

Service

Service Kits

Service Kits may be ordered separately.

To repair the air valve, order Part No. 238853. Parts included in the Air Valve Service Kit are marked with an asterisk in the **Parts Drawing** on page 17, for example (3*).

For fluid section repair section parts, see the **Service Kit Matrix** on page 15. Parts included in the Fluid Section Service Kit are marked with a dagger in the **Parts Drawing** on page 17, for example (4†).

Servicing the Air Valve

Service the air valve as follows. See Fig. 4.

1. **Relieve the fluid pressure**, and disconnect air line from the pump.

WARNING

To reduce the risk of serious injury whenever you are instructed to relieve pressure, always follow the **Pressure Relief Procedure** on page 8.

2. Remove the four screws (14) that hold the valve cover (7) on the center housing (1).
3. Remove the valve block (4) and valve carriage (2), and replace the u-cups (3). Replace the valve carriage and valve block. When you replace the valve carriage, position it all the way to one side or the other.

NOTE: The valve block shown in Fig. 4 is for pumps with an air-operated air motor. If your pump has a solenoid-operated air motor, this step does not pertain. Items 2, 3, 4, 16, and 17 are not required.

4. Clean any parts that are dirty.
5. Replace the valve cover (7), replace the screws (14), and torque the screws to 40 in-lb (4.5 N.m).
6. Reconnect the pump.

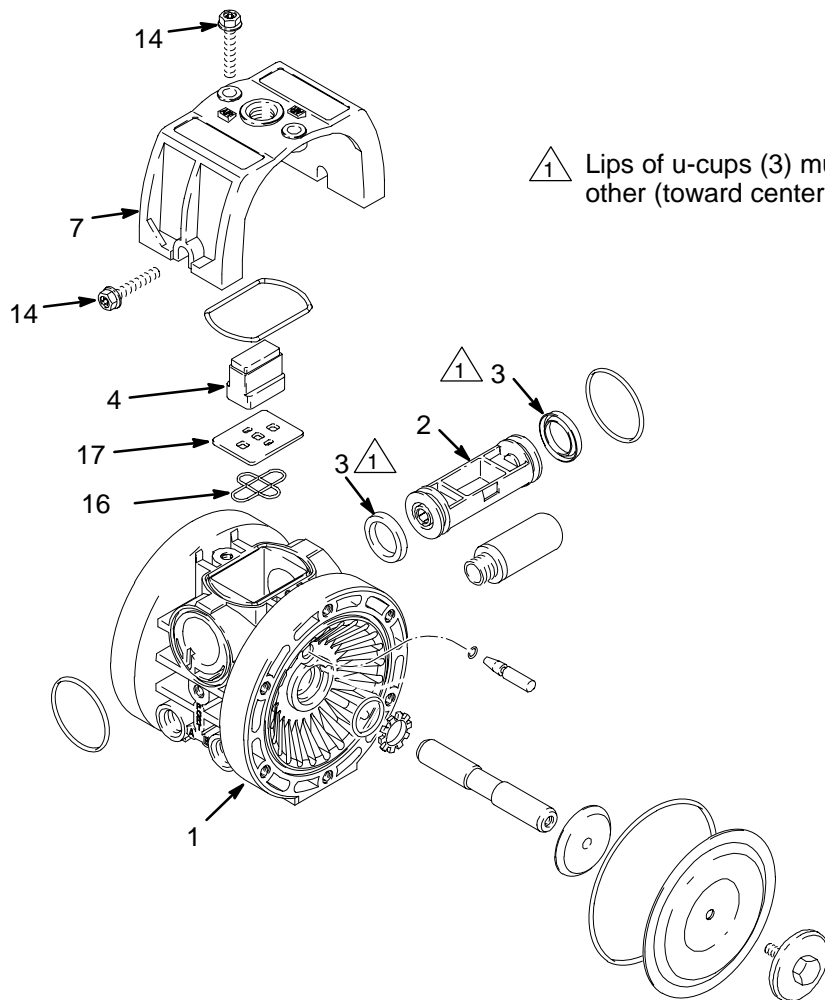


Fig. 4

06177C

Service

Replacing Diaphragms

Replace the diaphragms as follows. See Fig. 5 and Fig 6.

