

MSI series motors

CHARACTERISTICS OF THE MSI SERIES MOTORS

Motor model	Displacement		Continuous max. speed (1)	Intermittent max. speed (1)	Max. flow absorbed		Torque		Torque at 350 bar (5100 psi)		Max. allowable pressure continuous / peak		Weight (kg)	
	cu.in/rev	cc/rev			rpm	rpm	gpm	l/mn	lbf.ft/psi	N.m/bar	lbf ft	N.m	psi	bar
MSI 28 (2)	1.69	27.7	6300	6900	46.1	175	0.0223	0.44	114	154	5800 / 6525	400 / 450	25	11.5
MSI 32	1.96	32.1	6300	6900	53.4	202	0.0259	0.51	132	179	5800 / 6525	400 / 450	25	11.5
MSI 41	2.51	41.1	5600	6200	60.8	230	0.0331	0.65	169	229	5800 / 6525	400 / 450	25	11.5
MSI 50	3.07	50.3	5000	5500	66.4	252	0.0405	0.80	207	280	5800 / 6525	400 / 450	42	19
MSI 63	3.84	63	5000	5500	83.2	315	0.0508	1.00	259	351	5800 / 6525	400 / 450	42	19
MSI 80	4.91	80.4	4500	5000	95.6	362	0.0648	1.28	330	448	5800 / 6525	400 / 450	57	26
MSI 90	5.49	90	4500	5000	107	405	0.0725	1.43	370	501	5800 / 6525	400 / 450	57	26
MSI 108	6.61	108.3	4000	4400	114.4	433	0.0872	1.72	445	603	5800 / 6525	400 / 450	57	26
MSI 108 R (2)	6.61	108.3	3400	4500	97.3	368	0.0872	1.72	445	603	5800 / 6525	400 / 450	72	33
MSI 125	7.65	125.4	3400	4500	112.6	426	0.1010	2.00	515	699	5800 / 6525	400 / 450	72	33

(1) For higher speeds, please contact us.

(2) The MSI 108 R is in the frame size of the MA 125.

► Acceptable forces applied to motor shaft

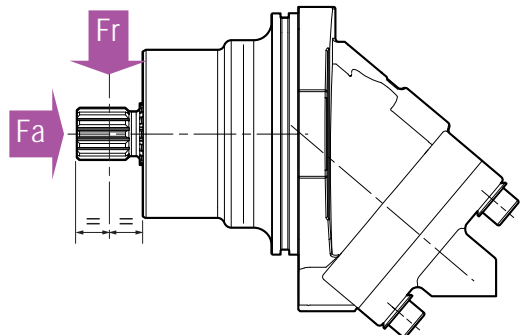
Motor model		28	32	41	50	63	80	90	108	108 R	125
Fr	lbf	1394	1462.5	1574	1686	2023	2360	2473	2585	2812	3262
	N	6200	6500	7000	7500	9000	10500	11000	11500	12500	14500
Fa	lbf/psi	0.44	0.46	0.62	0.62	0.77	0.93	1.03	1.24	1.24	1.33
	N/psi (N/bar)*	1.93 (28)	2.06 (30)	2.75 (40)	2.75 (40)	3.44 (50)	4.14 (60)	4.62 (67)	5.52 (80)	5.52 (80)	5.93 (86)

Fr: radial force measured at mid point of length of shaft.

Fa: axial force which tends to push the shaft inwards.

* Differential pressure between A and B.

For other forces, please contact us.



Order code system of MSI series motors

MSI	...	B	...	L0	M1	.	.	SV
01	02	03	04	05	06	07	08	09

To obtain the code for your motor, complete the different parameters 02, 04, 07 and 08, in the table on the left according to the options you require (see table below).

