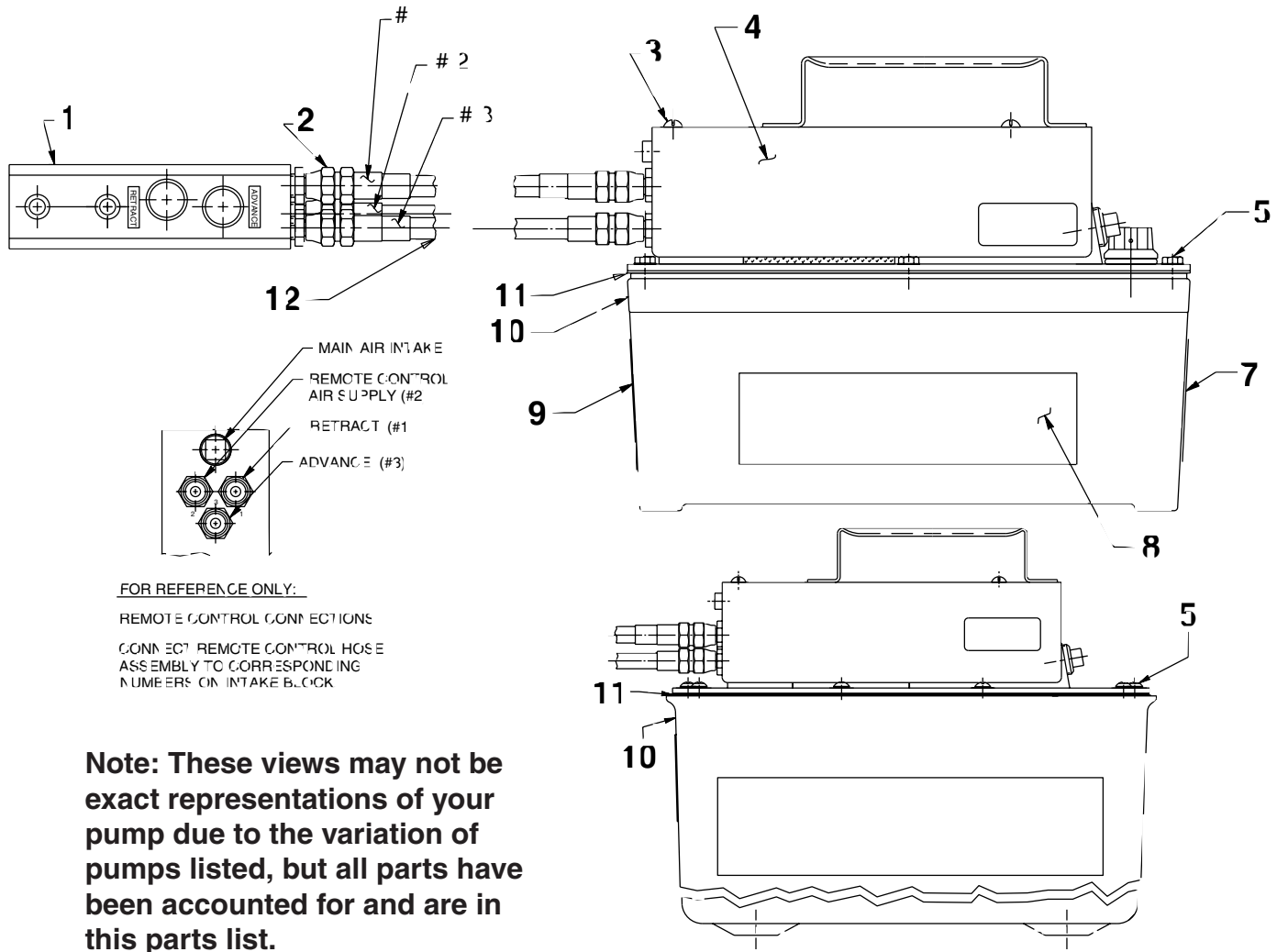


**MODEL G  
AIR HYDRAULIC PUMP**

This section is for these following models:

