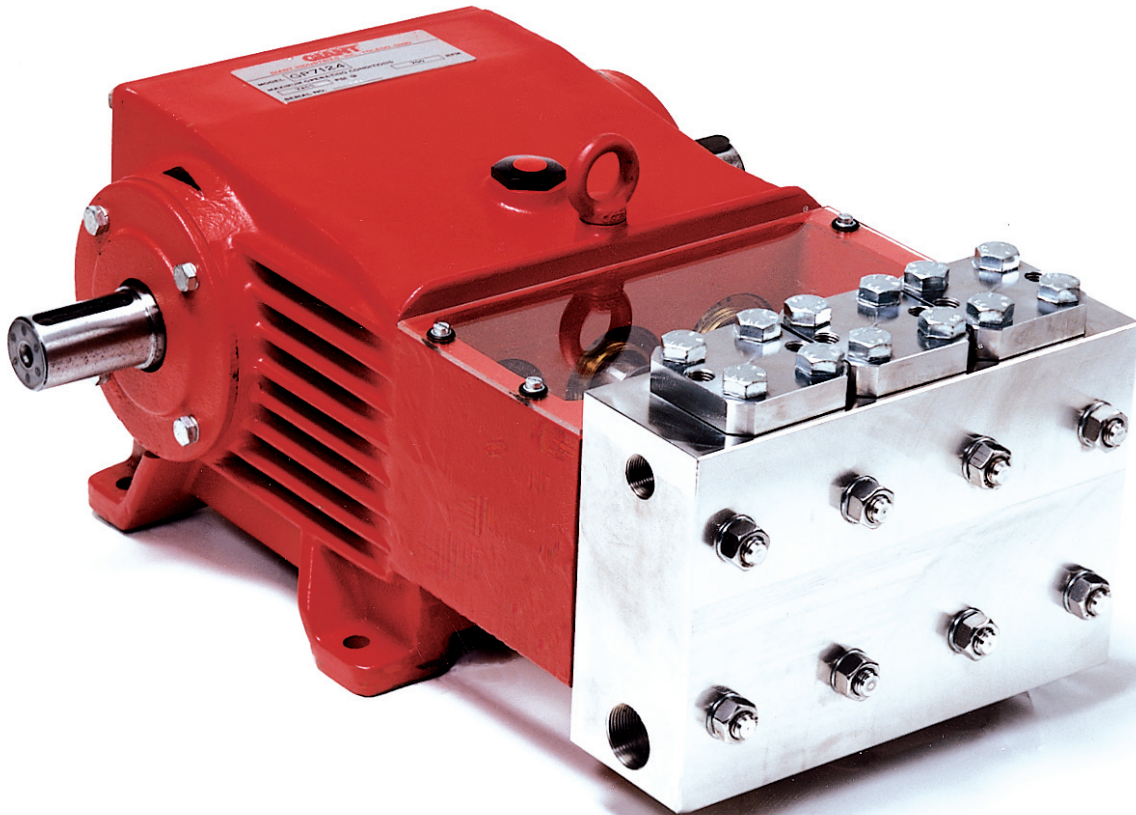


Model GP7132 & GP7136

Triplex Ceramic
Plunger Pump
Operating Instructions/
Repair and Service
Manual



GIANT
Performance Under Pressure

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Updated 12/14

INSTALLATION INSTRUCTIONS

Installation of the Giant Industries, Inc., pump is not a complicated procedure, but there are some basic steps common to all pumps. The following information is to be considered as a general outline for installation. If you have unique requirements, please contact Giant Industries, Inc. or your local distributor for assistance.

1. The pump should be installed flat on a base to a maximum of a 15 degree angle of inclination to ensure optimum lubrication.
2. The inlet to the pump should be sized for the flow rate of the pump with no unnecessary restrictions that can cause cavitation. Teflon tape should be used to seal all joints. If pumps are to be operated at temperatures in excess of 140° F, it is important to insure a positive head to the pump to prevent cavitation.
3. The discharge plumbing from the pump should be properly sized to the flow rate to prevent line pressure loss to the work area. It is essential to provide a safety bypass valve between the pump and the work area to protect the pump from pressure spikes in the event of a blockage or the use of a shut-off gun.
4. Use of a dampener is necessary to minimize pulsation at drive elements, plumbing, connections, and other system areas. The use of a dampener with Giant Industries, Inc. pumps is optional, although recommended by Giant Industries, Inc. to further reduce system pulsation. Dampeners can also reduce the severity of pressure spikes that occur in systems using a shut-off gun. A dampener must be positioned downstream from the unloader.

IMPORTANT OPERATING CONDITIONS

Failure to comply with any of these conditions invalidates the warranty

1. Prior to initial operation, add oil to crankcase so that the oil level is between the two lines on the oil dipstick. **DO NOT OVERFILL. SAE 80W-90 Industrial Gear Lube Oil may be used (Giant's p/n 01154).** Crankcase oil should be changed after the first 50 hours of operation, then at regular intervals of 500 hours or less depending on operating conditions.

Note: When operating in areas with high humidity or large temperature fluctuations, the oil must be changed immediately if condensate or frothing oil occurs in the crankcase.

5. Crankshaft rotation on Giant Industries, Inc. pumps should be made in the direction designated by the arrows on the pump crankcase. Reverse rotation may be safely achieved by following a few guidelines available upon request from Giant Industries, Inc. Required horsepower for system operation can be obtained from the chart on pages 3 & 6. When the pump is operating, the exposed shaft side, the driven shaft side, and its coupling must be covered by a protective guard. The plunger area must also be covered by the protective plate (30) Do not step on the protective plate (30) or put weight on it.

6. Before beginning operation of your pumping system, remember: Check that the crankcase and seal areas have been properly lubricated per recommended schedules. Do not run the pump dry for extended periods of time. Cavitation will result in severe damage. Always remember to check that all plumbing valves are open and that pumped media can flow freely to the inlet of the pump.

Finally, remember that high pressure operation in a pump system has many advantages. But, if it is used carelessly and without regard to its potential hazard, it can cause serious injury.