Motor												
01	Semi-integrated motor											MSI

Displacement												
02		28	32	41	50	63	80	90	108	108 R	125	

Mounting flange												
03	2 bolts ISO 3019-2											B

Shaft												
04	DIN 5480 splined	W30	W30	W30	W30	W30	W40	W40	W40	W40	W45	W1
		-	-	-	-	W35	W35	W35	-	-	W40	W2

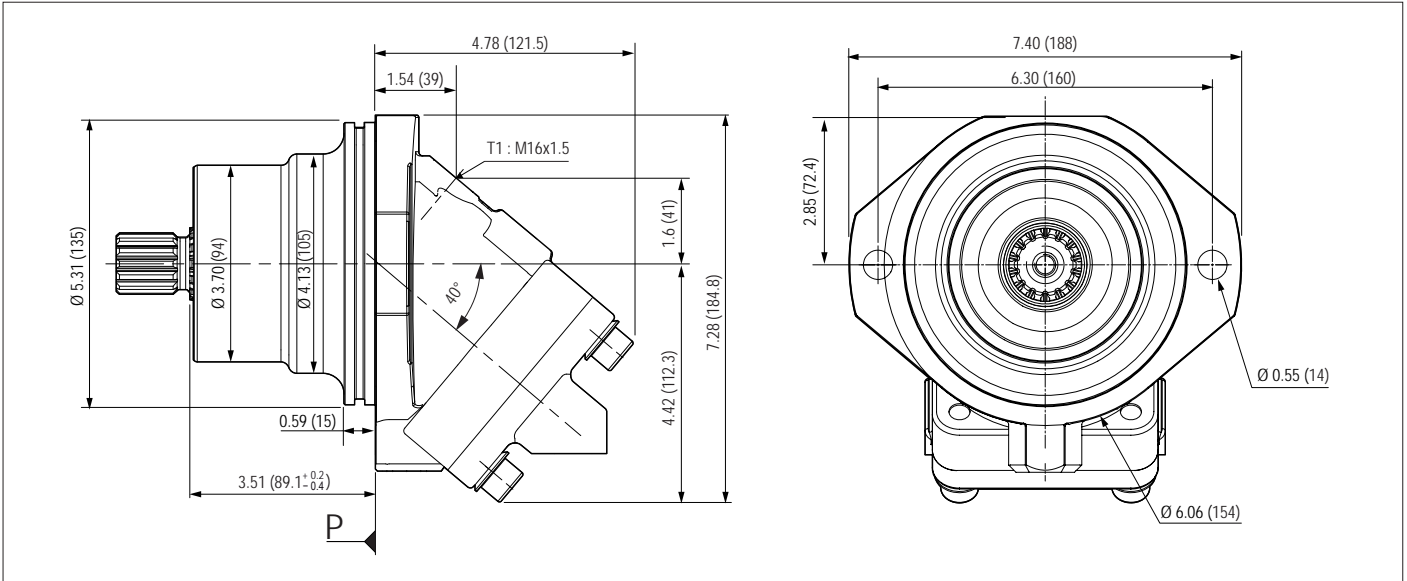
Inlet ports												
05	SAE flange ports, bottom	•	•	•	•	•	•	•	•	•	•	L0

Drain												
06		1	1	1	1	1	1	1	1	1	1	M1

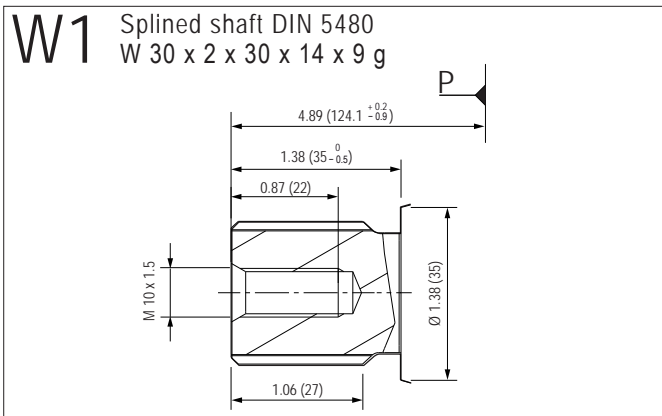
Suitable for use of speed sensor												
07	Yes	•	•	•	•	•	•	•	•	•	•	1
	No	•	•	•	•	•	•	•	•	•	•	0