PA50R	PA50RV
PA50RE	PA50R2
PA50RM	PA50R2E
PA50RN	PA50R2N
	PA50R2V



FOR REFERENCE ONLY:  
REMOTE CONTROL CONNECTIONS  
CONNECT REMOTE CONTROL HOSE  
ASSEMBLY TO CORRESPONDING  
NUMBERS ON INTAKE BLOCK

**Note: These views may not be exact representations of your pump due to the variation of pumps listed, but all parts have been accounted for and are in this parts list.**

Two gal on reservoir

# Parts List, Form No. 101954, Back sheet 1 of 4

Item No.	Part No.	No. Req'd	Description
1	<b>44025</b>	1	Remote Hand Switch Assembly (For all except PA50R2; See form #100426)
	<b>421265</b>	1	Remote Hand Switch Assembly (For PA50R2; See form #100426)
2	<b>208218</b>	6	Straight Fitting (1/8 NPTF; For PA50R, PA50RM & PA50R2)
3	<b>10164</b>	4	Screw (10-24 X 3/8)
4	<b>41605BK2</b>	1	Shroud
5	<b>211060</b>	6	Screw (9-15 X 1"; For plastic reservoir; Torque to 25/35 in. lbs.)
	<b>215952</b>	6	Screw (10-24 X 5/8; For metal reservoir)
	<b>252168</b>	10	Screw (1/4-10 X 1"; For PA50R2)
7	<b>251762</b>	1	Warning Decal (For PA50R, PA50RM, PA50R2, PA50R2E, PA50R2N & PA50R2V)
8	<b>305496CE</b>	1	Tradename Decal (For PA50R, PA50RM)
	<b>309219CE</b>	1	Tradename Decal (For PA50R2)
9	<b>305494</b>	1	Instruction Decal (For PA50R2, PA50R2E, PA50R2N & PA50R2V)
10	<b>61243</b>	1	Reservoir (plastic)
	<b>41300WH2</b>	1	Reservoir (metal)
	<b>61165</b>	1	Reservoir (For PA50R2)
11	<b>*33853</b>	1	Reservoir Gasket (For all except PA50R2, PA50R2N, PA50R2V & PA50R2E)
	<b>*47409</b>	1	Reservoir Gasket (For PA50R2, PA50R2E, PA50R2N & PA50R2V)
12	<b>45052</b>	12'	Three-Strand Hose (For PA50R, PA50RM & PA50R2; Note: Connect hose ass'y to hand control and pump as shown. Color coded or numbered ends must correspond to numbers on the hand control and pump unit.)