1. **Relieve the pressure**, and disconnect the air line from the pump.

⚠ WARNING

To reduce the risk of serious injury whenever you are instructed to relieve pressure, always follow the **Pressure Relief Procedure** on page 8.

2. Remove the eight screws (58) that fasten the two fluid covers (51) to manifold (52), and remove the fluid cover/center housing assembly from the manifold.
3. Remove the six screws (58) that fasten each fluid cover (51) to the center housing (1), and pull the fluid covers off of the center housing.
4. Remove the diaphragm plates (50) from the shaft (10), and remove the diaphragms (30), and air-side diaphragm plates (11).
5. Remove the diaphragm pins (8), remove and replace the o-rings (9), and reinstall the diaphragm pins in the center housing (1).
6. Reinstall the diaphragm shaft (10).
7. Install the new diaphragms (30) with the concave side toward the center housing (1).
8. Screw the diaphragm plates (50) onto the shaft (10), and torque to 40 in-lb (4.5 N.m).
9. Replace the fluid covers (51) on the center housing (1), replace the screws (58) that fasten the fluid covers to the center housing, and torque the screws to 40 in-lb (4.5 N.m).
10. Replace the manifold covers/center housing assembly on the manifold (52), replace the screws (58) that fasten the manifold covers/center housing assembly to the manifold, and torque the screws to 40 in-lb (4.5 N.m).
11. Reconnect the pump.