Speed sensor												
08	Yes	•	•	•	•	•	•	•	•	•	•	1
	No	•	•	•	•	•	•	•	•	•	•	0

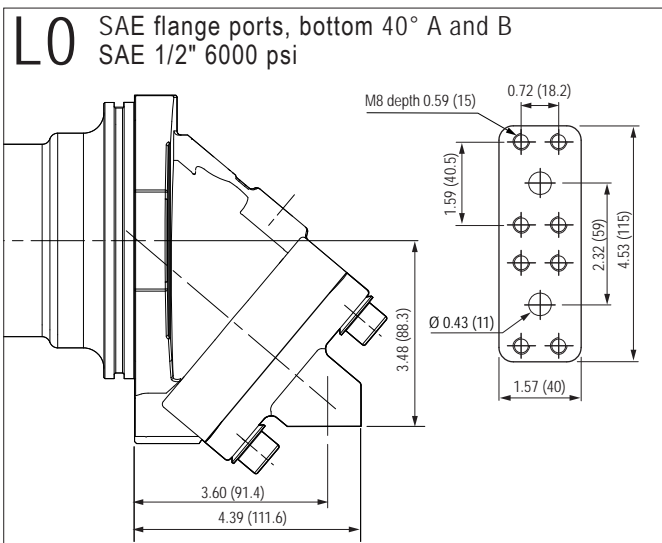
Valves												
09	Without	•	•	•	•	•	•	•	•	•	•	SV



