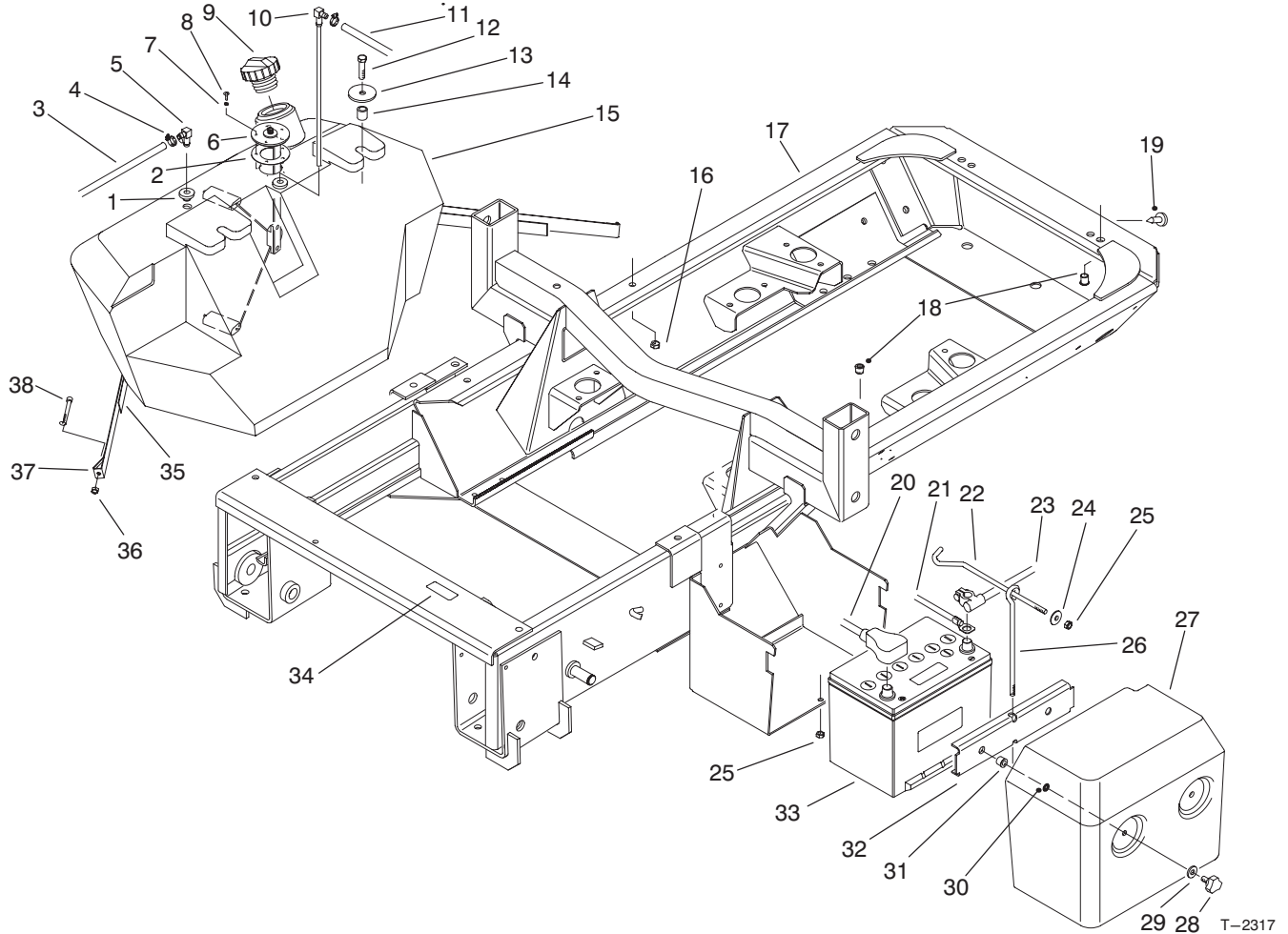




MODEL NO. 30300-60001 & UP

PARTS CATALOG

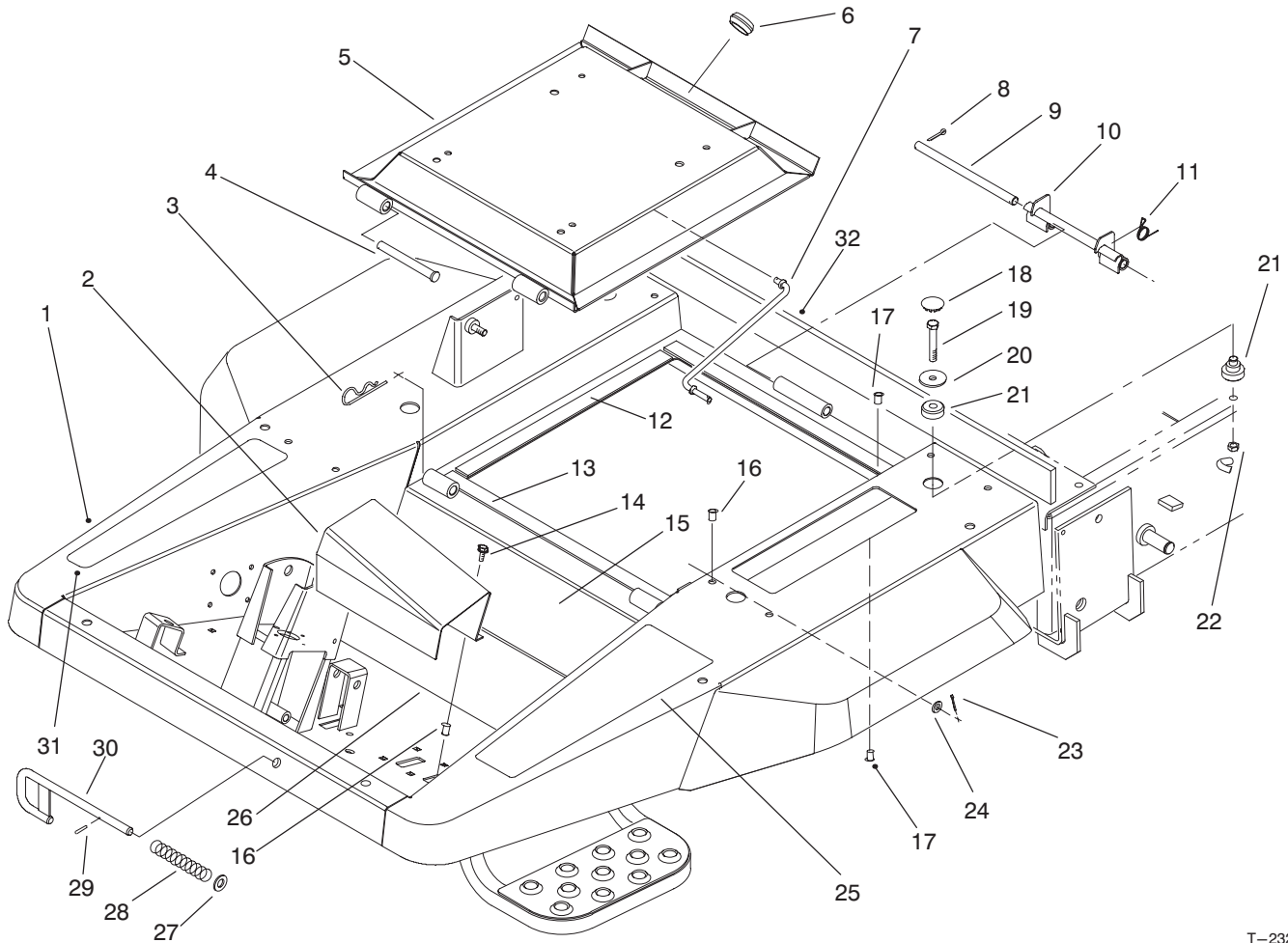
GROUNDMASTER® 3000
TRACTION UNIT



MAIN FRAME ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	46-6560	Bushing	2
2	62-7650	Gasket	1
3	93-5483	Hose - Fuel	1
4	2412-108	Clamp - Hose	2
5	46-6550	Fitting - Connector	1
6	92-9267	Sender - Fuel	1
7	3253-15	Washer - Lock	5
8	32122-24	Screw	5
9	93-3101	Cap - Gas	1
10	93-5453	Stand - Pipe	1
11	93-5553	Hose - Fuel	1
12	33105-040	Screw - HHF	2
13	83-1040	Washer - Rebound	2
14	93-5384	Spacer	2
15	93-5040	Tank - Fuel	1
16	33025-00	Nut - Lock	2
17	93-5628	Frame (Incl. Ref. #18 & 34)	1
18	93-5450	Nut - Clinch	7
19	237-37	Bumper - Rubber	2

Ref. No.	Part No.	Description	No. Used
20	93-5635	Cable - Positive	1
21	18-2770	Cable - Ground	1
22	93-5118	Rod - Battery	1
23	93-5418	Cable - Battery, Negative	1
24	3256-82	Washer - Flat	1
25	33024-00	Nut - Lock	2
26	93-5117	Rod - Threaded	1
27	93-5120	Cover - Battery	1
28	77-3620	Retainer - Cover	2
29	3256-3	Washer - Flat	2
30	32151-72	Ring - Retaining	2
31	32148-9	Insert - Threaded	2
32	93-5116	Bracket - Battery	1
33		Battery - Wet	1
34	85-4730	Decal - Hydraulic Oil Only	1
35	93-5273	Strap - Felt	1
36	32146-17	Nut - Hex, Lock	1
37	93-5215	Strap	1
38	3274-62	Screw - Cap, Hex. Soc. Hd.	1