7. The service life of the seals is maximized if there is a minimal amount of leakage. A few drops of water can drip from each plunger every minute. Leakage must be examined every day. If the leakage becomes excessive (constant dripping), the plunger seals must be changed.

2. Pump operation must not exceed rated pressure, volume, or RPM. A pressure relief device must be installed in the discharge of the system.

3. Acids, alkalines, or abrasive fluids cannot be pumped unless approval in writing is obtained before operation from Giant Industries, Inc.

4. **Important!** If there is a **danger of frost**, the water in the pump and in the pump fittings (particularly the unloader valve) must be emptied. The second discharge port can also be used and the pump run "dry" for 1-2 minutes for this purpose.

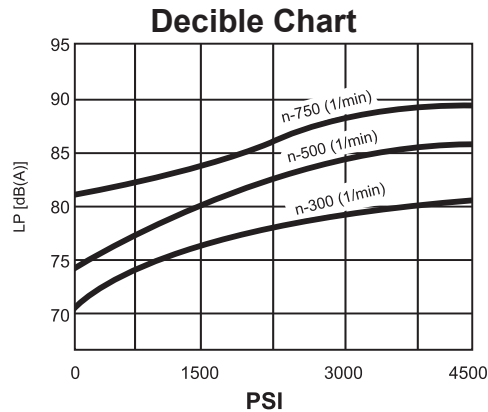
GP7132 Pump Specifications

| | <u>U.S.</u> | <u>Metric</u> |
|---------------------------------------|-----------------------|--------------------------------|
| Maximum Volume** | 23.4 GPM | 88.5 L/min |
| Maximum Discharge Pressure** | 4350 PSI | 300 Bar |
| Maximum Speed** | | 750 RPM |
| Inlet Pressure | -4.35 to 145 PSI..... | -0.3 to 10 Bar |
| Plunger Diameter..... | 1.3" | 32mm |
| Plunger Stroke..... | 2.0" | 52mm |
| Crankshaft Diameter..... | 1.9" | 48mm |
| Key Width | 0.6" | 14mm |
| Crankshaft Mounting | | Either side |
| Shaft Rotation..... | | Top of pulley towards manifold |
| Temperature of Pumped Fluids | 140 °F | 60 °C |
| Inlet Ports | | (2) 1 1/4" NPT |
| Discharge Ports | | (2) 3/4" NPT |
| Weight | 434 lbs. | 197 kg. |
| Crankcase Oil Capacity | 1.6 gallons* | 6.0 L* |
| Fluid End Material..... | | Stainless Steel |
| Volumetric Efficiency @ 700 RPM..... | | 94% |
| Mechanical Efficiency @ 700 RPM | | 83% |

*If the pump is mounted on a vehicle with the possibility of unlevelness and/or the pump speed is between 300 and 500 RPM, the volume of oil should be 1.93 gallons (7.3 liters). To check, put the oil dipstick in the bore situated next to the eye bolt.

**This figure is the maximum amount for this pump. For continuous duty and/or with water warmer than 140 °F (60 °C), these values should be reduced by 10%.

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.



| GP7132 HORSEPOWER REQUIRMENTS | | | | | | | |
|--------------------------------------|------|----------|----------|----------|----------|----------|----------|
| RPM | GPM | 1000 PSI | 1400 PSI | 2000 PSI | 2500 PSI | 3000 PSI | 4350 PSI |
| 300 | 9.4 | 6.7 | 9.4 | 13.4 | 16.7 | 20.1 | 29.1 |
| 400 | 12.5 | 8.9 | 12.5 | 17.8 | 22.3 | 26.7 | 38.8 |
| 550 | 17.2 | 12.3 | 17.2 | 24.5 | 30.6 | 36.8 | 53.3 |
| 600 | 18.7 | 13.4 | 18.7 | 26.7 | 33.4 | 40.1 | 58.2 |
| 650 | 20.3 | 14.5 | 20.3 | 29.0 | 36.2 | 43.5 | 63.0 |
| 700 | 21.8 | 15.6 | 21.8 | 31.2 | 39.0 | 46.8 | 67.9 |
| 750 | 23.4 | 16.7 | 23.4 | 33.4 | 41.8 | 50.1 | 72.7 |