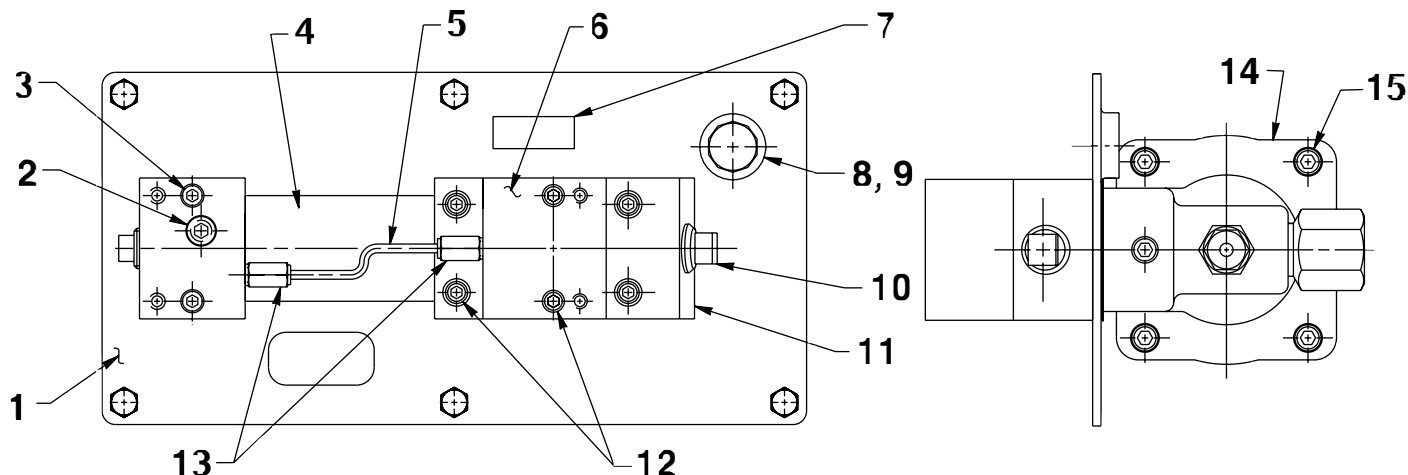
### PARTS INCLUDED BUT NOT SHOWN

<b>252168</b>	4	Screw (1/4-10 X 1"; For pump mounting purposes only.; For PA50R2)
<b>211060</b>	4	Screw (9-15 X 1"; For pump mounting purposes only.; For PA50R)

Part numbers marked with an asterisk (\*) are contained in a repair kit see sheet 4 of 4 for individual repair kit information.



TOP & END VIEWS



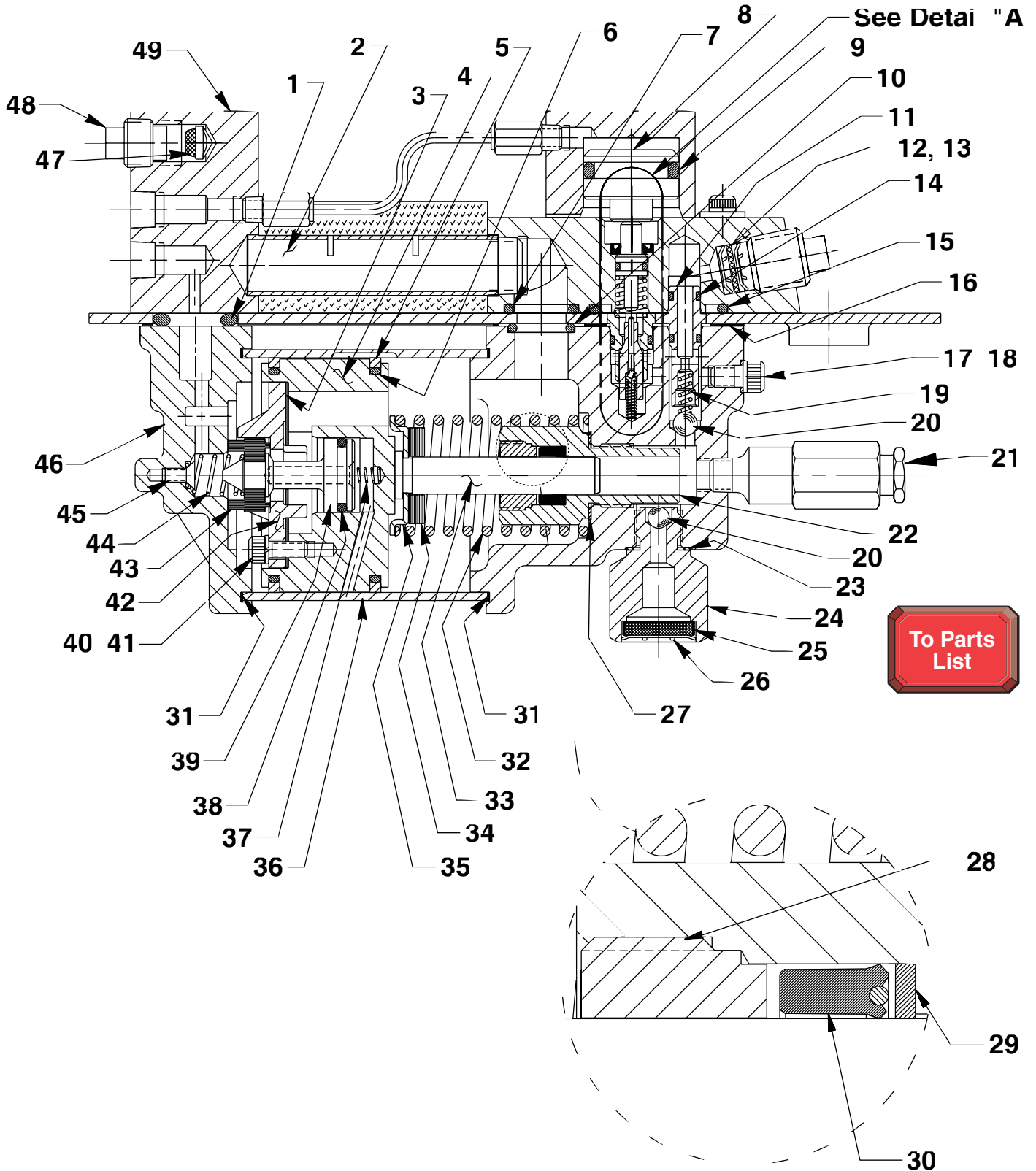
**Note:** These views may not be exact representations of your pump due to the variation of pumps listed, but all parts have been accounted for and are in this parts list.

