



FLUID COMPONENTS, INC.

Hydraulic Gear Pump

Model GP-F1

Available by Special Order Only



Model GP-F1 is an all aluminium construction, high pressure hydraulic gear pump with 15 displacement sizes from 0.05 to 0.48 in³/rev. (0.8 to 8.0 cm³/rev). The standard mounting flange is as detailed on the installation drawing and porting is any combination of rear, front or side as defined in the Ordering Example. The drive shaft options include flat tang or tapered key.

Recommended working conditions:

FILTRATION: 25 micron or better
 OIL VISCOSITY: 7 - 700 cSt
 INLET PRESSURE: 12 - 32 psi absolute
 OIL TEMP: -25° - 80° C (-12° - 175° F)
 AMBIENT -22° - 55° C (-8° - 130° F)

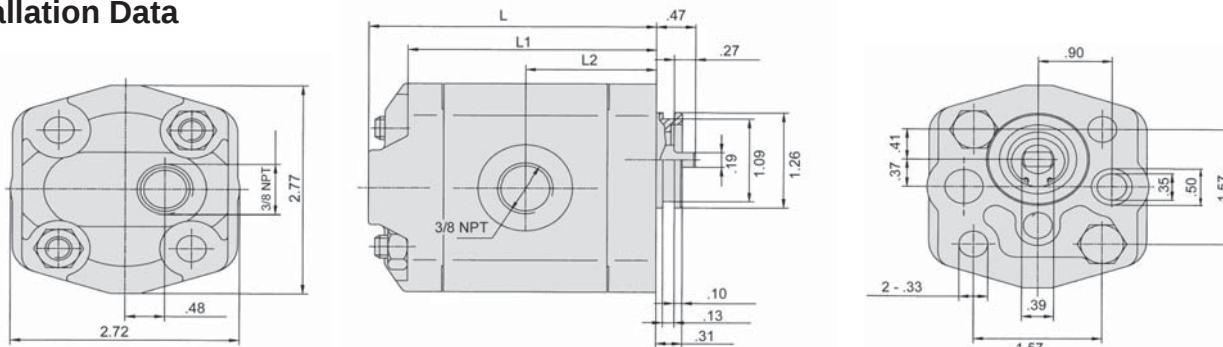
Technical Specifications

Model	Displacement	Pressure		Speed rpm		Weight
	in ³ (cm ³) / rev	Rated	Max	Rated	Max	
GP-F1-08	0.05 (0.8)	2900	3626	2000	6000	1.65
GP-F1-11	0.06 (1.1)	2900	3626	2000	6000	1.69
GP-F1-13	0.07 (1.3)	2900	3626	2000	6000	1.73
GP-F1-16	0.09 (1.6)	2900	3626	2000	6000	1.76
GP-F1-18	0.10 (1.8)	2900	3626	2000	6000	1.78
GP-F1-21	0.12 (2.1)	2900	3626	2000	6000	1.80
GP-F1-27	0.16 (2.7)	2900	3626	2000	6000	1.87
GP-F1-32	0.19 (3.2)	2900	3626	2000	5000	1.91

Model	Displacement	Pressure		Speed rpm		Weight
	in ³ (cm ³) / rev	Rated	Max	Rated	Max	
GP-F1-37	0.22 (3.7)	2900	3626	2000	4500	1.98
GP-F1-42	0.25 (4.2)	2900	3626	2000	4000	2.02
GP-F1-48	0.29 (4.8)	2320	2900	2000	3500	2.09
GP-F1-58	0.35 (5.8)	2320	2900	2000	2900	2.20
GP-F1-60	0.36 (6.0)	2320	2900	2000	2750	2.25
GP-F1-70	0.43 (7.0)	2320	2900	2000	2500	2.34
GP-F1-80	0.48 (8.0)	2320	2900	2000	2100	2.42

Flow Rate (gpm) = Displacement (in³/rev) X Speed (rpm) / 231
 Volumetric efficiency % ≥93

Installation Data



Model	L	L1	L2
GP-F1-08	2.87"	2.40"	1.26"
GP-F1-11	2.91"	2.44"	1.30"
GP-F1-13	2.95"	2.48"	1.32"
GP-F1-16	2.99"	2.52"	1.34"
GP-F1-18	3.03"	2.56"	1.36"

Model	L	L1	L2
GP-F1-21	3.07"	2.60"	1.38"
GP-F1-27	3.15"	2.68"	1.42"
GP-F1-32	3.23"	2.76"	1.46"
GP-F1-37	3.31"	2.83"	1.50"
GP-F1-42	3.39"	2.91"	1.53"

Model	L	L1	L2
GP-F1-48	3.46"	2.99"	1.57"
GP-F1-58	3.62"	3.15"	1.65"
GP-F1-60	3.66"	3.18"	1.69"
GP-F1-70	3.77"	3.30"	1.77"
GP-F1-80	3.94"	3.46"	1.81"

Ordering Example:

Category Series Displacement Drive Shaft Rotation Options
GP - **F1** - **32** - **T** - **C** -

Category	Series	Displacement (cm ³ /rev)	Drive Shaft	Rotation	Options
Gear Pump	F1 Series	08/11/13/16/18/ 21/27/32/37/42/ 48/58/60/70/80	T = Flat Tang Z = Taper	C = Clockwise A = Counter-Clockwise (viewed from shaft end)	Omit = Standard (front & back) 1 = Side Ports (3/8" NPT) 2 = Side Ports (SAE-8/SAE-6) 3 = Free running (reduced efficiency)