nominal Diameter	Friction Coefficient
40	0.0325	125	0.0240	250	0.0220	450	0.0211
50	0.0300	150	0.0233	300	0.0217	500	0.0210
80	0.0267	175	0.0228	350	0.0214	600	0.0208
100	0.0250	200	0.0225	400	0.0213	700	0.0207

■ Mechanical Seal

• [Normal Seal] and 「Gland Packing」are usually used in general pump. We set up「Mechanical Seal」to pump for liquid leakage, acid and heat resisting device.



Acid-Resistance PUMP & Stainless PUMP