► Shaft

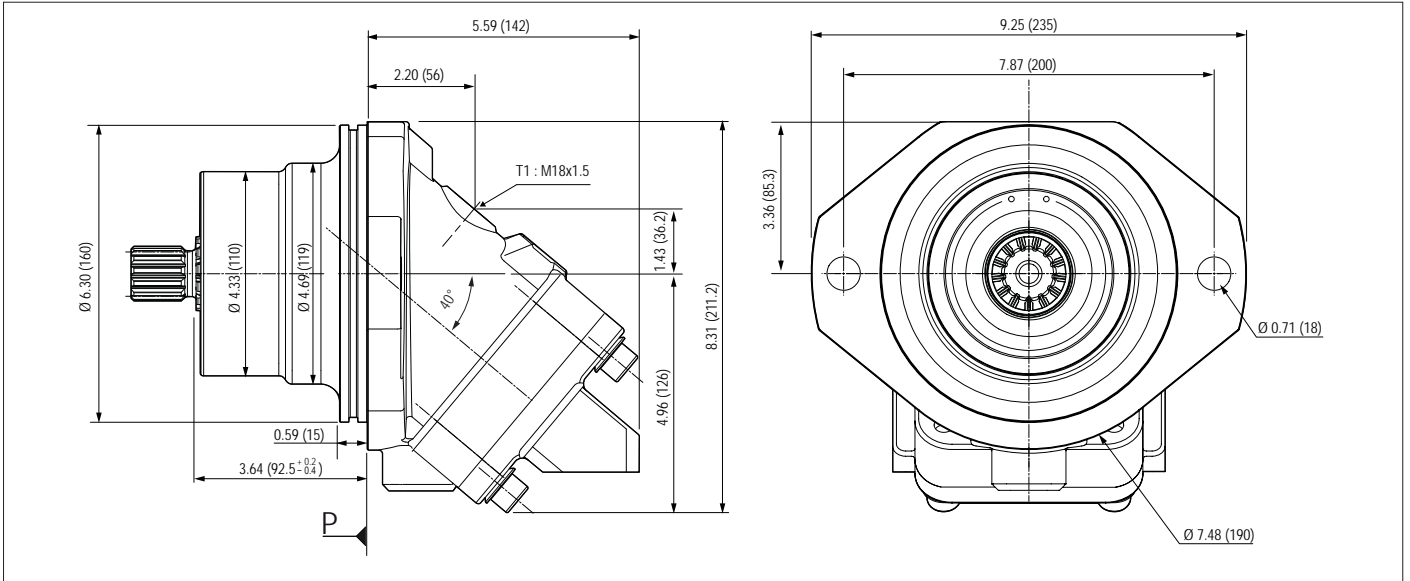


► Inlet ports

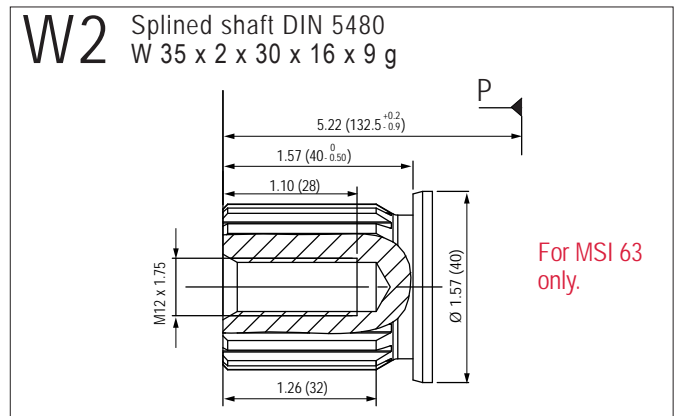
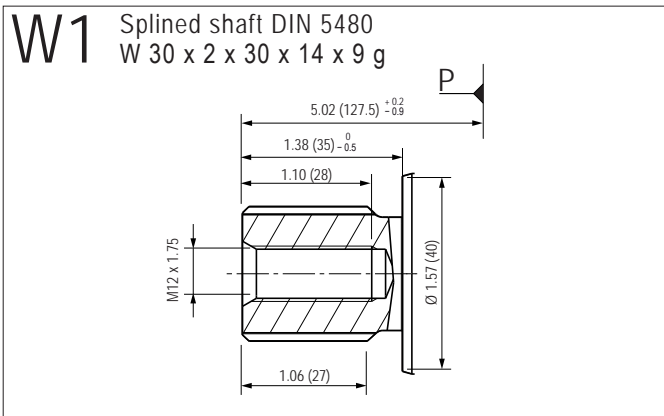


Dimensions in inches (mm) are given only as an indication.