Item No.	Part No.	No. Req'd	Description
1	<b>420965BK2</b>	1	Cover Plate (For all except PA50R2, PA50R2E, PA50R2N & PA50R2V)
	<b>58706BK2</b>	1	Cover Plate (For PA50R2, PA50R2E, PA50R2N & PA50R2V)
2	<b>15499</b>	1	Plug Fitting (1/8 PTF)
3	<b>14423</b>	2	Screw (10-24 X 2)
4	<b>*29992</b>	1	Foam Tube
5	<b>14281</b>	.3 ft	Nylon Tubing
6	<b>34759</b>	1	Piston Relief Valve Body
7	<b>205724</b>	1	Attention Decal (For PA50RV & PA50R2V)
	<b>250328</b>	1	Attention Decal (For PA50RE & PA50R2E)
8	<b>251689</b>	1	Filler/Breather Cap
9	<b>*10273</b>	1	O-ring (.81 X .62; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)
	<b>18999</b>	1	O-ring (.81 X .62; For PA50RV & PA50R2V)
	<b>250157</b>	1	O-ring (.81 X .62; For PA50RE & PA50R2E)
10	<b>58682</b>	1	Release Valve Body
11	<b>11127</b>	1	Plug Fitting (3/8 NPTF)
12	<b>11151</b>	6	Screw (10-24 X 1-1/4"; Torque to 50/60 in. lbs.)
13	<b>250725</b>	2	Straight Fitting (1/16 NPTF)
14	<b>64767</b>	1	Pump Body
15	<b>17428</b>	4	Screw (1/4-20 X 3-1/2"; Torque to 85/95 in. lbs. oiled; Note: Cross torque in increments of 30 in. lbs.)

Part numbers marked with an asterisk (\*) are contained in a repair kit see sheet 4 of 4 for individual repair kit information.

### BASIC PUMP ASSEMBLY

Note: These views may not be exact representations of your pump due to the variation of pumps listed, but all parts have been accounted for and are in this parts list.