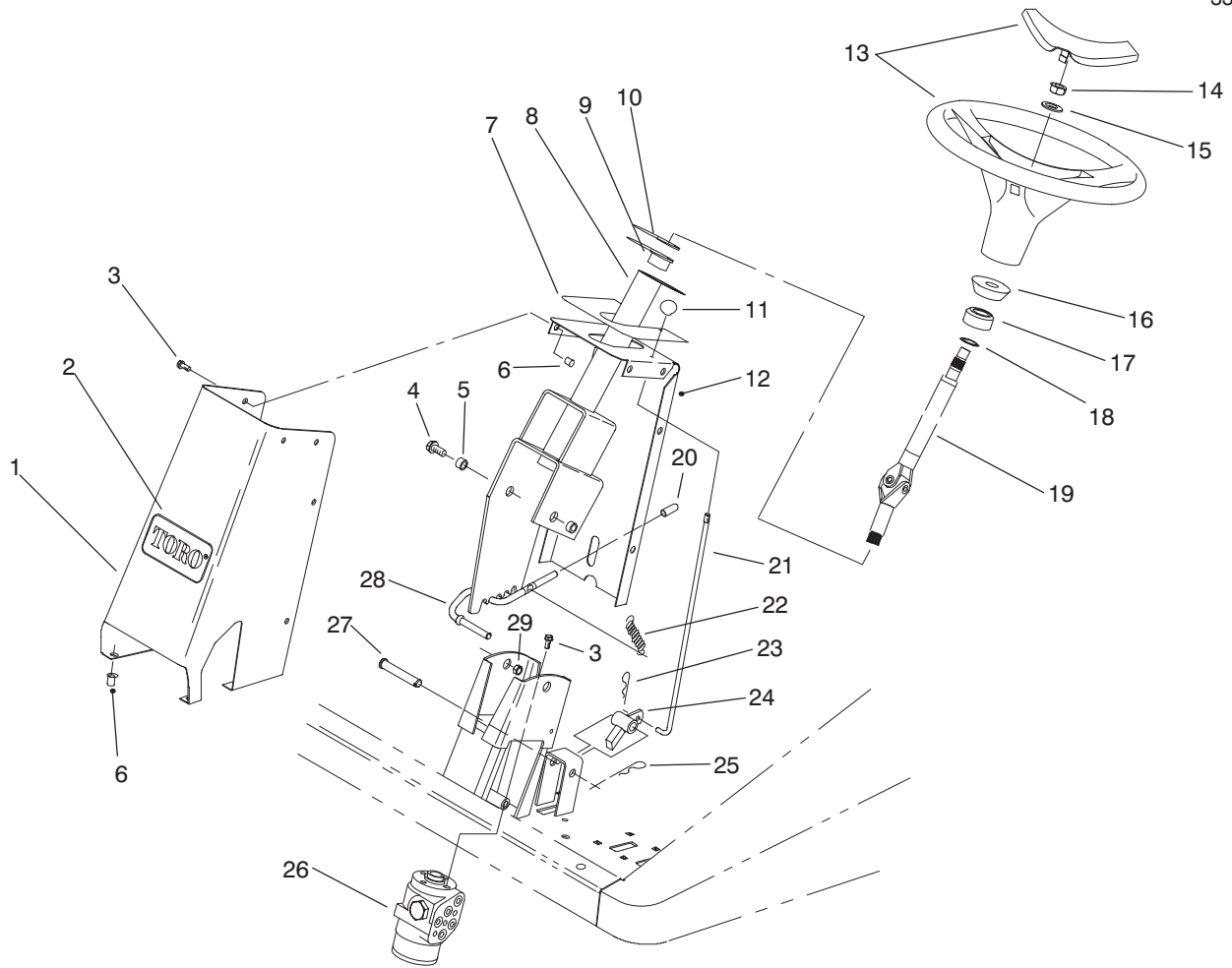


T-2324

FRONT FRAME & SEAT BASE ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	93-5627	Platform (Incl. Ref. #15-17, 25-26, & 31)	1
2	93-5310	Cover - Tubes	1
3	3290-355	Pin - Hair, Cotter	2
4	93-5343	Pin - Clevis	2
5	93-5340	Base - Seat	1
6	240-5	Grommet	1
7	93-5338	Rod - Prop	1
8	3272-11	Pin - Cotter	2
9	93-5366	Shaft - Latch	1
10	93-5363	Latch	1
11	93-5367	Spring - Torsion	1
12	93-5334	Strip - Foam, Seat	2
13	93-5335	Strip - Foam, Seat	2
14	33103-016	Screw - HHH	2
15	93-5348	Abrasive - Floor	1

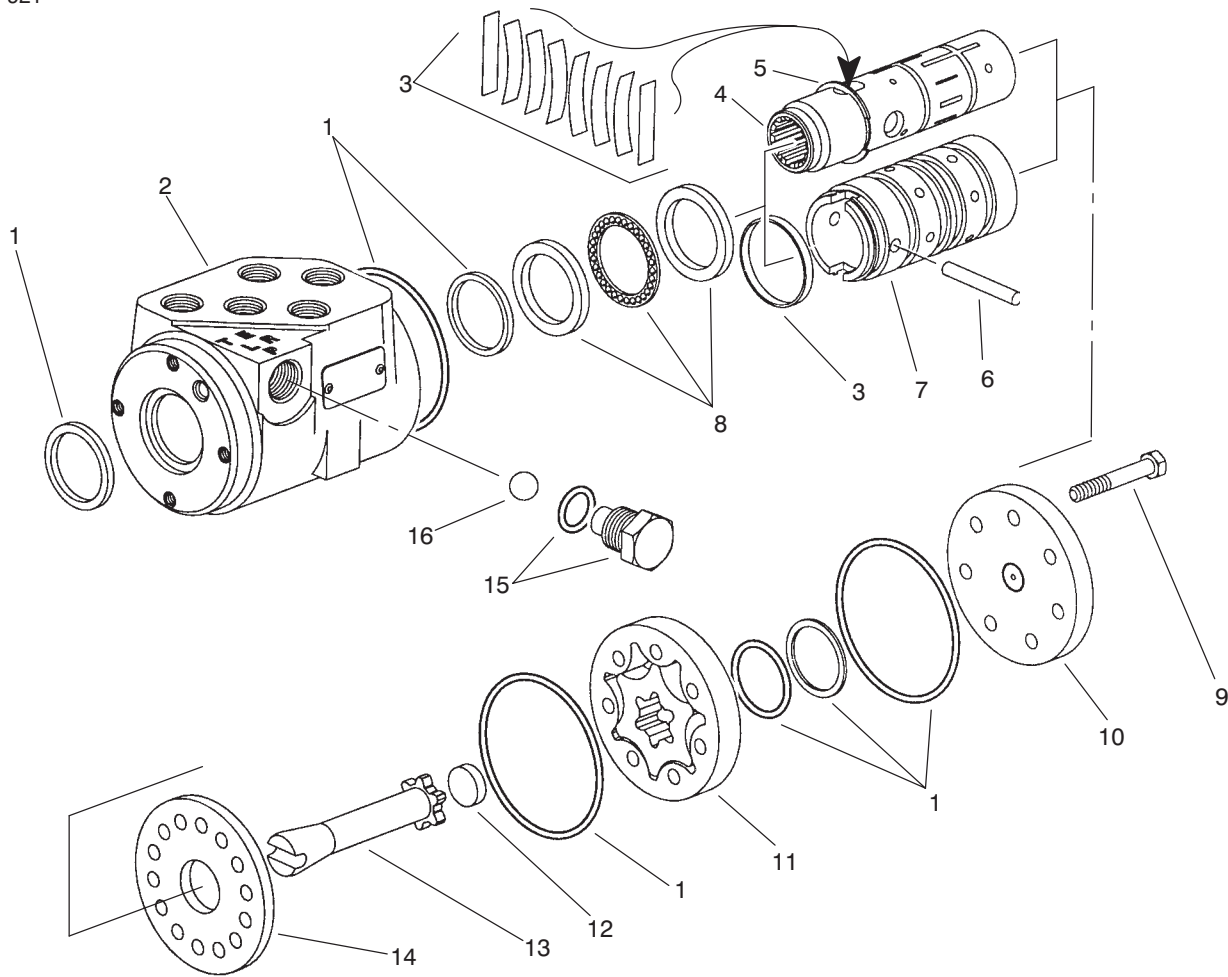
Ref. No.	Part No.	Description	No. Used
16	93-5447	Nut - Clinch	13
17	93-5449	Nut - Clinch	4
18	93-3094	Plug - Cap	4
19	33115-060	Screw - HH	4
20	93-5308	Washer - ISO Mount	4
21	93-5307	Mount - ISO	4
22	33025-00	Nut - Lock	4
23	3272-7	Pin - Cotter	2
24	3256-23	Washer - Flat	2
25	93-5507	Abrasive - Platform	1
26	93-5349	Abrasive - Floor	1
27	3256-69	Washer - Flat	1
28	28-0570	Spring - Compression	1
29	32121-79	Pin - Roll	1
30	93-5605	Rod	1
31	92-5772	Decal - Footrest, RH	1
32	93-5255	Strip - Foam	1



T-2325

STEERING ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	93-5633	Housing - Tower (Incl. Ref. #2 & 6)	1	15	3256-27	Washer - Flat	1
2	67-1300	Decal - Tower	1	16	93-5429	Collar - Foam	1
3	33103-016	Screw - HHF	16	17	93-5439	Seal - Steering	1
4	33105-020	Screw - HHF	2	18	32151-29	Ring - Retaining	2
5	93-5204	Spacer	2	19	93-5428	Asm. - Shaft, Steering	1
6	93-5447	Nut - Clinch	12	20	93-5446	Cap - Vinyl	1
7	93-5424	Decal - Tower	1	21	93-5309	Rod - Brake, Parking	1
8	93-5205	Column - Steering	1	22	93-5262	Spring - Extension	1
9	256-132	Bushing - Flange	2	23	3272-5	Pin - Cotter, Hair	1
10	256-260	Washer	2	24	93-5276	Pawl - Brake	1
11	93-5312	Knob	1	25	3272-12	Pin - Cotter, Hair	1
12	93-5629	Cover - Tower (Incl. Ref. #6 & 7)	1	26	93-5165	Steering Control Unit	1
13	93-5212	Wheel - Steering	1	27	283-5	Pin - Clevis	1
14	93-5590	Nut	1	28	93-5208	Rod - Tilt	1
				29	33005-00	Nut - HF	2