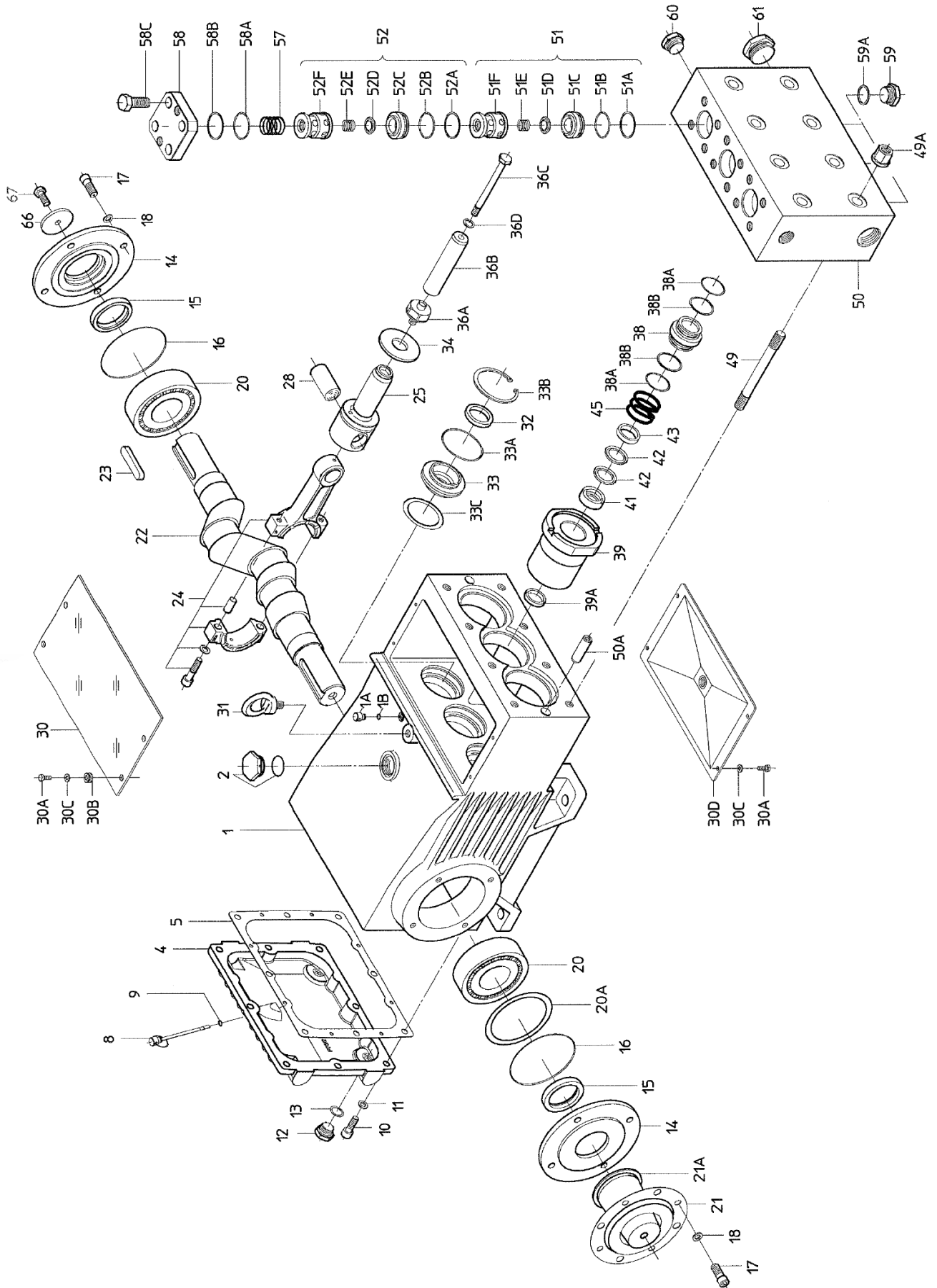
HORSEPOWER RATINGS:

The rating shown are the power requirements for the pump. Gas engine power outputs must be approximately twice the pump power requirements shown above.

We recommend a 1.15 service factor be specified when selecting an electric motor as the power source. To compute specific pump horsepower requirements, use the following formula:

$$\frac{\text{GPM} \times \text{PSI}}{1450} = \text{hp}$$

Exploded View - GP7132 and GP7136 Pumps



GP7132 and GP7136 PARTS LIST

| ITEM | PART | DESCRIPTION | QTY. | ITEM | PART | DESCRIPTION | QTY. |
|------|------------|--------------------------------------|------|------|------------|---|------|
| 1 | 07600 | Crankcase | 1 | 38 | 06093 | Seal Case | 3 |
| 1A | 05525 | Head for Oil Dipstick | 1 | 38A | 13141 | O-Ring, Seal Case | 6 |
| 1B | 01009 | O-Ring | 1 | 38B | 13142 | Support Ring | 6 |
| 2 | 13000 | Oil Filler Plug Assembly | 1 | 39 | 06094 | Seal Sleeve, GP7132 | 3 |
| 4 | 07601 | Crankcase Cover | 1 | 39 | 06794 | Seal Sleeve, GP7136 | 3 |
| 5 | 05798 | Seal for Cover | 1 | 39A | 13360 | Grooved Ring, GP7132 | 3 |
| 8 | 07603 | Oil Dip Stick | 1 | 39A | 13291 | Grooved Ring, GP7136 | 3 |
| 9 | 01009 | O-Ring, Dip Stick | 1 | 41 | 06095 | Pressure Ring, GP7132 | 3 |
| 10 | 22706 | Hexagon Screw | 8 | 41 | 06795 | Pressure Ring, GP7136 | 3 |
| 11 | 06725 | Spring Washer | 8 | 42 | 06096 | V-Sleeve, GP7132 | 6 |
| 12 | 07109 | Drain Plug | 2 | 42 | 06796 | V-Sleeve, GP7136 | 6 |
| 13 | 07182 | Gasket, Drain Plug | 2 | 43 | 06097 | Sleeve Support Ring, GP7132 | 3 |
| 14 | 05644 | Bearing Cover | 2 | 43 | 06797 | Sleeve Support Ring, GP7136 | 3 |
| 15 | 07608 | Radial Shaft Seal | 2 | 45 | 06098 | Tension Spring | 3 |
| 16 | 07184 | O-Ring, Bearing Cover | 2 | 49 | 13159 | Stud Bolt | 8 |
| 17 | 05642 | Inner Hexagon Screw | 8 | 49A | 13160 | Nut | 8 |
| 18 | 05039 | Spring Washer | 8 | 50 | 06798 | Valve Casing | 1 |
| 20 | 07610 | Taper Roller Bearing | 2 | 50A | 13162 | Cylinder Stud | 2 |
| 20A | 07611 | Fitting Disc (Shim) | 1-5 | 51 | 13146 | Inlet Valve Assy. | 3 |
| 21 | 05645 | Holder for Shaft Protector | 1 | 51A | 12056 | Support Ring | 3 |
| 21A | 05646 | Shaft Protector | 1 | 51B | 07354 | O-Ring | 3 |
| 22 | 13405 | Crankshaft | 1 | 51C | 13131 | Inlet Valve Seat | 3 |
| 23 | 07614 | Key | 1 | 51D | 13130 | Valve Plate | 3 |
| 24 | 13182 | Connecting Rod Assy. | 3 | 51E | 07062-0100 | Valve Spring | 3 |
| 24A | 07616 | Fitting Screw | 6 | 51F | 13147 | Spacer Pipe | 3 |
| 24B | 08041 | Washer | 6 | 52 | 13148 | Discharge Valve Assy. | 3 |
| 25 | 13183 | Crosshead Assy. | 3 | 52A | 12056 | Support Ring | 3 |
| 28 | 13184 | Crosshead Pin | 3 | 52B | 07354 | O-Ring | 3 |
| 30 | 07619 | Cover Plate | 1 | 52C | 13149 | Discharge Valve Seat | 3 |
| 30A | 07225-0100 | Hexagon Screw | 8 | 52D | 13130 | Valve Plate | 3 |
| 30B | 13136 | Grommet | 4 | 52E | 07062-0100 | Valve Spring | 3 |
| 30C | 08280 | Washer | 8 | 52F | 13147 | Spacer Pipe | 3 |
| 30D | 13154 | Cover | 1 | 57 | 06078 | Compression Spring | 3 |
| 31 | 07623 | Eye Bolt | 1 | 58 | 07699 | Plug | 3 |
| 32 | 07624 | Radial Shaft Seal | 3 | 58A | 07700 | O-Ring | 3 |
| 33 | 07626 | Seal Retainer | 3 | 58B | 07693 | Support Ring | 3 |
| 33A | 07627 | O-Ring, Seal Retainer | 3 | 58C | 07702 | Hexagon Screw | 12 |
| 33B | 07628 | Circlip, Seal Retainer | 3 | 59 | 07703 | Plug, 3/4" | 3 |
| 33C | 07249 | Shim | 3 | 59A | 07704 | Copper Ring for 59 | 3 |
| 34 | 13137 | Flinger | 3 | 60 | 04366 | Plug, 3/4" NPT | 1 |
| 36 | 06091 | Plunger Assembly (36A-36D) GP7132 | 3 | 61 | 12251 | Plug, 1-1/4" NPT | 1 |
| 36 | 06792 | Plunger Assembly (36A-36D) GP7136 | 3 | 62 | 07662 | Tool for valve assembly (not shown) | 1 |
| 36A | 07667 | Plunger Connection | 3 | 66 | 13362 | Disc for Crankshaft | 1 |
| 36B | 06092 | Plunger Pipe, GP7132 | 3 | 67 | 13358 | Hexagon Screw | 1 |
| 36B | 06793 | Plunger Pipe, GP7136 | 3 | | 04367 | Manifold Assembly (50-61 [w/o 51A], 3 x 51 A-B, 51D-F and 52C) | 1 |
| 36C | 07664 | Tensioning Screw | 3 | | 07662 | Valve Tool (not shown) | 1 |
| 36D | 07665 | Copper Ring | 3 | | 17212 | Gear End Assembly (1-34, 49, 49A, 50A, 66 and 67) | 1 |