Item No.	Part No.	No. Req'd	Description	Item No.	Part No.	No. Req'd	Description
1	*251717	1	O-ring (1.0 X .62; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)	14	*12522	2	O-ring (.37 X .25; Urethane; For all except PA50RV, PA50RE, PA50R2V & PA50R2E)
	251718	1	O-ring (1.0 X .62; For PA50RV & PA50R2V)		11438	2	O-ring (.37 X .25; For PA50RV & PA50R2V)
	251719	1	O-ring (1.0 X .62; For PA50RE & PA50R2E)		17715	2	O-ring (.37 X .25; For PA50RE & PA50R2E)
2	28387	1	Muffler	15	*11841	1	O-ring (1.62 X 1.37; For all except PA50RV, PA50RE, PA50R2V & PA50R2E)
3	*28239	1	Gasket		19035	1	O-ring (1.62 X 1.37; For PA50RV & PA50R2V)
4	52390	1	Piston Body		251695	1	O-ring (1.63 X 1.38; For PA50RE & PA50R2E)
5	*14265	2	Piston Ring (2.77 X 2.54)	16	*351021	1	Cover Plate Gasket
6	*251835	2	O-ring (2-1/2" X 2-5/16" X 3/32; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)	17	*10442	1	Copper Washer (.37 X .25)
	251865	2	O-ring (2.31 X 2.12; For PA50RV & PA50R2V)	18	10002	1	Screw (1/4-20 X 3/8; Torque to 90/110 in. lbs.)
	251866	2	O-ring (2.31 X 2.12; For PA50RE & PA50R2E)	19	*10445	1	Spring (.16 O.D. X .72)
7	*10276	1	O-ring (1.0 X .75; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)	20	*10423	2	Ball (9/32" dia.)
	19026	1	O-ring (1.0 X .75; For PA50RV & PA50R2V)	21	-----	-	Relief Valve (When ordering a replacement relief valve refer to stamped number on the outside of the relief valve. See note below. Apply Loctite 592 [Power Team #905516] or equiv. & torque to 150/170 in. lbs.)
	250188	1	O-ring (1.0 X .75; For PA50RE & PA50R2E)	22	421642	1	Cylinder Blank (Torque to 90/100 ft. lbs. oiled)
8	*10272	1	O-ring (.75 X .56; For all except PA50RV, PA50RE, PA50R2E & PA50R2V)	23	*10261	1	Copper Washer (.75 X .60)
	18998	1	O-ring (.75 X .56; For PA50RV & PA50R2V)	24	48010	1	Filter Adapter (For all except PA50R2, PA50R2N, PA50R2V & PA50R2E; Torque to 40/50 ft. lbs. oiled; See sheet 4 of 4 for pumps with 2 gal. reservoirs.)
	250194	1	O-ring (.75 X .56; For PA50RE & PA50R2E)	25	214578	1	Filter (For all reservoir sizes except 2 gal. reservoirs built after June 1, 1998)
9	34757	1	Piston Release	26	214586	1	Internal Retaining Ring (.63 X .015; For all reservoir sizes except 2 gal. reservoirs built after June 1, 1998)
10	*208144	1	O-ring (1.12 X .87; For all except PA50RE, PA50RV, PA50R2E & PA50R2V; Apply lubricant)	27	*10263	1	Special Washer (1.0 X .77)
	19028	1	O-ring (1.12 X .87; For PA50RV & PA50R2V; Apply lubricant)				<b>-Continued-</b>
	19386	1	O-ring (1.12 X .87; For PA50RE & PA50R2E; Apply lubricant)				
11	34378	1	Check Valve Body				
12	*250638	1	Oil Filter Disc				
13	*11088	2	Internal Retaining Ring (.31 X .010)				

Part numbers marked with an asterisk (\*) are contained in a repair kit see sheet 4 of 4 for individual repair kit information.

**NOTE:**

Standard relief valves are set at 10,100/10,700 PSI.  
 Relief valves pre-set at special settings are available.  
 Refer to your pump model number or contact Power Team Technical Services.