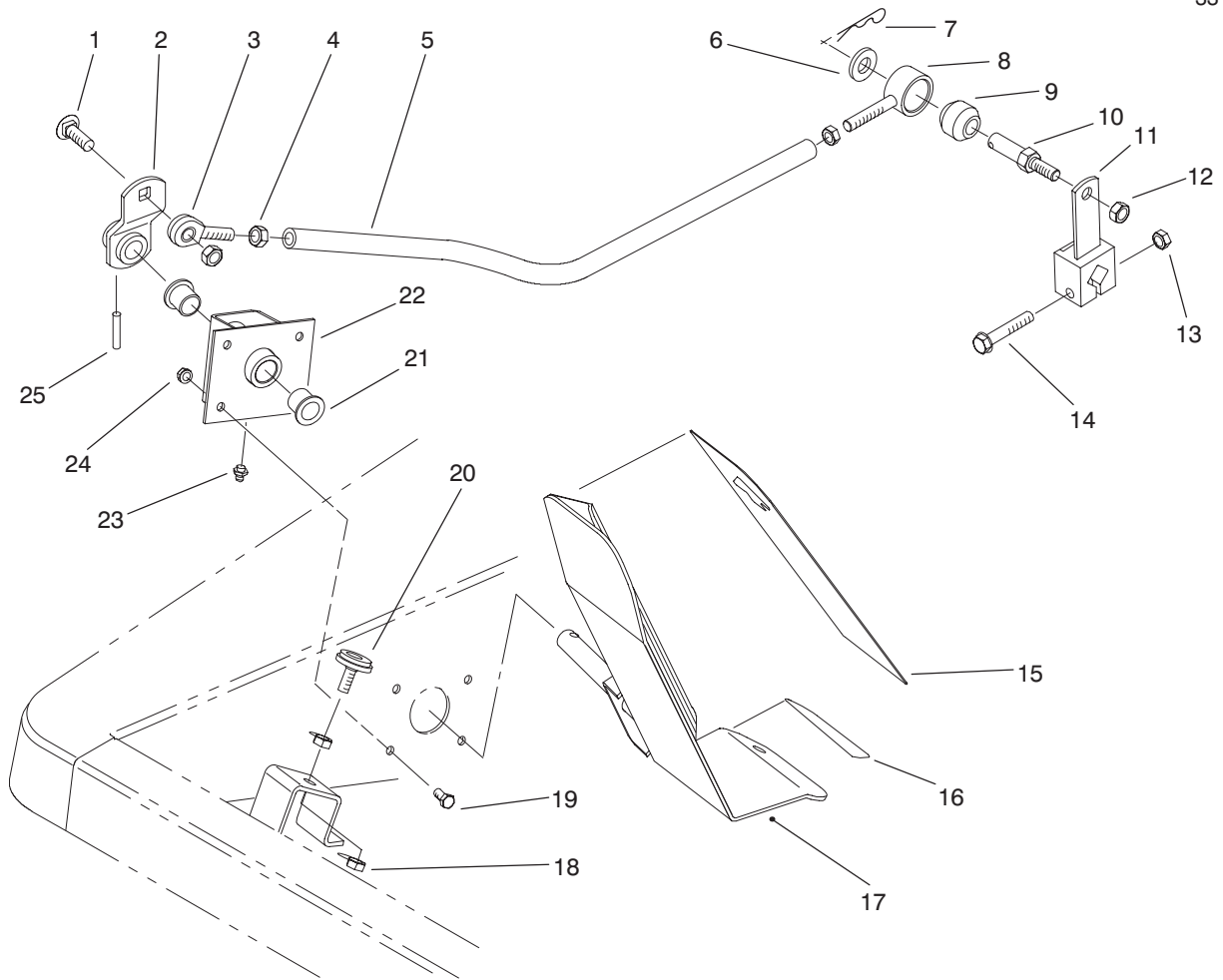
T-2312

STEERING CONTROL VALVE ASM. 93-5165

Ref. No.	Part No.	Description	No. Used
1	94-4099	Kit - Seal	1
†2		Housing	1
3	94-4095	Kit - Spring, Centering	1
†4		Spool	1
5	94-4098	Ring - Retaining	1
6	94-4094	Pin	1
†7		Sleeve	1
8	94-4096	Kit - Bearing	1

Ref. No.	Part No.	Description	No. Used
9	94-4088	Screw - Cap	7
10	94-4089	Cap - End	1
11	94-4090	Gerotor	1
12	94-4091	Spacer	1
13	94-4093	Drive	1
14	94-4092	Plate - Wear	1
15	94-4097	Asm. - Plug	1
16	94-4100	Ball	1

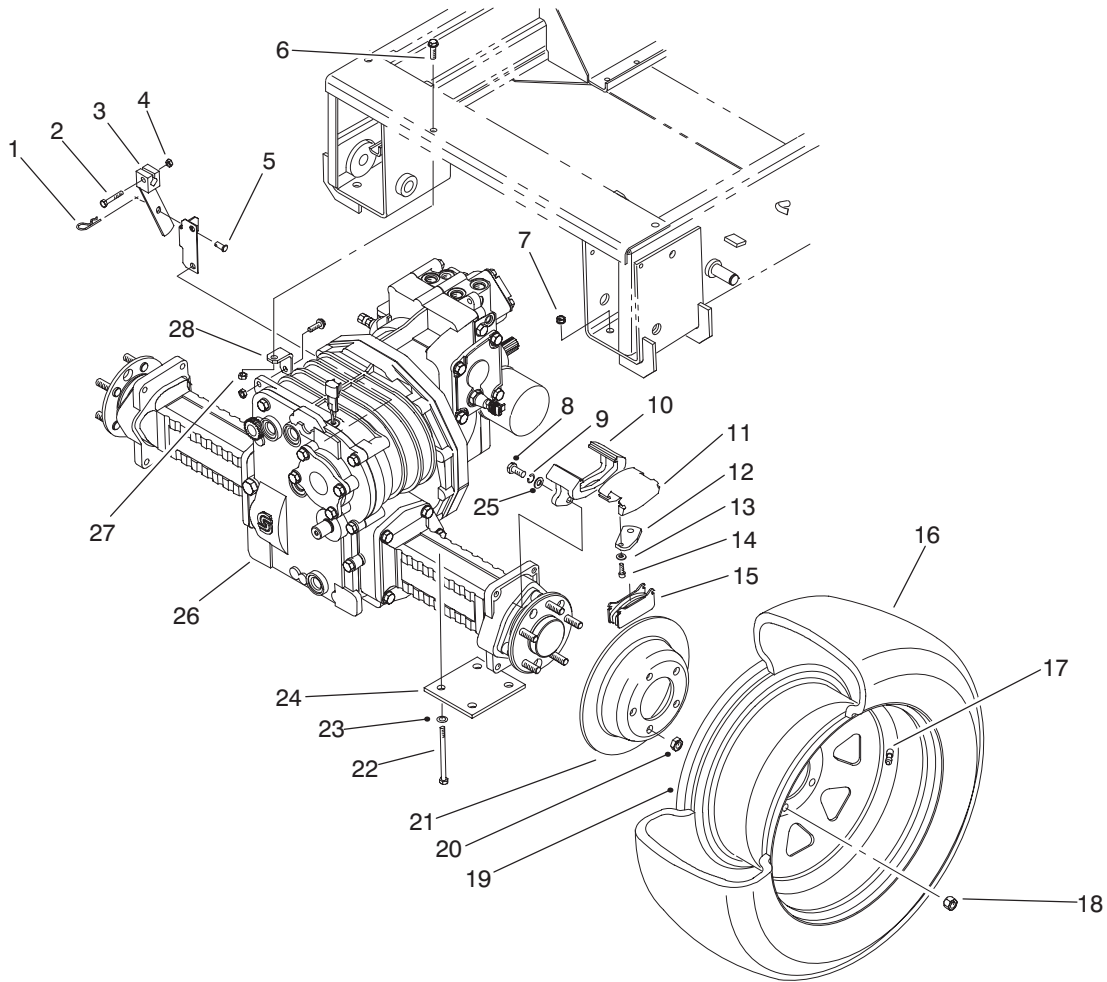
† Not Serviced Separately.



T-2326

TRACTION PEDAL ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	3231-22	Bolt - Carriage	1	14	33104-050	Screw - HHF	1
2	93-5137	Lever - Traction	1	15	93-5347	Abrasive - Pedal	1
3	2411-36	Bearing - Rod End	1	16	93-5368	Abrasive - Pedal	1
4	3220-3	Nut - Jam	2	17	93-5133	Pedal - Traction	1
5	93-5173	Tube - Control	1	18	3217-6	Nut - Hex.	2
6	3256-26	Washer - Flat	1	19	33113-016	Screw - HH	4
7	3290-355	Pin - Cotter, Hair	1	20	32141-36	Screw - Level	1
8	93-5486	Hub	1	21	256-10	Bushing - Flange	2
9	23-2270	Bushing - Rubber	1	22	93-5129	Bracket - Pedal	1
10	93-5488	Post - Hub	1	23	302-5	Fitting - Grease	1
11	93-5175	Lever	1	24	33003-00	Nut - HF	1
12	3296-59	Nut - Lock	2	25	32121-9	Pin - Roll	1
13	33024-00	Nut - Lock	1				