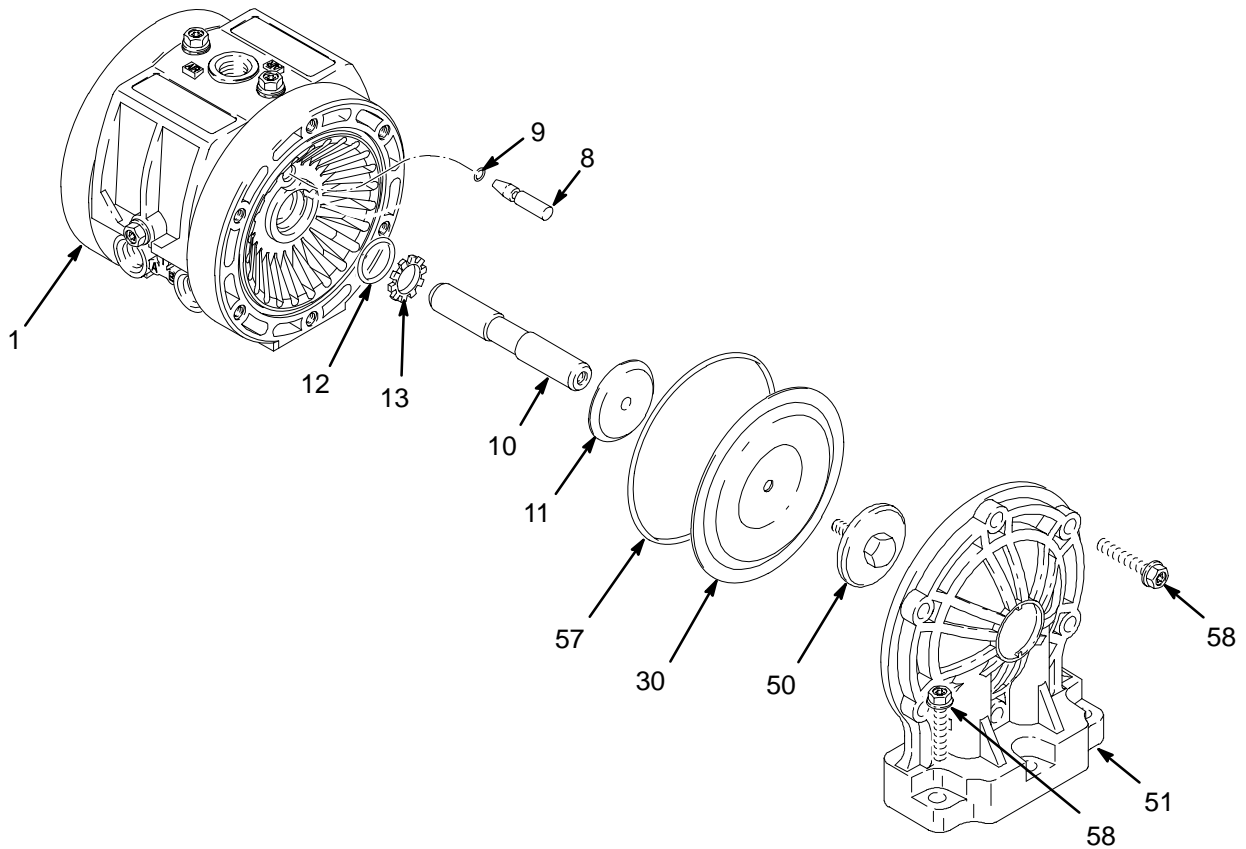


Fig. 5

06180C

Service

Replacing Check Valves

Replace each pair of check valves as follows. See Fig. 6.

1. **Relieve the pressure**, and disconnect the air line from the pump.

WARNING

To reduce the risk of serious injury whenever you are instructed to relieve pressure, always follow the **Pressure Relief Procedure** on page 8.

2. Remove the eight screws (58) that hold the fluid cover/center housing assembly on the manifold (52), and lift the manifold covers/center housing assembly off of the manifold (52).
3. Remove and replace the check valves (20), **being careful to orient each check valve exactly like the one it is replacing**. Make sure the check valve/seat area is clean.
4. Remove and replace the sealing o-rings (21). Once compressed, o-rings may not be reused. Make sure the check valve/seat area is clean.
5. Replace the manifold covers/center housing assembly on the manifold (52), replace the screws (58) that fasten the manifold covers/center housing assembly to the manifold, and torque the screws to 40 in-lb (4.5 N.m).
6. Reconnect the pump.

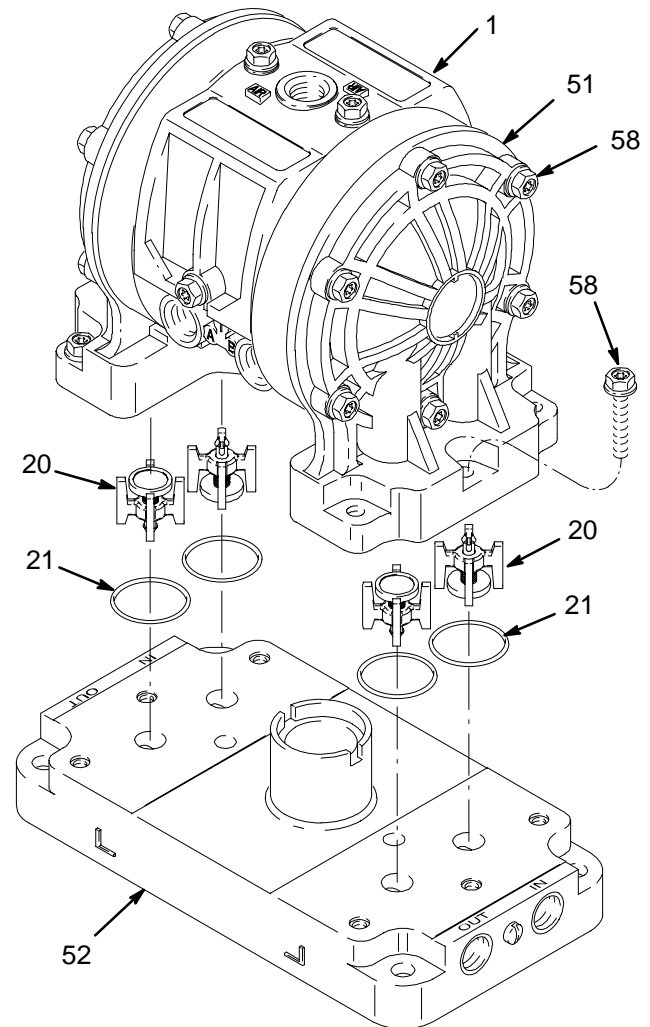


Fig. 6

06178A

Parts

Air Motor Section (matrix column 2)