# Parts List, Form No. 101954, Back sheet 3 of 4

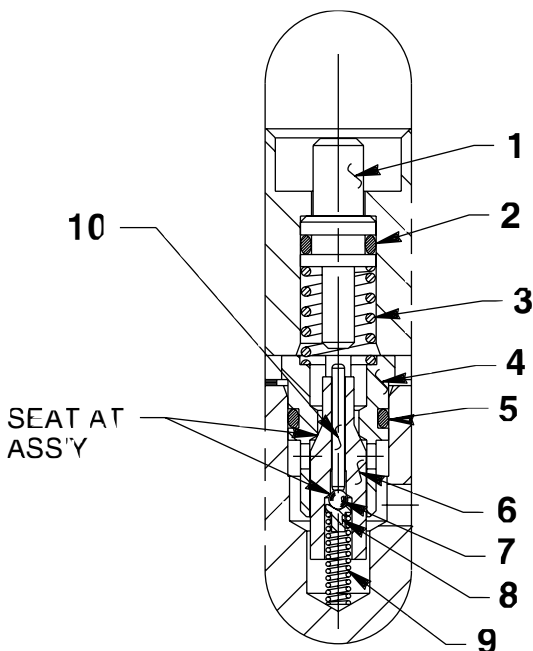
Item No.	Part No.	No. Req'd	Description
28	<b>*351662</b>	1	Retainer (Note: See "INSTRUCTIONS FOR RETAINER REPLACEMENT" on back sheet 4 of 4.)
29	<b>*12488</b>	1	Backup Washer
30	<b>*253095</b>	1	U-Cup
31	<b>*17429</b>	2	Backup Washer (.94 x .75)
32	<b>*13938</b>	1	Spring (1.45 O.D. x 4.4)
33	<b>28400</b>	1	Piston (7/16")
34	<b>202613</b>	1	Bumper
35	<b>211082</b>	1	Spring Guide
36	<b>37434</b>	1	Air Cylinder (Note: Locate groove on upper half (top) of pump with chamfered tube end towards rear head as shown.)
37	<b>*12692</b>	1	Spring (.18 O.D. X 1.70)
38	<b>*211052</b>	1	O-ring (.90 X .70; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)
	<b>250192</b>	1	O-ring (.90 X .70; For PA50RV & PA50R2V)
	<b>250193</b>	1	O-ring (.90 X .70; For PA50RE & PA50R2E)

Item No.	Part No.	No. Req'd	Description
39	<b>305475</b>	1	Exhaust Valve Stem
40	<b>*10241</b>	3	Lockwasher (.33 X .20)
41	<b>211054</b>	3	Screw (10-24 X 1/2; Torque to 50/55 in. lbs.)
42	<b>33822</b>	1	Piston End Plate Casting
43	<b>*28183</b>	1	Piston Poppet
44	<b>*205679</b>	1	Spring (.49 O.D. X .92)
45	<b>*205674</b>	1	Screw (8-32 X 3/8; Torque to 12/18 in. lbs.)
46	<b>51480</b>	1	Rear Head
47	<b>*216296</b>	1	Filter
48	<b>13272</b>	1	Plug Fitting (1/4 NPT)
49	<b>41601</b>	1	Manifold



Part numbers marked with an asterisk (\*) are contained in a repair kit see sheet 4 of 4 for individual repair kit information.

## DETAIL "A-2"



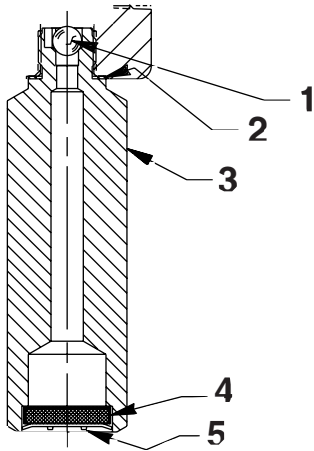
Item No.	Part No.	No. Req'd	Description
1	<b>28227</b>	1	Release Valve Button
2	<b>*10266</b>	1	O-ring (.37 X .25; For all except PA50RE, PA50RV, PA50R2E & PA50R2V)
	<b>11438</b>	1	O-ring (.37 X .25; For PA50RV & PA50R2V)
	<b>17715</b>	1	O-ring (.37 X .25; For PA50RE & PA50R2E)
3	<b>*13944</b>	1	Spring (.36 O.D. X .50)
4	<b>34377</b>	1	Poppet Retainer
5	<b>*15279</b>	1	O-ring (.50 X .37; For all except PA50RV, PA50RE, PA50R2V & PA50R2E)
	<b>19775</b>	1	O-ring (.50 X .37; For PA50RV & PA50R2V)
	<b>17716</b>	1	O-ring (.50 X .37; For PA50RE & PA50R2E)
6	<b>29037</b>	1	Release Valve Poppet
7	<b>*14443</b>	1	Ball (3/32")
8	<b>209736</b>	1	Ball Retainer
9	<b>*13959</b>	1	Spring (.12 O.D. X .50)
10	<b>13937</b>	1	Dowel Pin (.06 X .63; Note: Place tapered end toward ball.)