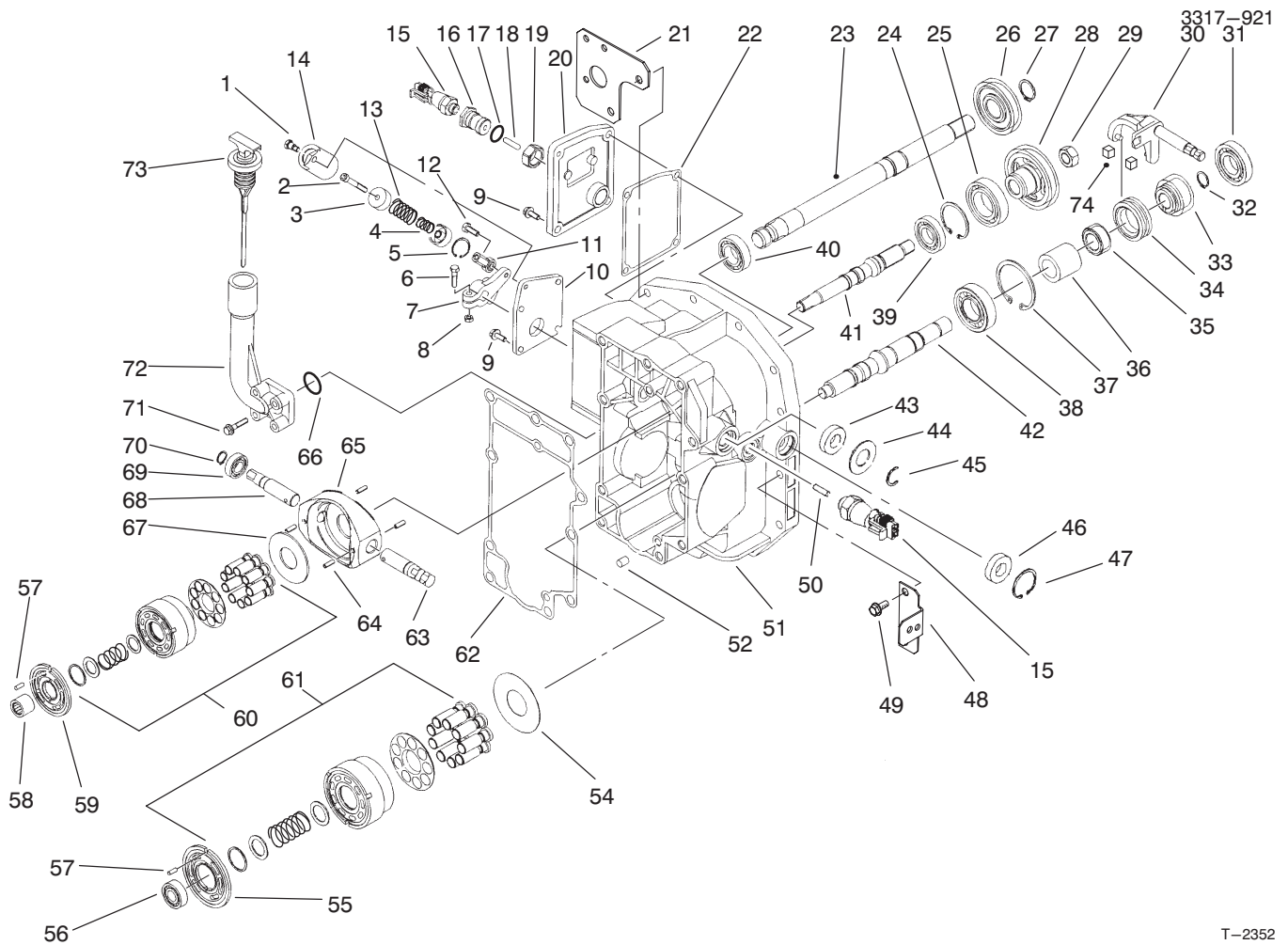
T-2327A

FRONT AXLE ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	3290-467	Pin - Cotter, Hair	1
2	33113-040	Screw - HH	1
3	93-5383	Lever	1
4	33023-00	Nut - Lock	1
5	283-62	Pin - Clevis	1
6	33104-025	Screw - HHF	2
7	33006-00	Nut - HF	8
8	323-44	Screw - HH	4
9	3253-5	Washer - Lock	4
10	94-4102	Bracket - Mounting	2
11	94-4104	Housing	2
12	94-4107	Lever	2
13	94-4106	Washer	2
14	94-4105	Screw	2

Ref. No.	Part No.	Description	No. Used
15	94-4103	Pad	4
16	93-5431	Tire	2
17	232-27	Valve Stem	2
18	93-5268	Nut - Lug	10
19	93-5548	Rim	2
20	21-8360	Nut - Lock	4
21	93-5438	Rotor - Brake	2
22	33116-110	Screw - HH	8
23	3256-26	Washer - Flat	8
24	93-5036	Plate - Axle	2
25	257-9	Washer	4
26	93-5941	Axle - 2 Speed	1
27	33024-00	Nut - Lock	2
28	93-5306	Bracket - Transaxle	1

*Not Illustrated



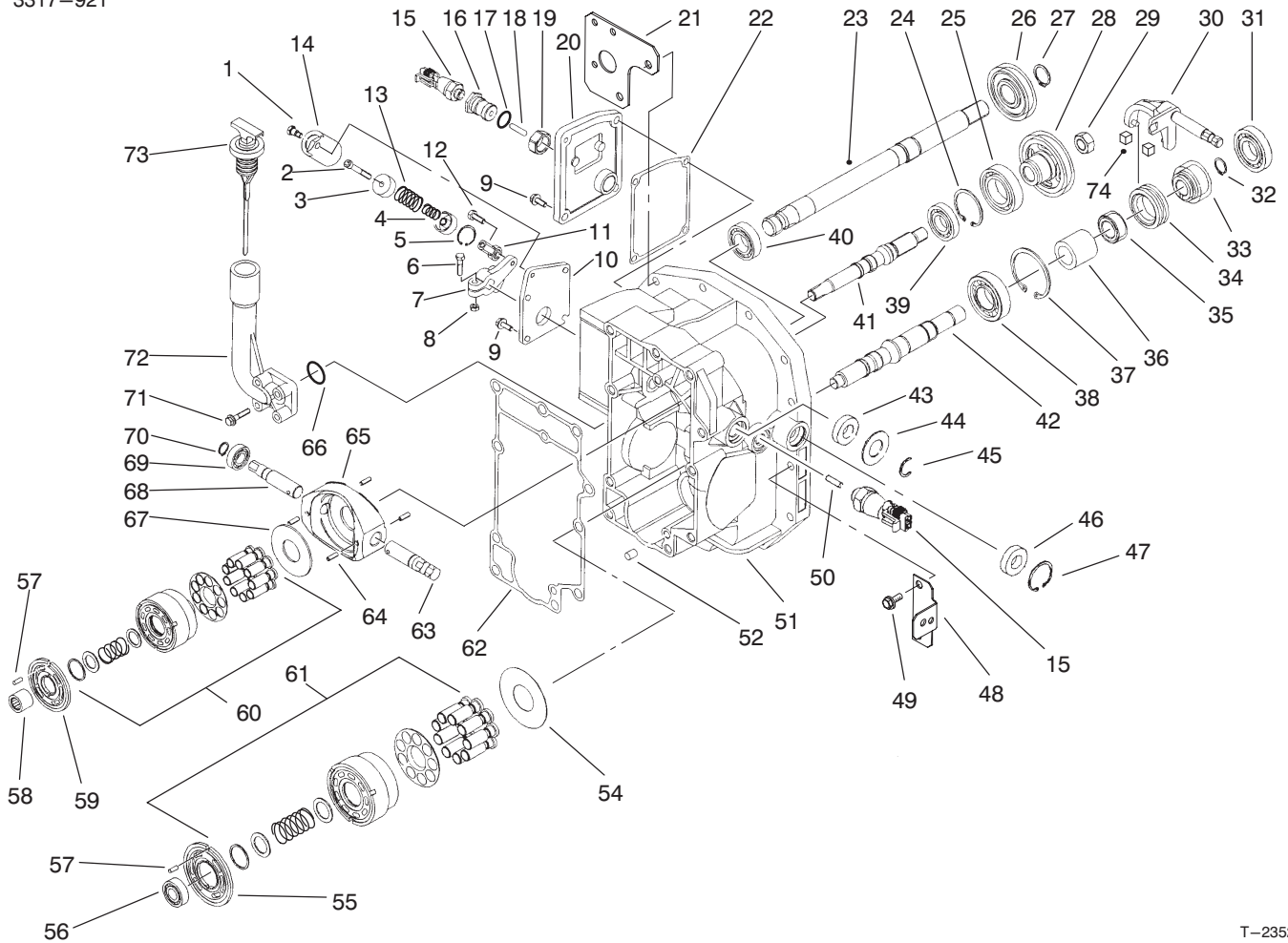
T-2352

HYDRAULIC HOUSING ASSEMBLY

Ref. No.	Part No.	Description	No. Used
†1		Screw – HH, Shoulder	1
†2		Screw – Soc. Hd.	1
†3		Seat – Spring	1
†4		Spring – Compression	1
†5		Ring – Retaining	1
6	94-3940	Screw – HH	1
†7		Handle – Return, Neutral	1
†8		Nut – Lock	1
9	94-4002	Screw – HHF	8
10	94-3929	Plate – Return, Neutral	1
†11		Rod End – Female	1
†12		Screw – HH	1
†13		Spring – Compression	1
†14		Housing – Return, Neutral	1
15	94-3966	Switch	2
16	94-4045	Adjuster – Threaded	1
17	94-4047	O-Ring	1
18	94-4046	Pin	1
19	94-4044	Nut – Hex.	1
20	94-3943	Cover – Return, Neutral	1
21	93-5171	Bracket – Counter Balance	1
22	94-3944	Gasket – Return, Neutral	1
23	94-3901	Shaft – Input	1
24	94-4029	Ring – Retaining	1
25	94-3971	Bearing – Ball	1
26	94-3903	Pinion – Drive, Pump	1

Ref. No.	Part No.	Description	No. Used
27	94-3994	Ring – Retaining	1
28	94-3905	Gear – Drive, Pump	1
29	94-3953	Nut – Lock	1
30	94-3924	Yoke – 2 Speed	1
31	94-3955	Bearing	1
32	94-3963	Ring – Retaining	1
33	94-3919	Pinion – Drive, Final	1
34	94-3908	Coupling – Gear, Change	1
35	94-3923	Coupling – 2 Speed	1
36	94-3949	Spacer – Drive, Final	1
37	94-3997	Ring – Retaining	1
38	94-3954	Bearing	1
39	94-3960	Bearing – Ball	1
40	94-3942	Bearing – Ball	1
41	94-3604	Shaft – Pump	1
42	94-3906	Shaft – Motor	1
43	94-3948	Seal	1
44	94-3947	Washer	1
45	94-3945	Ring – Retaining	1
46	94-3939	Seal – Lip	1
47	94-3962	Ring – Retaining	1
48	93-5381	Bracket	1
49	94-4004	Screw – HHF	13
50	94-4028	Roller – Needle	1
51	94-4082	Housing – Hyd. Fixed Motor	1
52	94-3975	Pin	2

† Not Serviced Separately.