MSI 50 - 63

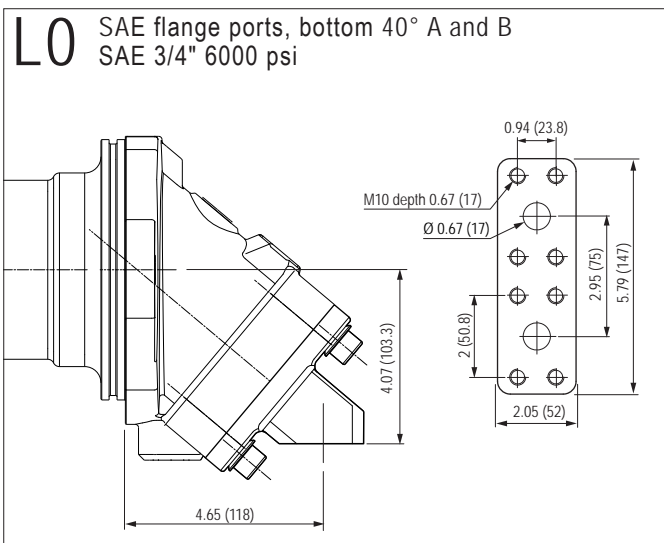


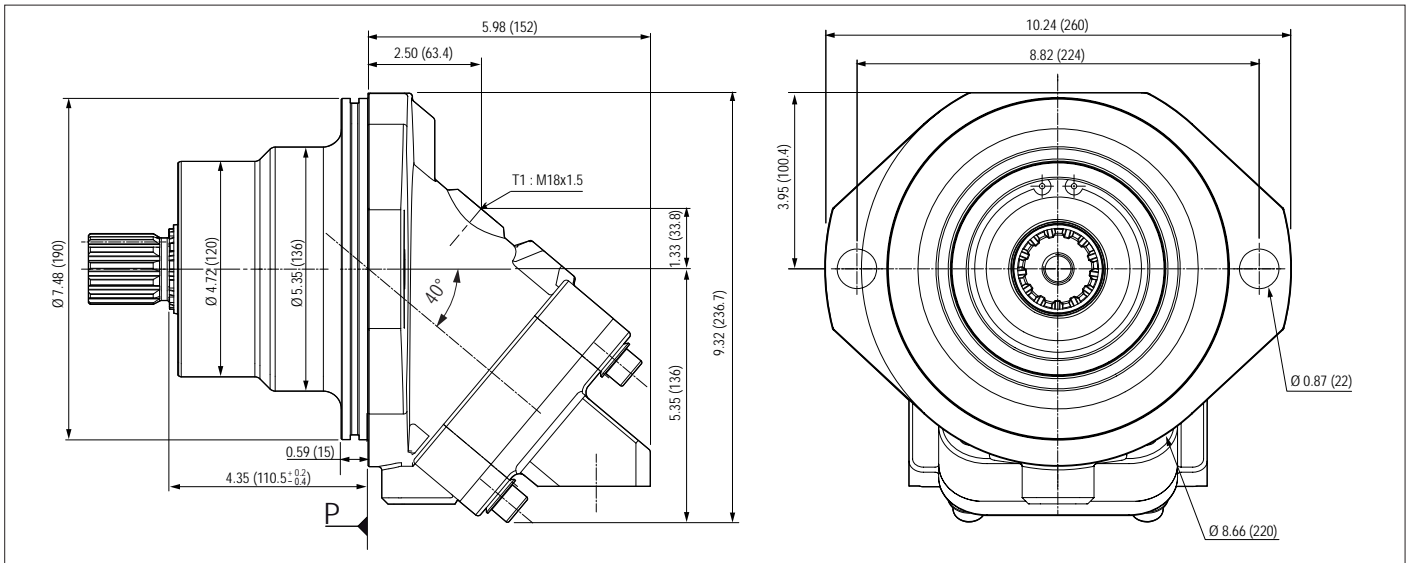
► Shaft end



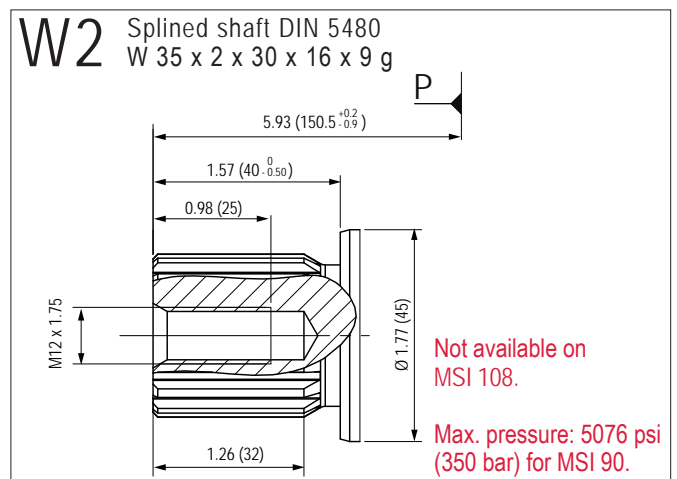
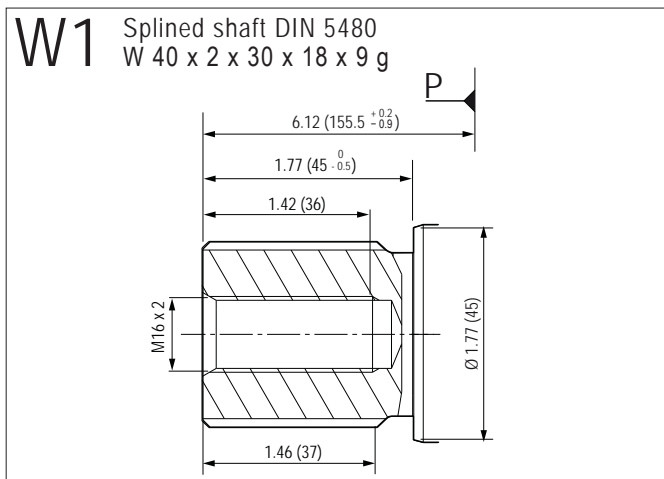
For MSI 63 only.