GP7132 and GP7136 PUMP REPAIR KITS

Plunger Packing Kits

09519 (GP7132)

| Item | Part # | Description | Qty. |
|------|--------|-------------------|------|
| 38A | 13141 | O-Ring, Seal Case | 6 |
| 38B | 13142 | Support Ring | 6 |
| 39A | 13360 | Grooved Ring | 3 |
| 42 | 06096 | V-Sleeve | 6 |

09544 (GP7136)

| Item | Part # | Description | Qty. |
|------|--------|-------------------|------|
| 38A | 13141 | O-Ring, Seal Case | 6 |
| 38B | 13142 | Support Ring | 6 |
| 39A | 13291 | Grooved Ring | 3 |
| 42 | 06796 | V-Sleeve | 6 |

Valve Assembly Kit - #09520

| Item | Part # | Description | Qty. |
|------|------------|----------------------|------|
| 51A | 12056 | Support Ring | 6 |
| 51B | 07354 | O-Ring | 6 |
| 51C | 13131 | Inlet Valve Seat | 3 |
| 51D | 13130 | Valve Plate | 6 |
| 51E | 07062-0100 | Valve Spring | 6 |
| 52C | 13149 | Discharge Valve Seat | 3 |
| 58A | 07700 | O-Ring | 3 |
| 58B | 07693 | Support Ring | 3 |

Oil Seal Kit - # 09221

| Item | Part # | Description | Qty. |
|------|--------|-------------------|------|
| 32 | 07624 | Radial Shaft Seal | 3 |
| 33A | 07627 | O-Ring | 3 |

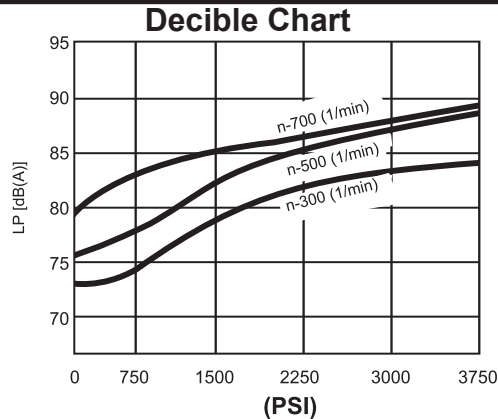
GP7136 Pump Specifications

| | <u>U.S.</u> | <u>Metric</u> |
|---------------------------------------|------------------------|--------------------------------|
| Maximum Volume** | 28.3 GPM | 107 L/min |
| Maximum Discharge Pressure** | 3625 PSI | 250 Bar |
| Maximum Speed** | | 700 RPM |
| Inlet Pressure | -4.35 to 145 PSI | -0.3 to 10 Bar |
| Plunger Diameter | 1.4" | 36mm |
| Plunger Stroke | 2.0" | 52mm |
| Crankshaft Diameter | 1.9" | 48mm |
| Key Width | 0.6" | 14mm |
| Crankshaft Mounting | | Either side |
| Shaft Rotation | | Top of pulley towards manifold |
| Temperature of Pumped Fluids | 140 °F | 60 °C |
| Inlet Ports | | (2) 1 1/4" NPT |
| Discharge Ports | | (2) 3/4" NPT |
| Weight | 374 lbs. | 170 kg. |
| Crankcase Oil Capacity* | 1.6 gallons | 6.0 L. |
| Fluid End Material | | Stainless Steel |
| Volumetric Efficiency @ 700 RPM | | 94% |
| Mechanical Efficiency @ 700 RPM | | 83% |

*If the pump is mounted on a vehicle with the possibility of unlevelness and/or the pump speed is between 300 and 500 RPM, the volume of oil should be 1.93 gallons (7.3 liters). To check, put the oil dipstick in the bore situated next to the eye bolt.