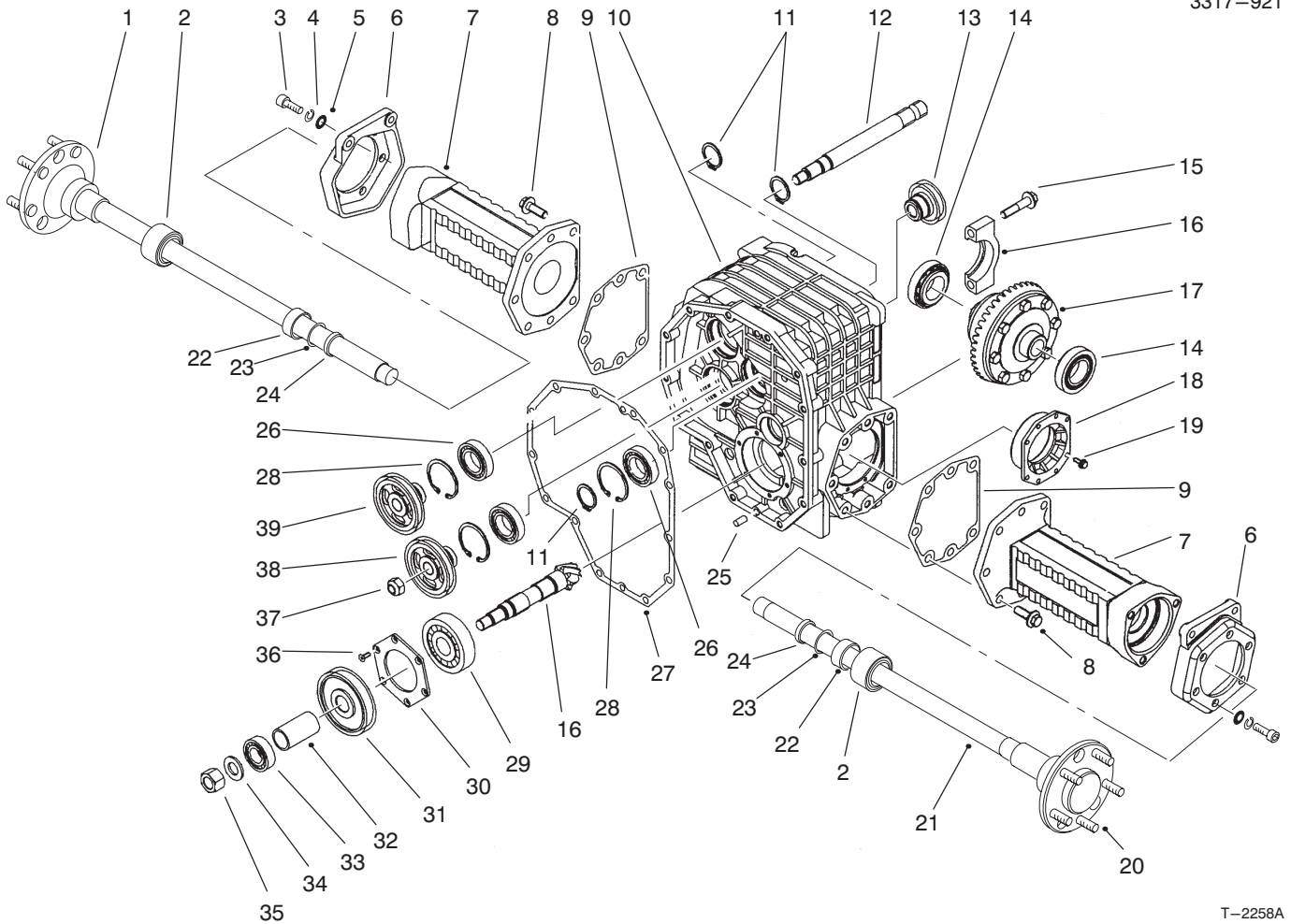


T-2352

HYDRAULIC HOUSING ASSEMBLY (Continued)

Ref. No.	Part No.	Description	No. Used
54	94-3977	Plate - Thrust	1
55	94-3921	Plate - Valve, Motor	1
56	94-3956	Bearing - Ball	1
57	94-3974	Pin	2
58	94-3957	Bearing - Needle	1
59	94-3973	Plate - Valve, Pump	1
60	48-1800	Kit - Block, Cylinder	1
61	75-0470	Kit - Block, Cylinder	1
62	94-3992	Gasket - Center Section	1
63	94-3946	Shaft - Trunnion	1
64	94-4027	Pin	4
65	94-3967	Swashplate - Pump, Variable	1
66	94-4051	O-Ring	1

Ref. No.	Part No.	Description	No. Used
67	94-3978	Plate - Thrust	1
68	94-3934	Shaft - Trunnion	1
69	94-4040	Bearing - Ball	1
70	94-3932	Ring - Retaining	2
71	94-4050	Screw - HHF	4
72	94-4048	Housing - Dipstick	1
73	94-4049	Dipstick	1
74	93-5972	Guide - Slot	2
*	93-5969	Asm. - Return, Neutral (Incl. Ref. #1-5 & 11-14)	1
*	93-5970	Kit - Arm, Neutral Return (Incl. Ref. #7 & 8)	1
*	93-5971	Kit - Seal, Overhaul	1

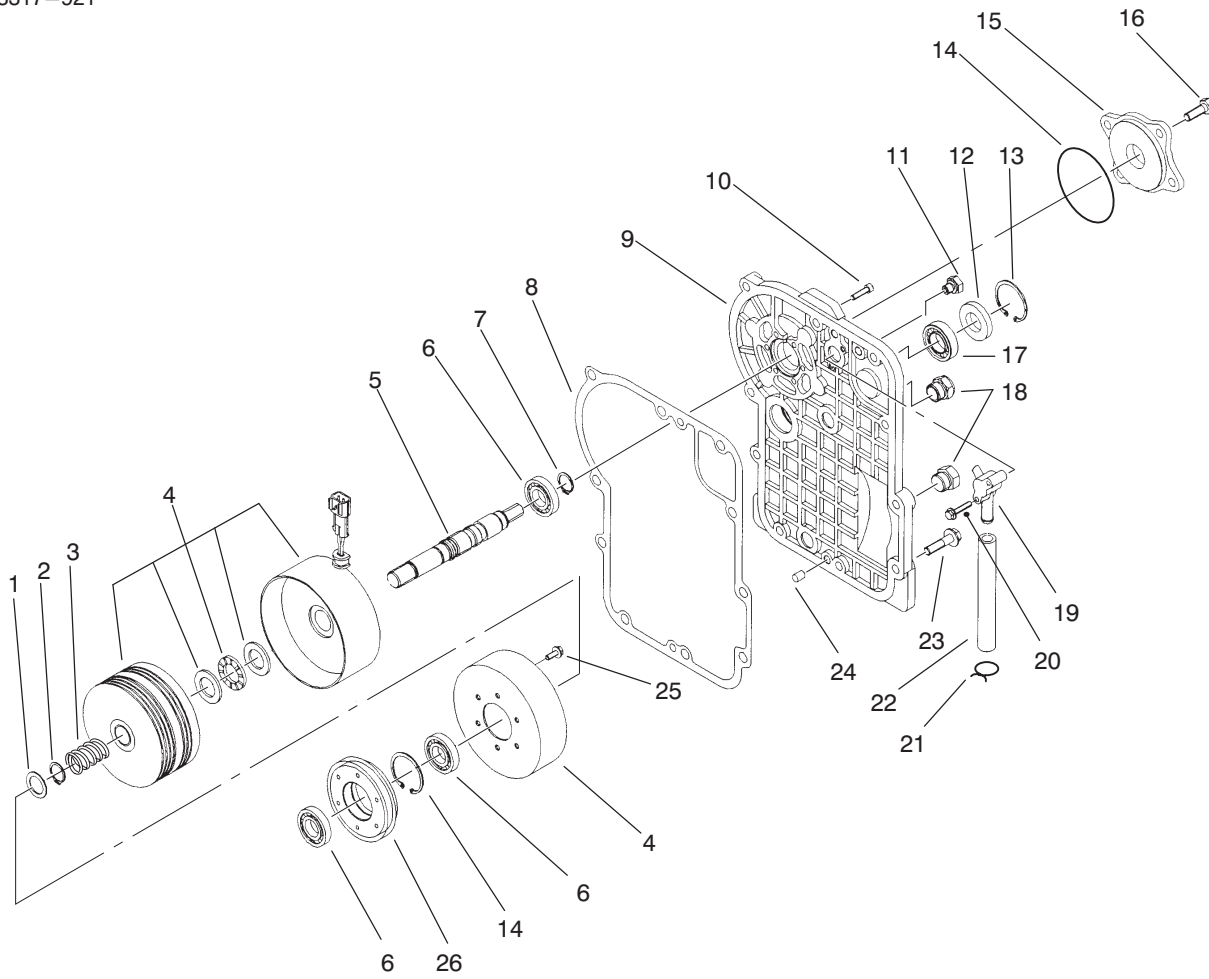


T-2258A

FRONT AXLE GEAR HOUSING ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	94-4031	Shaft - Axle, Left	1
2	94-4030	Bearing	2
3	94-4036	Screw	6
4	3253-7	Washer - Lock	6
5	3256-6	Washer - Flat	6
6	94-4038	Bracket - Brake	2
7	94-4033	Housing - Axle	2
8	94-4007	Screw - HHF	14
9	94-4015	Gasket - Housing	2
10	94-3920	Housing - Gear	1
11	69-3170	Ring - Retaining	3
12	94-3913	Shaft - Front PTO	1
13	94-4052	Pinion - PTO Clutch	1
14	94-3964	Cone - Bearing	2
14	94-3965	Cup - Bearing	2
15	94-4003	Screw - HHF	2
16	94-3972	Clamp - Differential	1
17	94-3970	Assembly - Differential	1
18	94-3938	Carrier - Bearing	1
19	94-4002	Screw - HHF	6