► Inlet ports

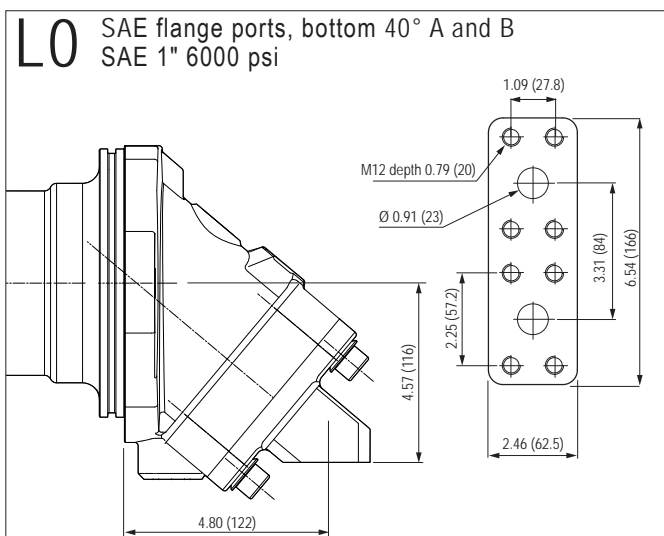




► Shaft end

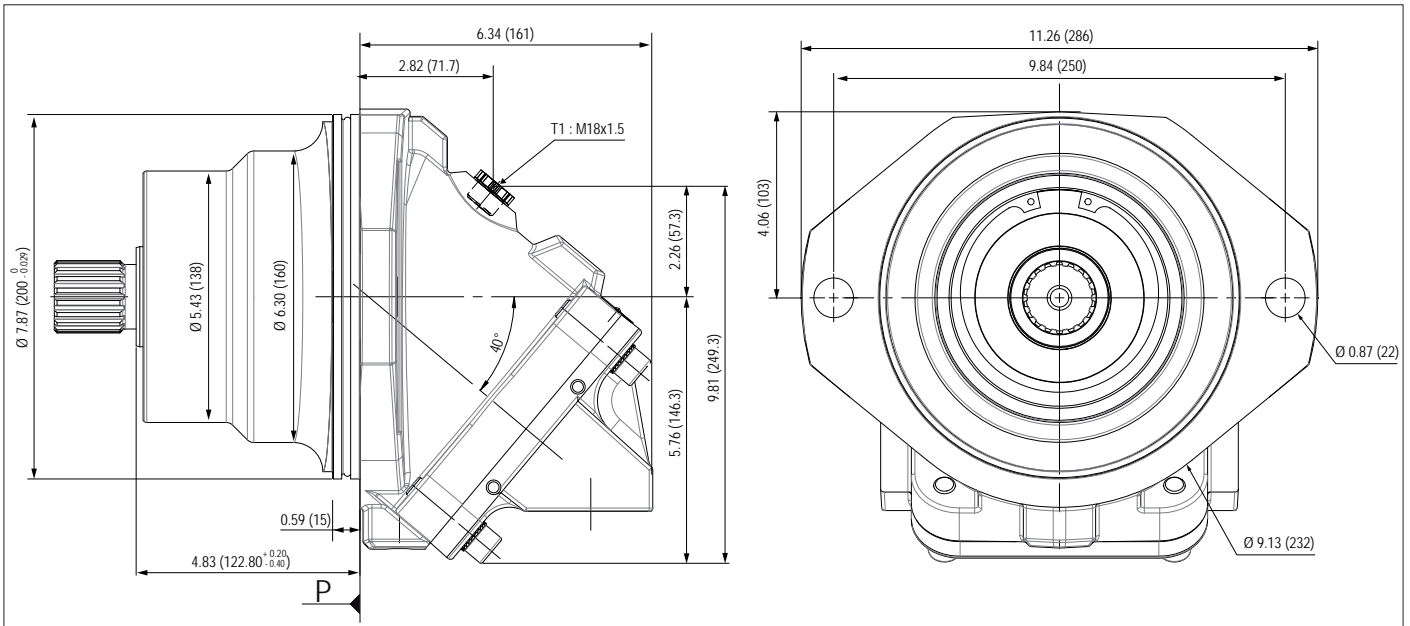


► Inlet ports