**This figure is the maximum amount for this pump. For continuous duty and/or with water warmer than 140 °F (60 °C), these values should be reduced by 10%.

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.



| GP7136 HORSEPOWER REQUIREMENTS | | | | | | |
|--------------------------------|------|----------|----------|----------|----------|----------|
| RPM | GPM | 1000 PSI | 1400 PSI | 2000 PSI | 2500 PSI | 3625 PSI |
| 300 | 11.3 | 8.1 | 11.3 | 16.1 | 20.2 | 29.3 |
| 400 | 15.0 | 10.7 | 15.0 | 21.4 | 26.8 | 38.8 |
| 550 | 20.8 | 14.9 | 20.8 | 29.7 | 37.1 | 53.9 |
| 600 | 22.6 | 16.1 | 22.6 | 32.3 | 40.4 | 58.5 |
| 650 | 25.0 | 17.9 | 25.0 | 35.7 | 44.6 | 64.7 |
| 700 | 26.4 | 18.9 | 26.4 | 37.7 | 47.1 | 68.4 |
| 750 | 28.3 | 20.2 | 28.3 | 40.4 | 50.5 | 73.3 |

HORSEPOWER RATINGS:

The rating shown are the power requirements for the pump. Gas engine power outputs must be approximately twice the pump power requirements shown above.

We recommend a 1.15 service factor be specified when selecting an electric motor as the power source.

To compute specific pump horsepower requirements, use the following formula:

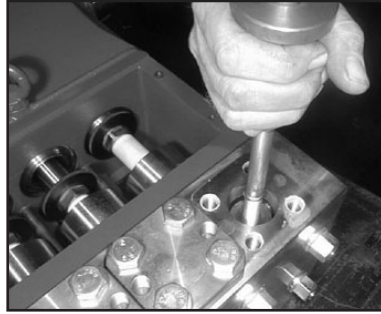
$$hp = \frac{GPM \times PSI}{1450}$$

GP7132 AND GP7136 REPAIR INSTRUCTIONS

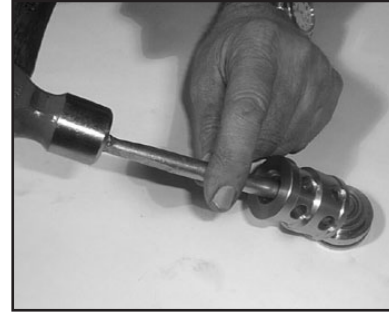
NOTE: Always take time to lubricate all metal and non-metal parts with a light film of oil before reassembling. This step will help ensure proper fit, at the same time protecting the pump non-metal parts (elastomers) from cutting and scoring.



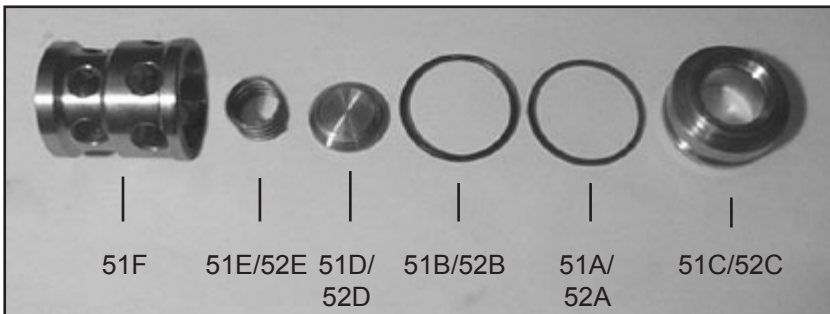
1. Loosen screws (58C), take plugs (58) out of valve casing with two screws.



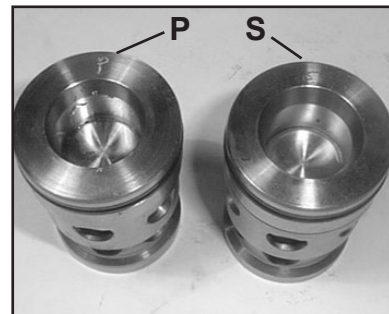
2. Take out tension spring (57) and complete valve (51) using either valve tool (part #07662) or stud bolt M16.



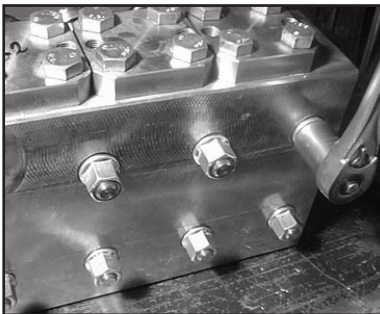
3. Valve seats (51C and 52C) are pressed out of spacer pipe (51F) by hitting the valve plate (51D/52D) with a bolt.



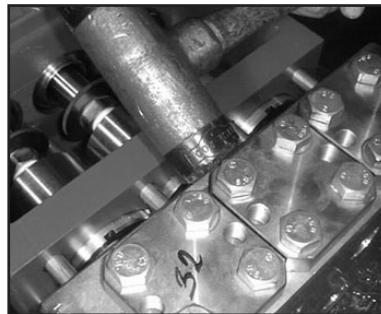
4. Check surfaces of valve plate (51D/52D), valve seat (51C/52C), O-rings (51B, 58A), and support rings (51A, 58B) and replace worn parts.



5. When reassembling: The suction valve seat (51C) is 1mm smaller in diameter than the discharge valve seat (52C). Suction valve seats are marked "S" and always have to be installed first. Discharge valve seats are marked "P" and are always to be installed on top of suction valve. Plugs (58) are to be tensioned down evenly with screws (58C) in a crosswise pattern at 155 ft-lbs. (210 Nm).