Ref. No.	Part No.	Description	No. Used
20	94-4143	Stud - Wheel	10
21	94-4035	Shaft - Axle, Right	1
22	94-4144	Collar - Bearing	2
23	94-4142	Ring - Retaining	2
24	94-4032	Seal - Lip	2
25	94-3975	Pin	4
26	94-3971	Bearing - Ball	3
27	94-3959	Gasket - Housing	1
28	94-3997	Ring - Retaining	3
29	94-3961	Bearing - Ball	1
30	94-3907	Retainer - Bearing	1
31	94-3912	Gear - Final Drive	1
32	94-3958	Spacer - Pinion	1
33	75-0520	Bearing	1
34	94-4024	Washer	1
35	94-4025	Nut - Lock	1
36	94-4014	Screw - Socket Head	6
37	94-3953	Nut - Lock	1
38	94-3914	Gear - Drive, PTO	1
39	94-3909	Pinion - Drive, PTO	1

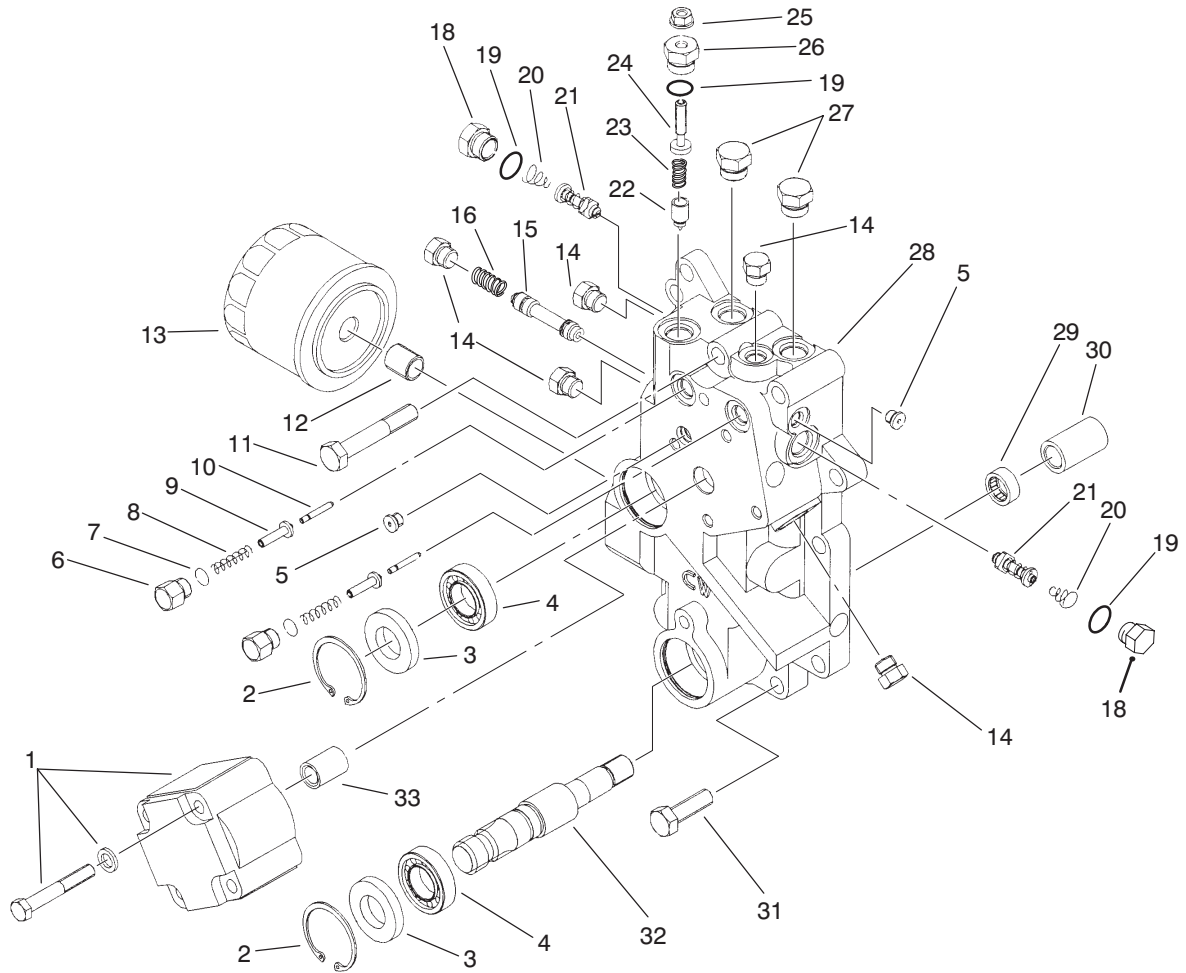


T-2259

FRONT AXLE COVER ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	94-3995	Washer	1
2	94-4006	Ring - Retaining	1
3	94-4005	Spring - Compression	1
4	94-3969	Clutch - PTO	1
5	94-3910	Shaft - Clutch	1
6	94-3960	Bearing - Ball	3
7	94-3996	Ring - Retaining	1
8	94-4001	Gasket - Cover, Front	1
9	94-3991	Cover - Front	1
10	94-4009	Screw	6
11	94-3998	Vent - Breather	1
12	94-3925	Seal - Lip	1
13	94-4029	Ring - Retaining	2

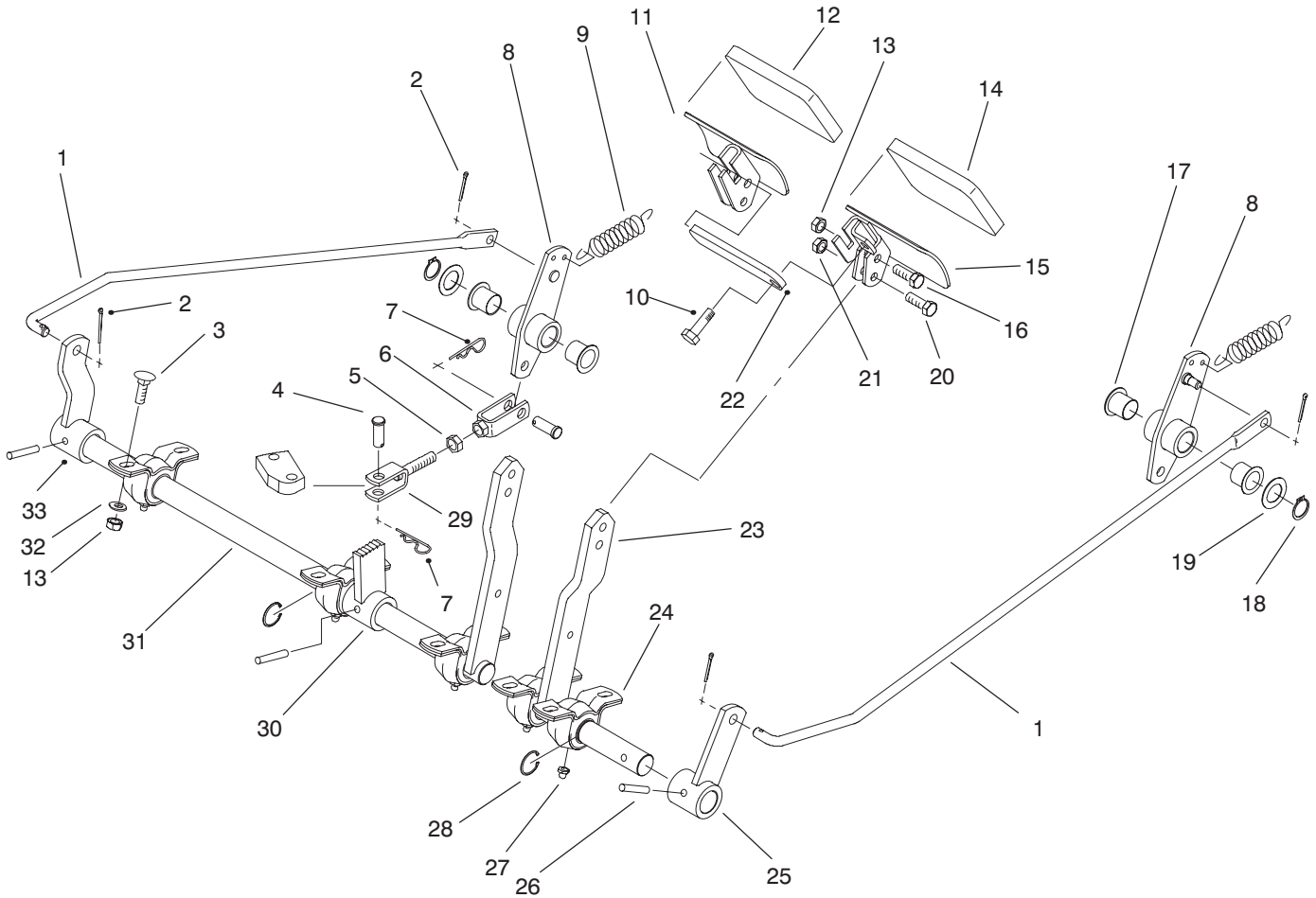
Ref. No.	Part No.	Description	No. Used
14	94-4011	O-Ring	1
15	94-4010	Cover - Gerotor	1
16	94-4008	Screw	4
17	94-3942	Bearing - Ball	1
18	94-4000	Plug	2
19	94-4012	Tube - Lubrication	1
20	94-4013	Screw - HHF	2
21	94-4042	Clamp	2
22	94-4041	Hose - Lubricating	1
23	94-4004	Screw - HHF	10
24	94-3975	Pin	2
25	94-4026	Screw - HHF	6
26	94-4053	Gear - Clutch, PTO	1