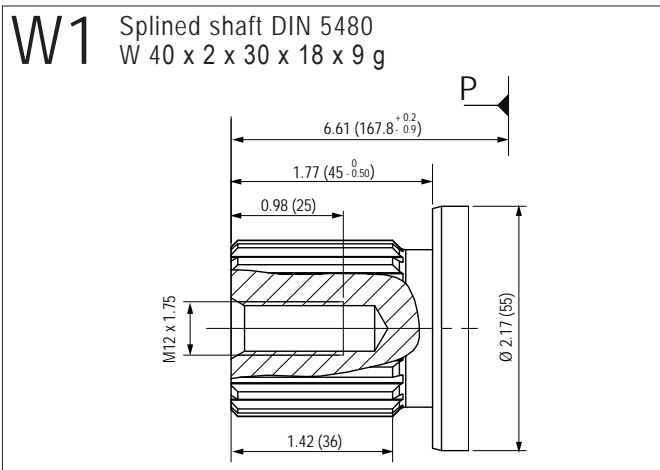


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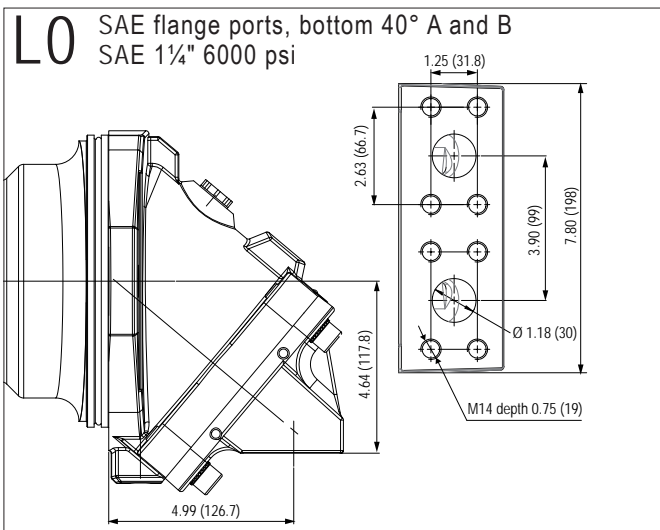
MSI 108 R