Part numbers marked with an asterisk (\*) are contained in a repair kit see sheet 4 of 4 for individual repair kit information.

Note: Shaded areas reflect last revision(s) made to this form.

### FILTER ADAPTER ASSEMBLY BEFORE 6/1/98

For 2 Gallon Reservoirs Only

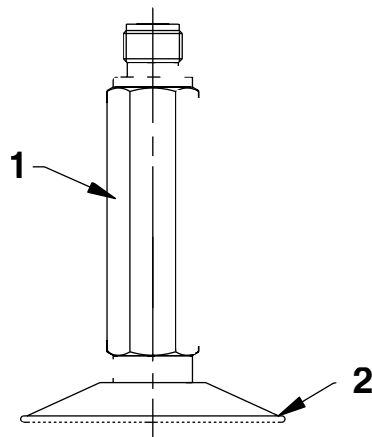


Item No.	Part No.	No. Req'd	Description
1	*10423	1	Ball (9/32 Dia.)
2	*10261	1	Special Washer (3/4 x 19/32 x 1/32)
3	48008	1	Filter Adapter (Torque to 40/50 ft. lbs., oiled; For PA50R2, PA50R2N, PA50R2V & PA50R2E)
4	214578	1	Filter
5	214586	1	Retaining Ring (.63 x .015)

Part numbers marked with an asterisk (\*) are contained in a Repair Kit see sheet 4 of 4 for individual repair kit information.

### FILTER ADAPTER ASSEMBLY AFTER 6/1/98

For 2 Gallon Reservoirs Only  
(Reference Part Number 48008)



Item No.	Part No.	No. Req'd	Description
1	422017	1	Filter Adapter
2	29682	1	Filter

### REPAIR KITS

**No. 300961**

PA50R2  
PA50R2N

**No. 300965**

PA50R  
PA50RM  
PA50RN

## INSTRUCTIONS FOR RETAINER REPLACEMENT

Your pump's retainer is locked into place by one of the two following methods. Determine which method was used on your pump's retainer, then follow the appropriate steps to remove the old and install and stake the new.

### Method 1 - Retainer shows no sign of stake marks

1. This retainer has been locked in place with a Loctite product. To replace it, a moderate amount of heat needs to be applied to the cylinder nut (in the area of the retainer) to soften the existing Loctite allowing it to be removed.
2. Install the new retainer into the cylinder nut and torque to 80/100 in. lbs. **Note: Do not use a Loctite product this time but stake the new retainer in place according to instructions in Step 3.**
3. To lock retainer into place, use a center punch positioned in the seam between the retainer and the cylinder nut and stake the new retainer in two places approximately 180° apart.

### Method 2 - Retainer has two stake marks in the seam between the retainer and the cylinder nut

1. For replacement of this retainer, the stake marks must be removed. Using a 1/8" or larger diameter drill bit, remove the existing stakes by drilling a short distance into the stake marks. Remove the retainer.
2. Install the new retainer into the cylinder nut and torque to 80/100 in. lbs.
3. To lock retainer into place, use a center punch positioned in the seam between the retainer and the cylinder nut and stake the new retainer in two places approximately 180° apart.

**NOTE: Do not stake in the old stake marks.**