T-2353

FRONT AXLE CENTER SECTION ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	94-3968	Pump - Gear	1	18	94-3981	Plug	2
2	94-4029	Ring - Retaining	2	19	94-3982	O-Ring	3
3	94-3925	Seal - Lip	2	20	69-3740	Spring - Conical	2
4	94-3942	Bearing - Ball	2	21	94-3979	Valve	2
5	94-3993	Plug	2	22	94-3988	Cone - Valve, Relief	1
6	94-3986	Plug - Hex. Head	2	23	94-3989	Spring - Helical	1
7	94-3987	O-Ring	2	24	94-4016	Screw - Adjusting	1
8	94-3985	Spring	2	25	94-4017	Nut	1
9	94-3983	Assembly - Sleeve	2	26	94-3990	Plug - Relief, Implement	1
10	94-3984	Piston	2	27	94-4018	Plug	2
11	94-3999	Screw	2	28	94-3900	Center Section	1
12	94-3950	Union - Filter	1	29	94-4021	Bearing	1
13	94-3951	Filter	1	30	94-4023	Coupling - 4 Wheel Drive	1
14	94-3915	Plug	5	31	94-4020	Screw	8
15	94-3916	Spool	1	32	94-4022	Shaft - 4 Wheel Drive	1
16	94-3917	Spring - Helical	1	33	94-3922	Coupling - Pump, Gear	1

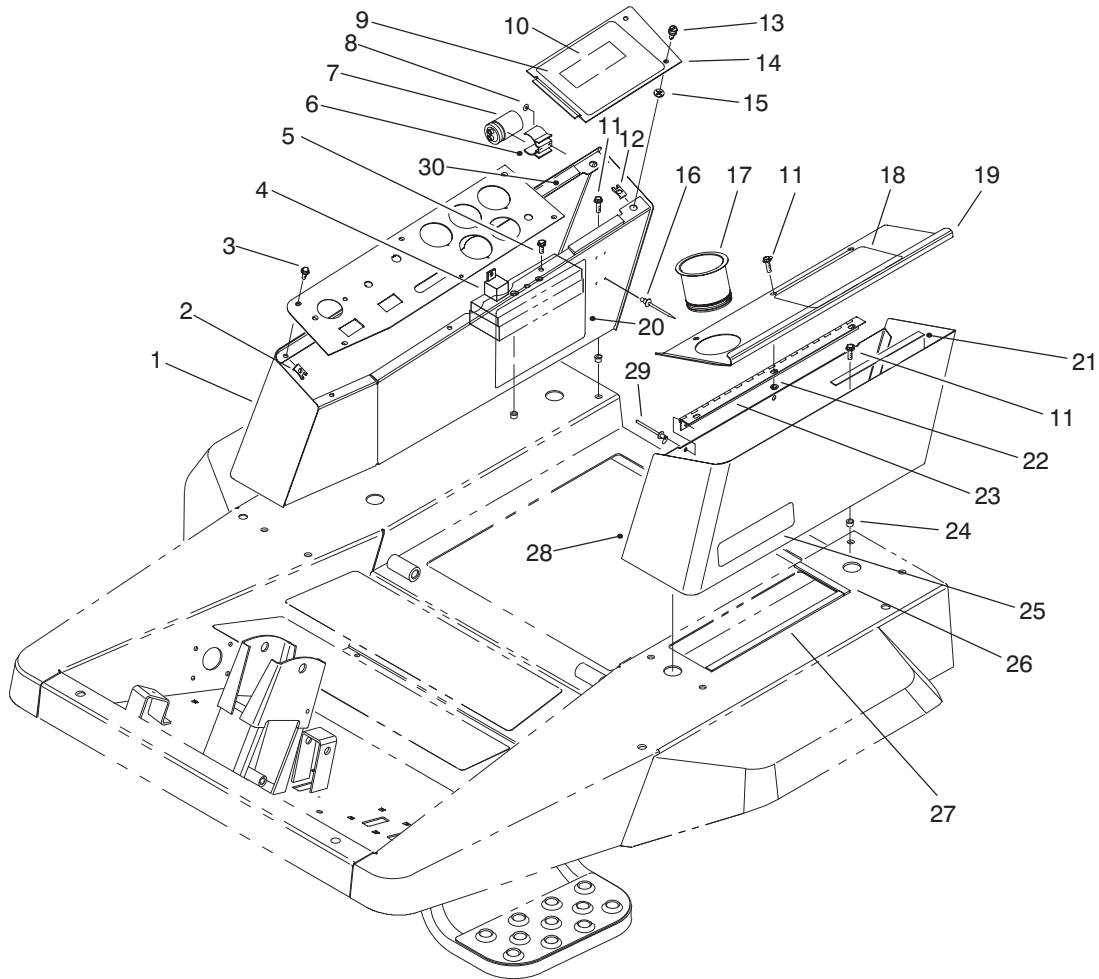


T-2329

BRAKE PEDAL ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	93-5333	Rod - Control	2
2	3272-7	Pin - Cotter	4
3	33124-020	Screw - Carriage	10
4	283-2	Pin - Clevis	4
5	3220-3	Nut - Jam	2
6	93-5552	Clevis	2
7	3290-467	Pin - Cotter, Hair	4
8	93-5326	Bellcrank	2
9	93-5262	Spring - Extension	2
10	33114-020	Screw - HH	1
11	93-5456	Pedal - RH	1
12	27-7580	Pad - Right Turn	1
13	33024-00	Nut - Lock	14
14	27-7570	Pad - Left Turn	1
15	93-5455	Pedal - LH	1
16	33114-025	Screw - HH	3
17	93-5313	Bushing - Nylon	4

Ref. No.	Part No.	Description	No. Used
18	32120-72	Ring - Retaining	2
19	3-6498	Washer - Thrust	2
20	322-4	Screw - HH	1
21	3218-2	Nut - Hex.	1
22	93-5568	Arm - Lock	1
23	93-5280	Arm - Brake, LH	1
24	93-4849	Bearing - Pillow Block	5
25	93-5473	Lever - Brake, LH	1
26	32121-15	Pin - Roll	3
27	302-5	Fitting - Grease	5
28	32151-83	Ring - Retaining	3
29	93-5551	Clevis	2
30	93-5475	Latch - Brake	1
31	93-5284	Arm - Brake, RH	1
32	33094-00	Washer - Flat	10
33	93-5474	Lever - Brake, RH	1

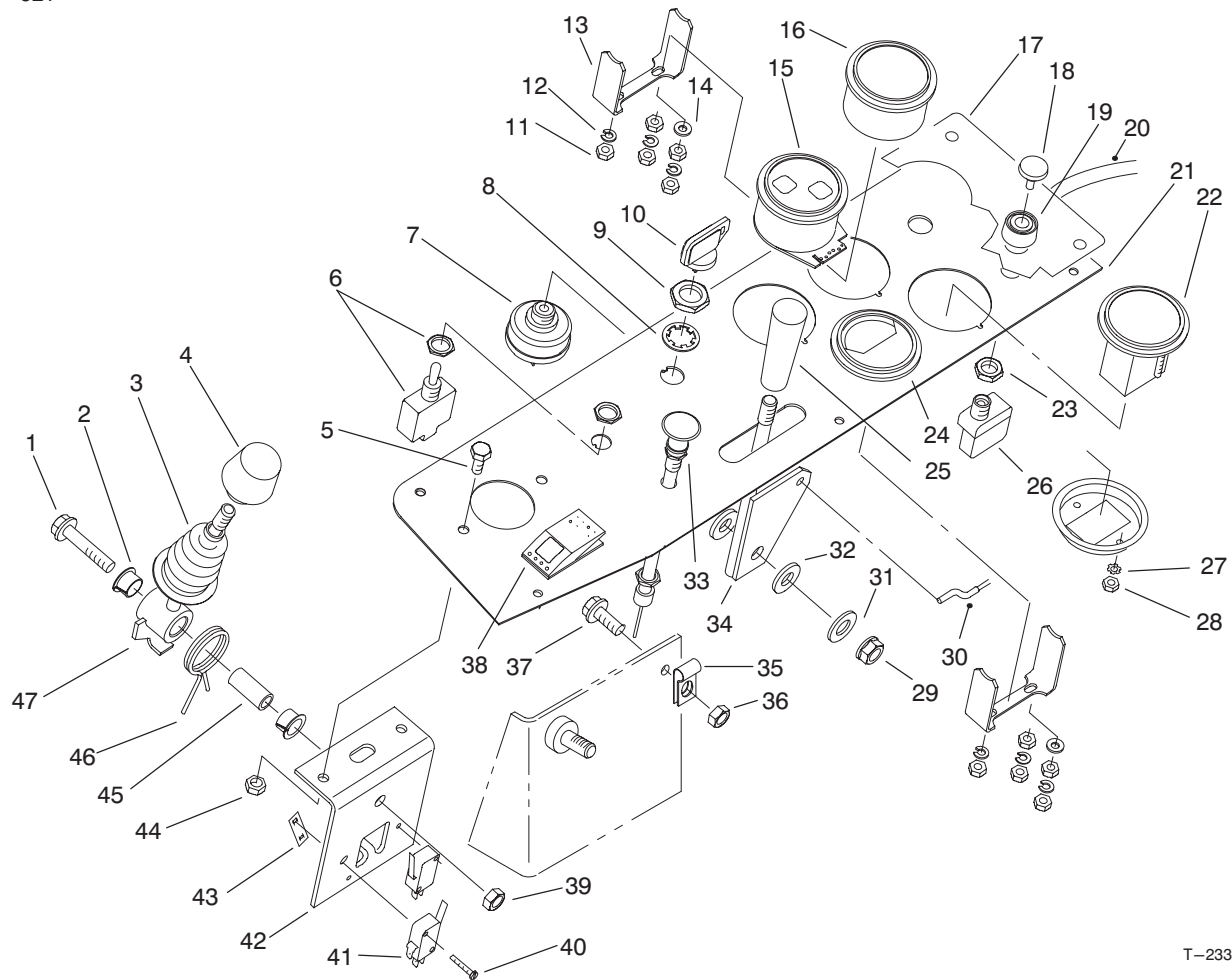


T-2330A

CONTROL CONSOLE ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	93-5369	Console	1	19	93-5403	Cover - Console	1
2	3290-191	Nut - Speed	6	20	93-5935	Decal - Service	1
3	3250-14	Screw	6	21	66-3050	Strip - Magnetic	2
4	116397	Relay	7	22	33003-00	Nut - HF	3
5	93-5949	Screw - HHF	12	23	93-5554	Hinge - Cover	1
6	74-2310	Clamp - Plastic	2	24	93-5447	Nut - Clinch	9
7	37-2690	Capacitor	2	25	67-1710	Decal - Caution	1
8	3269-10	Washer - Flat	2	26	93-5413	Strip - Foam	2
9	93-5931	Decal - Operating Instruct.	1	27	93-5414	Strip - Foam	2
10	93-5933	Decal - Fuses	1	28	93-5399	Console - LH	1
11	33103-016	Screw - HHF	12	29	93-8744	Rivet - Pop	3
12	93-5558	Nut - Clip On	2	30	93-5637	Strip - Foam	2
13	93-5556	Screw - Knurled	2	*	94-6710	Fuse - 2A	1
14	93-5527	Panel - Access	1	*	218-578	Fuse - 10A	1
15	93-5557	Retainer - Nylon	2	*	218-594	Fuse - 20A	2
16	117433	Rivet - Pop	2	*	94-4110	Fuse - 50A	1
17	94-1410	Holder - Beverage Can	1	*	92-3188	Board - Diode	2
18	93-5621	Decal - Warning	1				