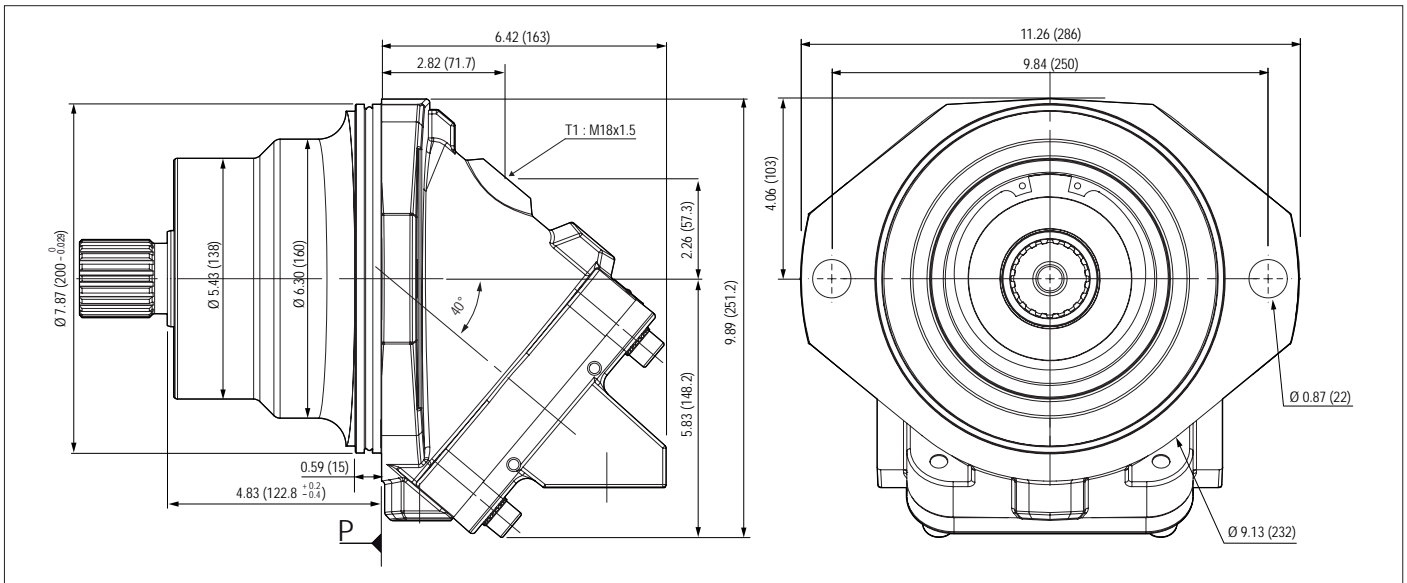


► Shaft end



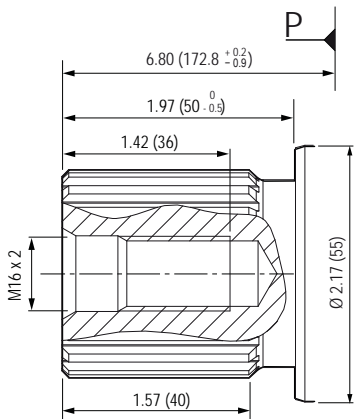
► Inlet ports



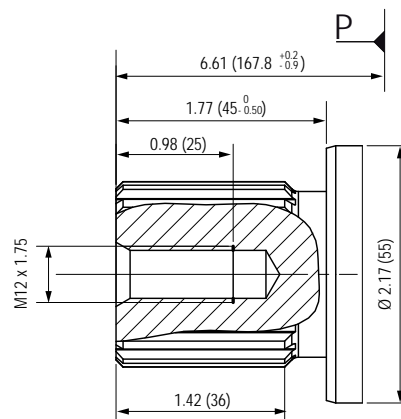


► Shaft end

W1 Splined shaft DIN 5480
W 45 x 2 x 30 x 21 x 9 g

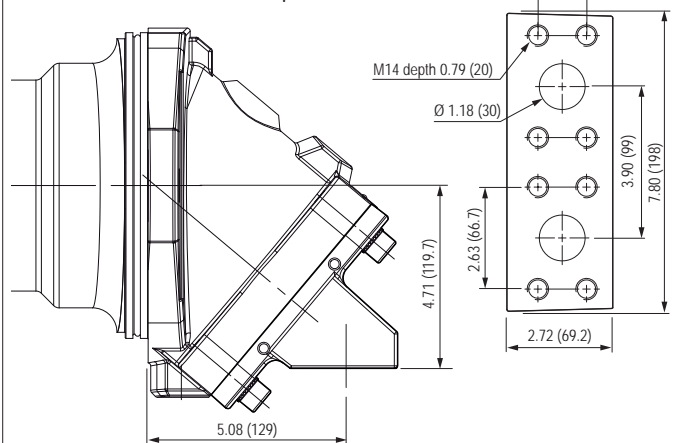


W2 Splined shaft DIN 5480
W 40 X 2 X 30 X 18 X 9 g



► Inlet ports

L0 SAE flange ports, bottom 40° A and B
SAE 1"1/4 6000 psi



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