



**ROTARY  
CYLINDER**

**Large Thru-Hole High Speed Hydraulic Cylinder with Open Centre**

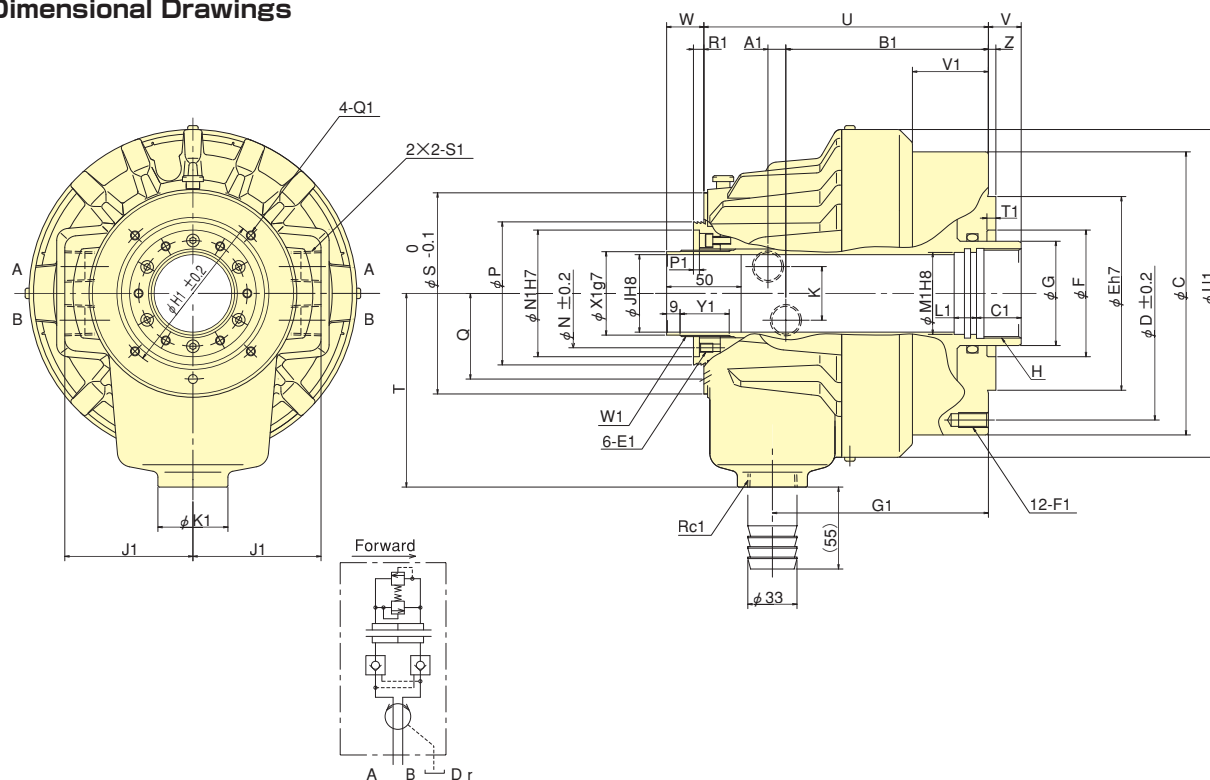
**SP series**

**KITAGAWA standard thru-hole type**

- Compact and light-weight



**Dimensional Drawings**



**Dimensions**

Dimensions	C	D	E	F	G	H	J 貫通孔径 Thru-hole	K	N	P	Q	S	T	U	V max.	V min.	W max.	W min.	Z	A <sub>1</sub>	B <sub>1</sub>
Model																					
SP 1246	155	130	100	80	65	M 55×2.0	46	36	64	85	51.5	116	115	179	15	0	40	25	5	11.5	126.5
SP 1552	190	170	130	85	70	M 60×2.0	52	36	73	96	57.5	135	130	191	22	0	47	25	5	12	136
SP 1875	215	190	160	120	95	M 85×2.0	75	36	98	121	70.5	164	160	225	25	0	50	25	5	17.5	153.5
SP 2091	240	215	180	140	110	M100×2.0	91	34	108	138	79	180	185	248	30	0	55	25	5	21	168

Dimensions	C <sub>1</sub>	E <sub>1</sub> depth	F <sub>1</sub> depth	G <sub>1</sub>	H <sub>1</sub>	J <sub>1</sub>	K <sub>1</sub>	L <sub>1</sub>	M <sub>1</sub>	N <sub>1</sub>	P <sub>1</sub>	Q <sub>1</sub> depth	R <sub>1</sub>	S <sub>1</sub>	T <sub>1</sub>	U <sub>1</sub>	V <sub>1</sub>	W <sub>1</sub>	X <sub>1</sub>	Y <sub>1</sub>	
Model																					
SP 1246	30	M6×9	M10×20	135	98	76	47	15	50	76	4	M5×10	6	Rc <sup>1</sup> / <sub>2</sub>	6	200	46	M52×1.5	50	33	
SP 1552	30	M6×9	M10×20	145	110	86	47	15	55	85	4	M6×12	7	Rc <sup>1</sup> / <sub>2</sub>	6	220	51	M58×1.5	56	33	
SP 1875	35	M6×9	M10×20	166.5	155	101	47	15	80	108	4	M6×12	7	Rc <sup>1</sup> / <sub>2</sub>	6	242	58	M84×2.0	81	33	
SP 2091	35	M6×14	M12×24	183	165	110	47	15	95	120	4	M6×12	7	Rc <sup>1</sup> / <sub>2</sub>	6	267	66	M99×2.0	96	38	

**Specifications**

※Leakage : Pressure 3.0MPa(30.6kgf/cm<sup>2</sup>) and oil temperature 50°C. ※Draw bar pull force : Pressure 4.0MPa(40.8kgf/cm<sup>2</sup>)

Specifications	Piston Dia. mm	Piston stroke mm	Piston Area		Draw bar		Max. Operation Pressure MPa(kgf/cm <sup>2</sup> )	Max. Speed min <sup>-1</sup>	Moment of inertia kg·m <sup>2</sup>	Net Weight kg	Leakage ℓ/min
			Push Side cm <sup>2</sup>	Pull Side cm <sup>2</sup>	Push Side kN(kgf)	Pull Side kN(kgf)					
Model											
SP 1246	125	15	100	89	36.2 (3691)	31.3 (3192)	3.9 (39.8)	7000	0.019	12.0	3.0
SP 1552	155	22	161	150	57.8 (5894)	53.9 (5496)	3.9 (39.8)	6200	0.053	16.8	3.9
SP 1875	180	25	198	183	70.5 (7189)	65.6 (6689)	3.9 (39.8)	4700	0.095	26.0	4.2
SP 2091	205	30	252	234	90.1 (9188)	84.3 (8596)	3.9 (39.8)	3800	0.153	33.0	4.5