Digit	Ref. No.	Part No.	Description	Qty.
1	1	276572	HOUSING, center	1
	2	191157	CARRIAGE, valve	1
	3	113869	SEAL, u-cup	2
	4	194533	VALVE BLOCK <i>(for pump with air-operated air motor)</i>	1
	5	191160	GASKET, molded	1
	6	115056	O-RING, packing	2
	8	191021	PIN, actuator	2
	9	113565	O-RING, packing	2
	10	193778	SHAFT, diaphragm	1
	11	193775	PLATE, diaphragm, air side	2
	12	114710	O-RING, diaphragm shaft	2
	13	114711	RING, retaining	2
	14	113341	SCREW, torx	4
	15	114174	MUFFLER, porous plastic	1
	16	194386	SEAL, valve plate	1
	17	194384	PLATE, valve	1
	2	1	193772	HOUSING, center
10		193778	SHAFT, diaphragm	1
11		193775	PLATE, diaphragm, air side	1
12		114710	O-RING, diaphragm shaft	2
13		114711	RING, retaining	2
14		113341	SCREW, torx	4
15		114174	MUFFLER, porous plastic	1

Fluid Section (matrix column 3)

Digit	Ref. No.	Part No.	Description	Qty.
1	7	191140	COVER, valve	1
	49	290229	LABEL, warning	1

	50	191553	PLATE, diaphragm; acetal	2
	51	276474	COVER, fluid; acetal	2
	52	276471	MANIFOLD; acetal	1
	53	113576	PLUG, port; acetal	2
	54	100264	SCREW, grounding	2
	55	100179	NUT, hex , grounding	2
	57	113570	O-RING, packing	2
	58	113341	SCREW, torx	20
	59	115055	O-RING, exhaust	1
	60	194986	BRACKET, mounting	1
	61	111630	SCREW, machine, pn hd	4
2	7	191140	COVER, valve	1
	49	290229	LABEL, warning	1
	50	191141	PLATE, diaphragm; polypropylene	2
	51	276473	COVER, fluid; polypropylene	2
	52	276470	MANIFOLD; polypropylene	1
	53	113577	PLUG, port; polypropylene	2
	57	113570	O-RING, packing	2
	58	113341	SCREW, torx	20
	59	115055	O-RING, exhaust	1
	60	194986	BRACKET, mounting	1
	61	111630	SCREW, machine, pn hd	4
5	7	191140	COVER, valve	1
	49	290229	LABEL, warning	1
	50	191554	PLATE, diaphragm; Kynar®	2
	51	276475	COVER, fluid; Kynar®	2
	52	276472	MANIFOLD; Kynar®	1
	53	113447	PLUG, port; Kynar®	2
	57	113570	O-RING, packing	2
	58	113341	SCREW, torx	20
	59	115055	O-RING, exhaust	1
	60	194986	BRACKET, mounting	1
	61	111630	SCREW, machine, pn hd	4