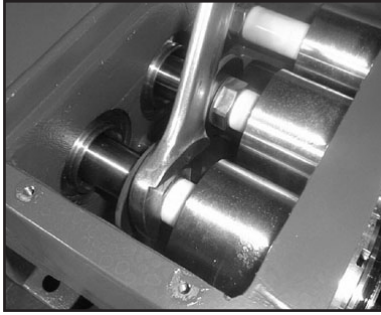


6. Loosen nuts (49A)

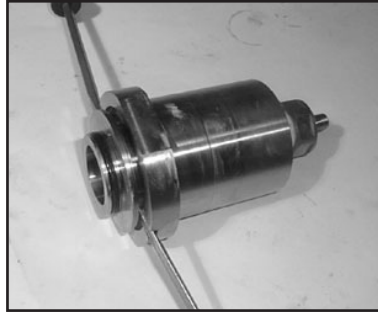


7. Remove pump head.

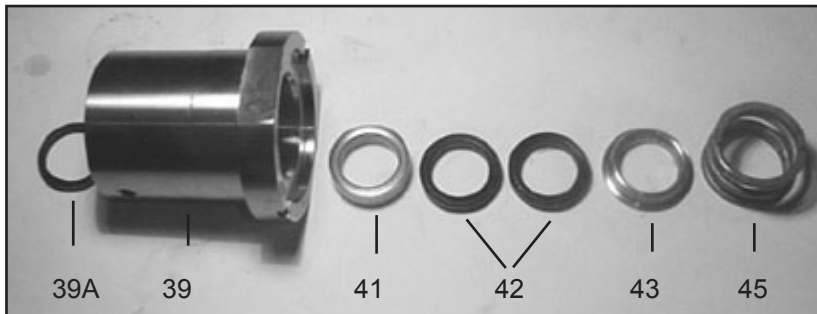
GP7132 AND GP7136 REPAIR INSTRUCTIONS



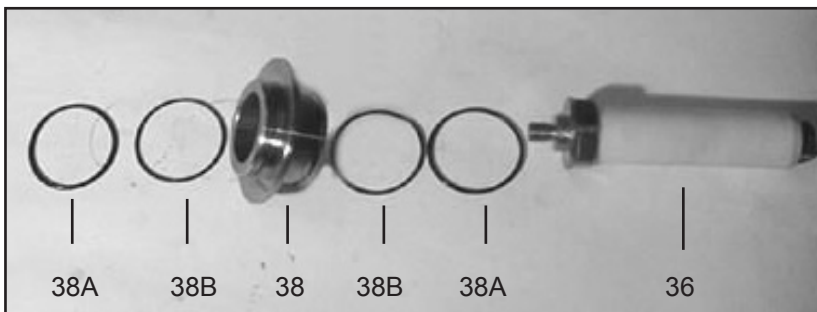
8. Separate plunger (36A) from crosshead (25) by means of one open-end wrench (M36).



9. Pull seal sleeves (39) out of their fittings in the crankcase. Take seal case (38) out of seal sleeve (39).



10. Take tension spring (45) and seal pack (41, 42, 43) out of seal sleeve. Take a thin screw driver and pry out the grooved ring (39A). **Note: This seal (39A) will not be reusable, so replace with a new part.** For the seal-pack (41-43), remove with either a socket wrench or use a screw driver to push against the rear lip of the pressure ring (41) or v-sleeves (42). You will need to remove seals evenly out of the seal sleeve (39). **Be careful not to score the sleeve or metal parts (41 & 43).**



11. Check plunger pipe (36B) and seals (39A, 42) for wear. When replacing plunger pipe (36B), tighten tensioning screw (36C) to 30 ft-lbs (40 NM). If o-rings (38A) or support rings (38B) are damaged, replace with new parts.

GP7132 AND GP7136 REPAIR INSTRUCTIONS

CAUTION: Don't loosen the 3 plunger (36) before the valve casing has been removed otherwise the plunger (36) could hit against the spacer pipe (51F) when the pump is being turned. Seal life can be increased if the pretensioning allows for a little leakage. This assists lubrication and keeps the seals cool. It is therefore not necessary to replace seals before the leakage becomes too heavy and causes output and operating pressure to drop.

MOUNTING VALVE CASING

NOTE: Replace worn parts; grease seals with silicone before installing.

12. Check O-rings (38A) and support rings (38B) on seal case (38). Clean surfaces of seal sleeves in gear box and sealing surfaces of valve casing. Reassemble seal sleeve (39) by placing plunger (36) in seal sleeve; place pressure ring (41), v-sleeves (42), sleeve support ring (43), and tension spring (45) over plunger (36). Place the seal case onto the seal sleeve and press into the crankcase, making sure that the weep hole on the seal sleeve is facing down. Tighten tensioning screw (36C) to 30 ft.-lbs. (40 Nm). Tighten plunger connection (36A) onto crosshead (25) with an open end wrench (M36) to 33 ft.-lbs. (45 Nm).
13. Push valve casing carefully onto O-rings of seal case and centering studs (50A). Tighten nuts (49A) to 103 ft.-lbs. (140 Nm).

TO DISASSEMBLE GEAR

14. Take out plunger (36) and seal sleeves (39) as described above. Drain oil.
15. After removing the circlip ring (33B), lever out seal retainer (33) with a screw driver. Check seals (32,32A,33A) and surfaces of crosshead.
16. Remove crankcase cover (4). Loosen inner hexagon screws on the connecting rods (24) and push con rod halves as far into the crosshead guide as possible.

IMPORTANT: Connecting rods are marked for identification. Do not twist con rod halves. Con Rod is to be reinstalled in the same position on shaft journals.

17. Check surfaces of connecting rod and crankshaft (22). Take out bearing cover (14) to one side and push out crankshaft taking particular care that the connecting rod (24) doesn't bend.

CAUTION: Seal (32A) must always be installed so that the seal-lip on the inside diameter faces the oil. Reassemble in reverse order: Regulate axial bearing clearance - minimum 0.1mm, maximum 0.15mm-by means of fitting disc (20A). The crankshaft (22) should turn easily with little clearance. Tighten fitting screws (24A) to 30 ft.-lbs. (40 Nm).

