

GP5120/GP5122/GP5124 SERIES PUMP SPECIFICATIONS

1. Performance

	Max. Flow	Max. Pressure	Max. Speed	Power Req'd.	Max. Temp.	Plunger Diameter	NPSH Required
Model	GPM	PSI	RPM	HP	°F	in	Ft-Head
GP5120	10.5	8700	1000	63.3	140	0.787	27.9
GP5122	11.9	7250	930	59.0	140	0.866	27.9
GP5124	13.2	5800	850	53.8	140	0.945	27.9

	Max. Flow	Max. Pressure	Max. Speed	Power Req'd.	Max. Temp.	Plunger Diameter	NPSH Required
Model	L/min	Bar	RPM	kW	°C	mm	mWs
GP5120	40.0	600	1000	47.2	60	20	8.5
GP5122	45.0	500	930	44.0	60	22	8.5
GP5124	50.0	400	850	40.1	60	24	8.5

Common Specifications:

Inlet Pressure -4.35 to 145 PSI (-0.3 to 10 Bar)
 Max. Temperature 140 °F (60 °C)
 Crankshaft Diameter..... 1.38" (35mm)
 Crankcase Oil Capacity 1.2 Gal. (4.4 L)
 Inlet Ports (2) 3/4" BSP
 Discharge Ports (2) 1/2" BSP
 Stroke 1.81" (46mm)
 Weight 176 lbs (80 kg)
 Shaft Rotation..... Top of Pulley Toward Fluid End

Materials Used:

Manifold AISI 316 Stainless Steel
 AISI 303 Stainless Steel (GP5124)
 Plungers Solid Ceramic
 Valves High Grade Stainless Steel
 Seals..... Aramide/Teflon Packing
 Gear End Spheroidal Cast Iron
 Crankshaft Drop-forged and case-hardened
 O-Ring Nitrile

Consult the factory for special requirements that must be met if the pump is to operate beyond one or more of the limits specified above.

Figures for speed (rpm) and pressure apply for interval operation with cold water. For continuous operation, the speed and the max. operating pressure must be reduced by 10%. Performance data for intermittent operation, data for continuous operation on request. For information on intermittent operation and calculating of the performance data, see the Giant Industries assembly instructions.

NPSHR / Inlet pressure

Required NPSH refers to water at 60 °F (20 °C) at max. permissible pump speed. The inlet pressure on the suction side must not exceed 145 PSI (10 bar). Make sure that suction pulsation is sufficiently dampened – water column resonance must be avoided.

Level of noise emission

Emission sound pressure level: ≤ 90 dB(A)

2. Fields of application

The fields of application of these pump types correspond to the specifications in the assembly instructions Giant Pumps.

3. Ambient conditions

Ambient temperature: 41 °F < T_{Amb.} < 86 °F
 Ambient temperature: 5 °C < T_{Amb.} < 30°C

GP5120/GP5122/GP5124 Series Pumps

4. Oil filling

- Filling quantity: **1.2 gallons (4.4 l)**
- Quality: Industrial gear oil **ISO VG 220** or automotive gear oil **SAE 90 GL4 (Giant's p/n 01154)**
- Intervals: first oil change after **50 operating hours** then every **1000 operating hours**, but at the latest after **12 months**

5. Installation/ Putting into Operation

5.1 Shaft Protector

When the pump is in operation, the open shaft end must be covered up by shaft protector (21), the driven shaft side and coupling by a contact-protector.

To cover the exposed crankshaft end with the shaft guard, position the guard directly over the groove in the middle of the bearing cover and gently tap it into the groove using a plastic hammer.

5.2 Direction of pump rotation

Set the direction of rotation of the drive unit according to the direction of rotation arrow on the crankcase.

5.3 Suction line filter

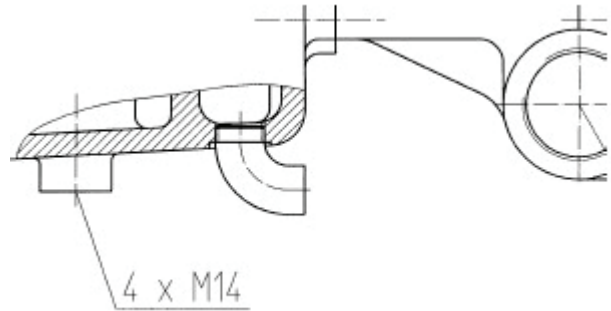
Recommended mesh size 150 µm.

5.4 Draining Leakage



The 1/2" BSP connection in the crankcase serves the purpose of draining leakage water.

The connection must not be closed off.



5.5 Putting into Operation



Before putting the pump into operation for the first time, and every time the suction line is emptied, the plugs (34) must be removed and the pump cranked manually or started briefly until water emerges out of the plug bores. This procedure serves to vent the drip-return so that the low-pressure seals (32) do not run dry. Thereafter the plugs (34) must be screwed back on and tightened.

6. Operation

For information, see assembly instructions Giant Pumps on page 7.