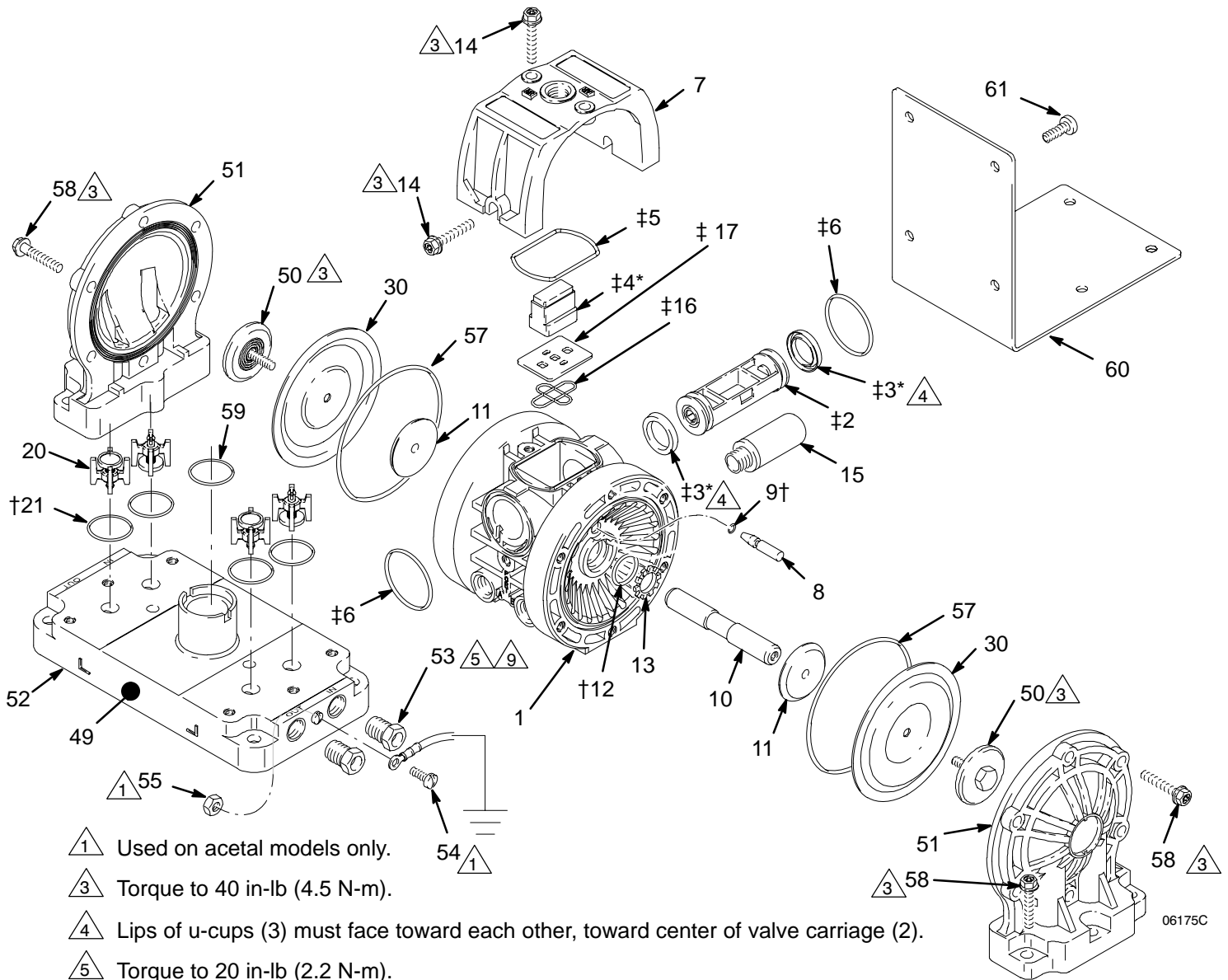
Parts

Check Valve (matrix column 5)

Digit	Ref. No.	Part No.	Description	Qty.
2	20	241134	VALVE, check; acetal	4
	21	113566	O-RING, packing	4
9	20	240896	VALVE, check; polypropylene	4
	21	113566	O-RING, packing	4
A	20	240897	VALVE, check; Kynar®	4
	21	113566	O-RING, packing	4

Diaphragm (matrix column 6)

Digit	Ref. No.	Part No.	Description	Qty.
1	30	191402	DIAPHRAGM; Teflon® (for all Husky 205 pumps)	2
6	30	196385	DIAPHRAGM; Santoprene®	2



① Used on acetal models only.

③ Torque to 40 in-lb (4.5 N-m).

④ Lips of u-cups (3) must face toward each other, toward center of valve carriage (2).

⑤ Torque to 20 in-lb (2.2 N-m).

⑨ Not assembled. These plugs are supplied to plug the two ports in the manifold that are not used.

* These parts are included in Air Valve Service Kit 238853, which may be purchased separately.

† These parts are included in Fluid Section Service Kit D010XX, which may be purchased separately.

‡ These parts are included in pump with integral air valve only.