CAUTION: Connecting rod (24) must have some sidewise movement at the stroke journals.

GP7132 and GP7136 TORQUE SPECIFICATIONS

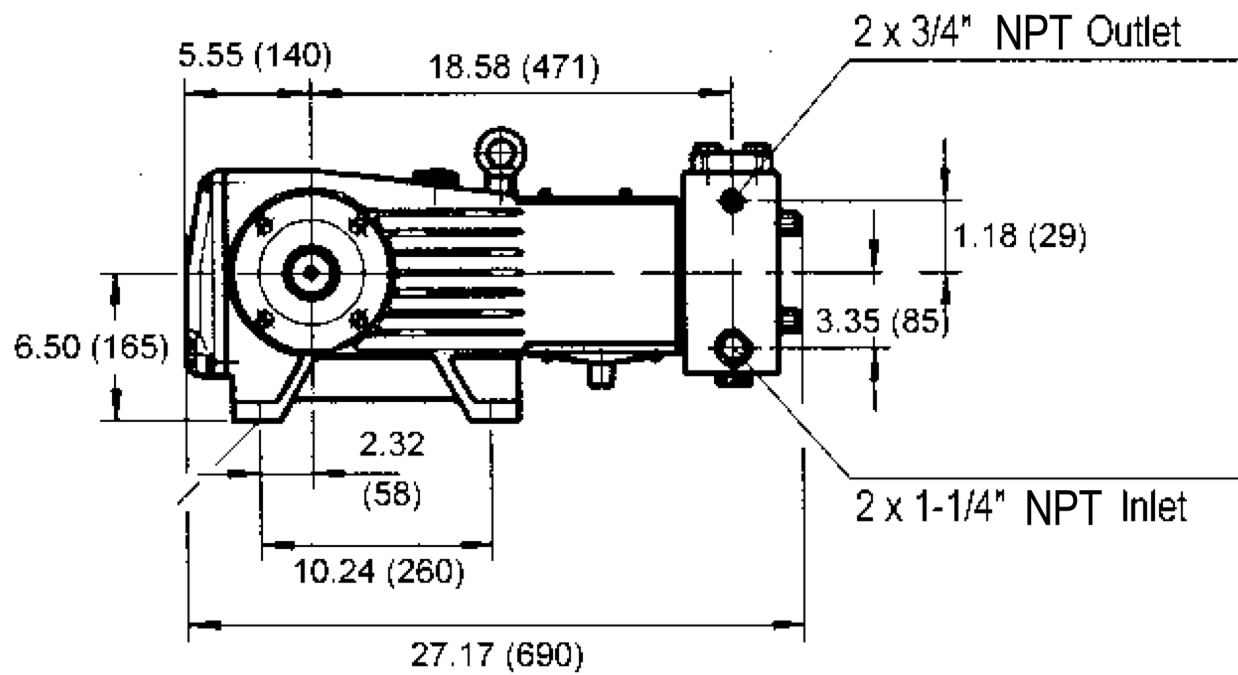
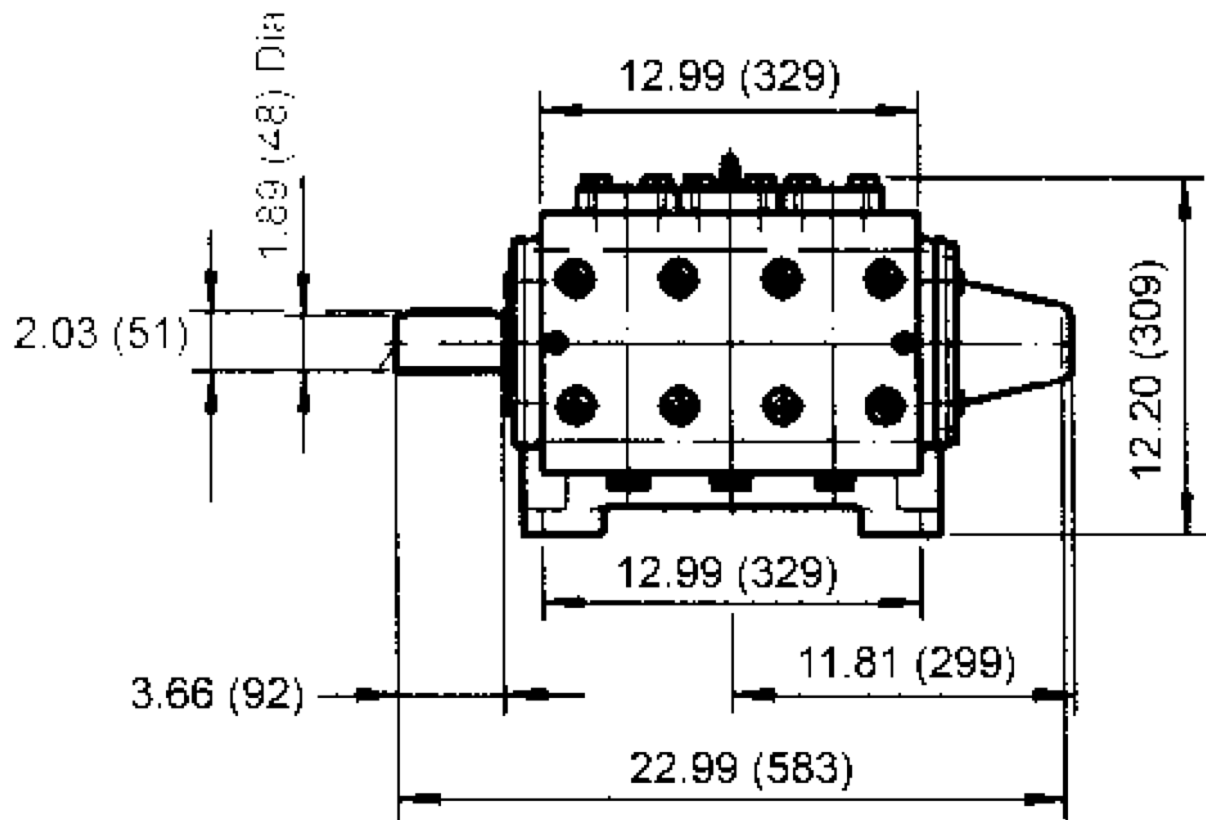
| <u>Position</u> | <u>Item#</u> | <u>Description</u> | <u>Torque Amount</u> |
|-----------------|--------------|--------------------|-----------------------|
| 24A | 07616 | Fitting Screw | 30 ft.-lbs. (40 Nm) |
| 36A | 07667 | Plunger Base | 33 ft.-lbs. (45 Nm) |
| 36C | 07664 | Tensioning Screw | 30 ft.-lbs. (40 Nm) |
| 49A | 13160 | Nut | 103 ft.-lbs. (140 Nm) |
| 58C | 07702 | Hexagon Screw | 155 ft.-lbs. (210 Nm) |

PUMP SYSTEM MALFUNCTION

| <u>MALFUNCTION</u> | <u>CAUSE</u> | <u>REMEDY</u> |
|--|--|--|
| The Pressure and/ or the Delivery Drops | Worn packing seals Broken valve spring Belt slippage Worn or Damaged nozzle Fouled discharge valve Fouled inlet strainer Worn or Damaged hose Worn or Plugged relief valve on pump Cavitation pump for restrictions Unloader | Replace packing seals Replace spring Tighten or Replace belt Replace nozzle Clean valve assembly Clean strainer Repair/Replace hose Clean, Reset, and Replace worn parts Check suction lines on inlet of Check for proper operation |
| Water in crankcase | High humidity Worn seals | Reduce oil change interval Replace seals |
| Noisy Operation | Worn bearings Cavitation | Replace bearings, Refill crankcase oil with recommended lubricant Check inlet lines for restrictions and/or proper sizing |
| Rough/Pulsating Operation with Pressure Drop | Worn packing Inlet restriction Accumulator pressure Unloader Cavitation | Replace packing Check system for stoppage, air leaks, correctly sized inlet plumbing to pump Recharge/Replace accumulator Check for proper operation Check inlet lines for restrictions and/or proper size |
| Pump Pressure as Drop at gun Rated, Pressure | Restricted discharge plumbing | Re-size discharge plumbing to flow rate of pump |
| Excessive Leakage | Worn plungers Worn packing/seals Excessive vacuum Cracked plungers Inlet pressure too high | Replace plungers Adjust or Replace packing seals Reduce suction vacuum Replace plungers Reduce inlet pressure |
| High Crankcase Temperature | Wrong Grade of oil Improper amount of oil in crankcase | Giant oil is recommended Adjust oil level to proper amount |

| Preventative Maintenance Check-List & Recommended Spare Parts List | | | | | | |
|---|-------|--------|-------|---------------|----------------|----------------|
| Check | Daily | Weekly | 50hrs | Every 500 hrs | Every 1500 hrs | Every 3000 hrs |
| Oil Level/Quality | X | | | | | |
| Oil Leaks | X | | | | | |
| Water Leaks | X | | | | | |
| Belts, Pulley | | X | | | | |
| Plumbing | | X | | | | |
| Recommended Spare Parts | | | | | | |
| Oil Change (1 Gal) p/n 1154 | | | X | X | | |
| Plunger Packing Kits (1 kit/ pump) (See page 5 for kit list) | | | | | X | |
| Valve Assembly Kit (1 kit/ pump) (See page 5 for kit list) | | | | | | X |
| Oil Seal Kit (1 kit/pump) (See page 5 for kit list) | | | | | X | |

GP7132 and GP7136 Dimensions - Inches (mm)



GIANT INDUSTRIES LIMITED WARRANTY

Giant Industries, Inc. pumps and accessories are warranted by the manufacturer to be free from defects in workmanship and material as follows:

1. For portable pressure washers and self-serve car wash applications, the discharge manifolds will never fail, period. If they ever fail, we will replace them free of charge. Our other pump parts, used in portable pressure washers and in car wash applications, are warranted for five years from the date of shipment for all pumps used in NON-SALINE, clean water applications.
2. One (1) year from the date of shipment for all other Giant industrial and consumer pumps.
3. Six (6) months from the date of shipment for all rebuilt pumps.
4. Ninety (90) days from the date of shipment for all Giant accessories.

This warranty is limited to repair or replacement of pumps and accessories of which the manufacturer's evaluation shows were defective at the time of shipment by the manufacturer.

The following items are NOT covered or will void the warranty:

1. Defects caused by negligence or fault of the buyer or third party.
2. Normal wear and tear to standard wear parts.
3. Use of repair parts other than those manufactured or authorized by Giant.
4. Improper use of the product as a component part.
5. Changes or modifications made by the customer or third party.
6. The operation of pumps and or accessories exceeding the specifications set forth in the Operations Manuals provided by Giant Industries, Inc.

Liability under this warranty is on all non-wear parts and limited to the replacement or repair of those products returned freight prepaid to Giant Industries which are deemed to be defective due to workmanship or failure of material. A Returned Goods Authorization (R.G.A.) number and completed warranty evaluation form is required prior to the return to Giant Industries of all products under warranty consideration. Call (419)-531-4600 or fax (419)-531-6836 to obtain an R.G.A. number.

Repair or replacement of defective products as provided is the sole and exclusive remedy provided hereunder and the MANUFACTURER SHALL NOT BE LIABLE FOR FURTHER LOSS, DAMAGES, OR EXPENSES, INCLUDING INCIDENTAL AND CONSEQUENTIAL DAMAGES DIRECTLY OR INDIRECTLY ARISING FROM THE SALE OR USE OF THIS PRODUCT.

THE LIMITED WARRANTY SET FORTH HEREIN IS IN LIEU OF ALL OTHER WARRANTIES OR REPRESENTATION, EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION ANY WARRANTIES OR MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE AND ALL SUCH WARRANTIES ARE HEREBY DISCLAIMED AND EXCLUDED BY THE MANUFACTURER.