*Not Illustrated



T-2332

OPERATOR'S CONTROL CONSOLE ASSEMBLY

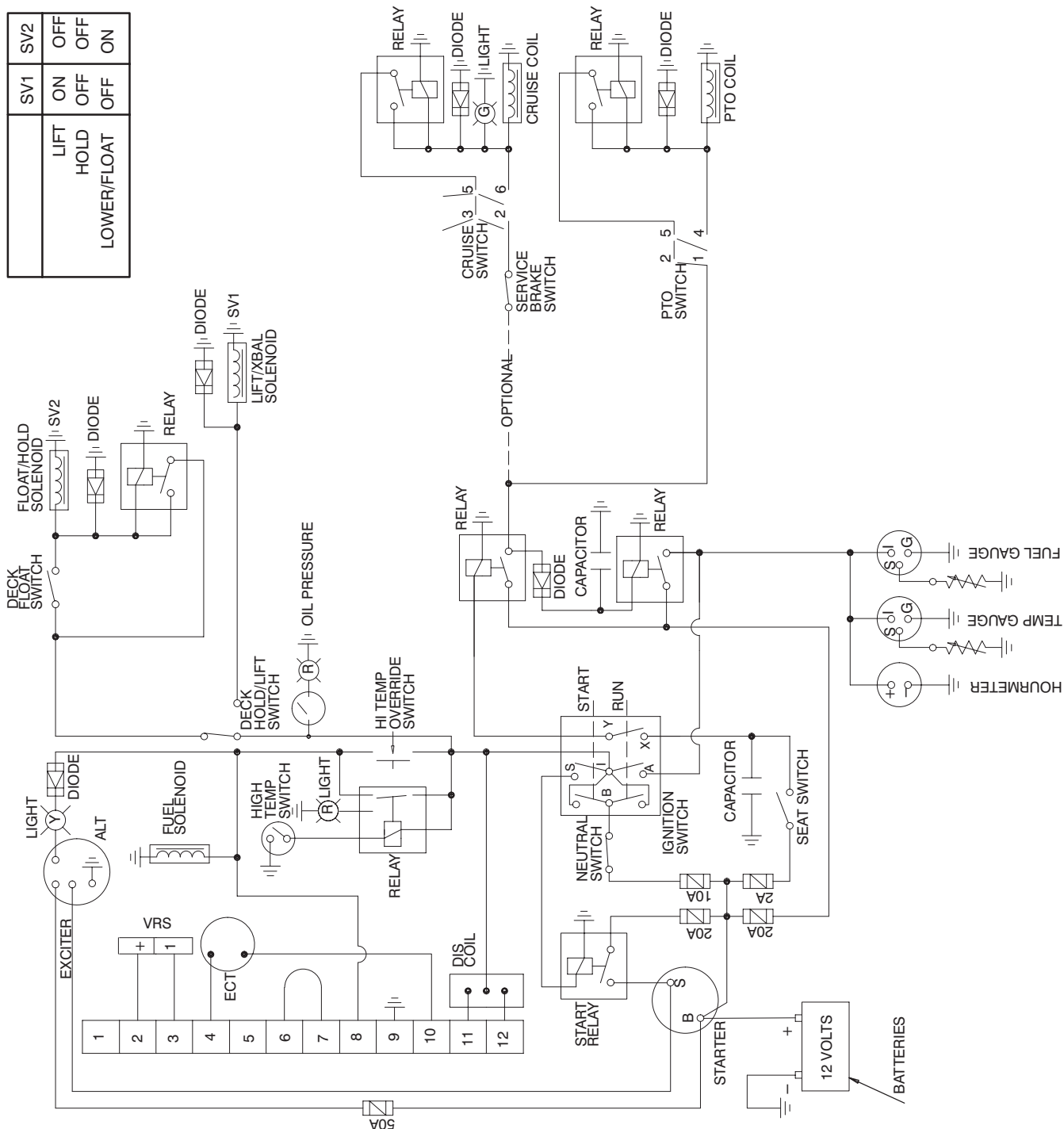
Ref. No.	Part No.	Description	No. Used
1	33104-040	Screw - HHF	1
2	93-5547	Bushing - Nylon	2
3	3290-488	Boot	1
4	233-37	Knob	1
5	33103-016	Screw - HHF	2
6	93-5270	Switch - Toggle	1
7	27-2360	Switch - Ignition (Incl. Ref. #8-9)	1
8	218-447	Washer - Lock	1
9	218-446	Nut - Hex.	1
10	62-7770	Key - Ignition	1
11	3219-14	Nut - Hex.	6
12	3253-2	Washer - Lock	5
13		Clamp	1
14	3256-14	Washer - Flat	2
15	93-5481	Cluster - Warning Light	1
16	93-4411	Gauge - Temperature	1
17	93-5426	Decal - Control	1
18	43-6280	Button - Push	1
19	43-6420	Bezel - Switch	1
20	93-5520	Wire Harness	1
21	93-5526	Plate - Control	1
22	66-2950	Gauge - Hourmeter	1
23	218-498	Nut - Hex.	1
24	66-2940	Gauge - Fuel	1

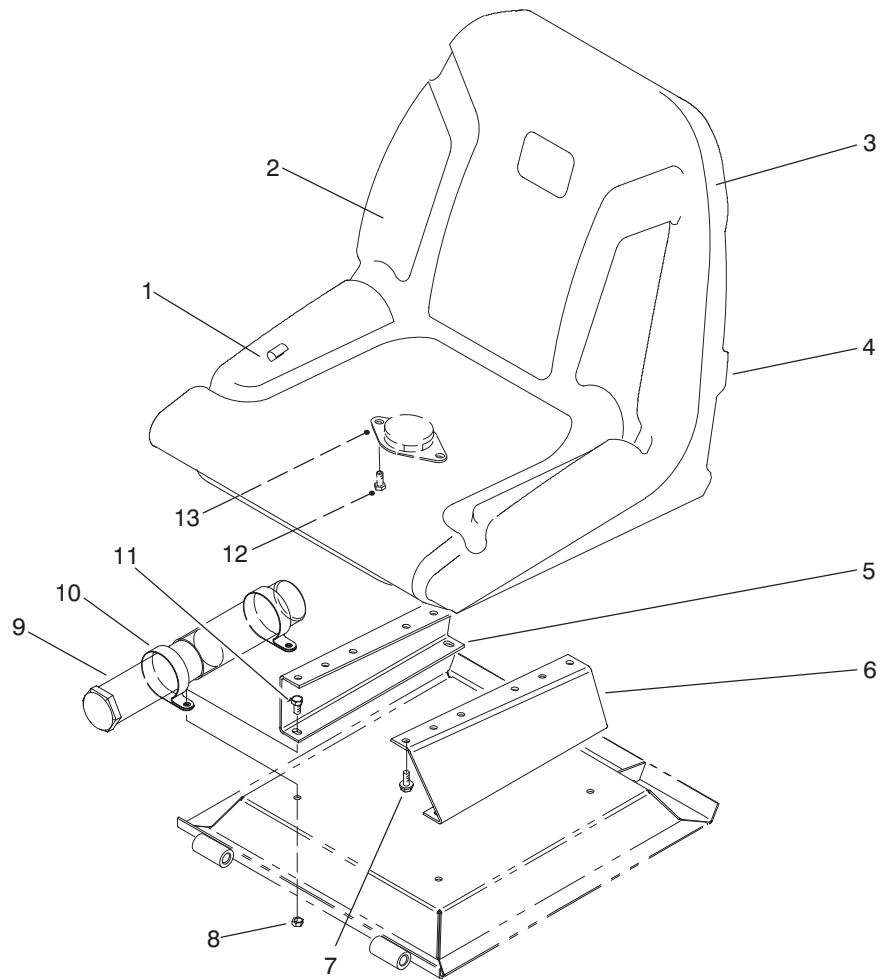
Ref. No.	Part No.	Description	No. Used
25	233-39	Knob - Lever	1
26	72-9760	Switch - Override	1
27	3255-20	Washer - Lock	2
28	3217-25	Nut - Hex.	2
29	33025-00	Nut - Lock	1
30	93-5351	Cable - Throttle	1
31	3256-24	Washer - Flat	1
32	66-2920	Washer - Nylon	2
33	93-5377	Control - Choke	1
34	93-5373	Lever - Throttle	1
35	2412-21	Clamp - Bodine	1
36	32128-17	Nut - HHF	1
37	3290-134	Screw - HHF	1
38	93-5476	Switch	1
39	33024-00	Nut - Lock	1
40	3290-313	Screw - PH	4
41	111332	Switch - Interlock	2
42	93-5510	Bracket	1
43	3290-354	Nut - Speed	2
44	33023-00	Nut - Lock	2
45	93-5512	Spacer	1
46	93-5509	Spring - Torsion	1
47	93-5515	Lever	1
*	93-5519	Wire Harness	1

*Not Illustrated

ELECTRICAL SCHEMATIC

	SV1	SV2
LIFT	ON	OFF
HOLD	OFF	OFF
LOWER/FLOAT	OFF	ON





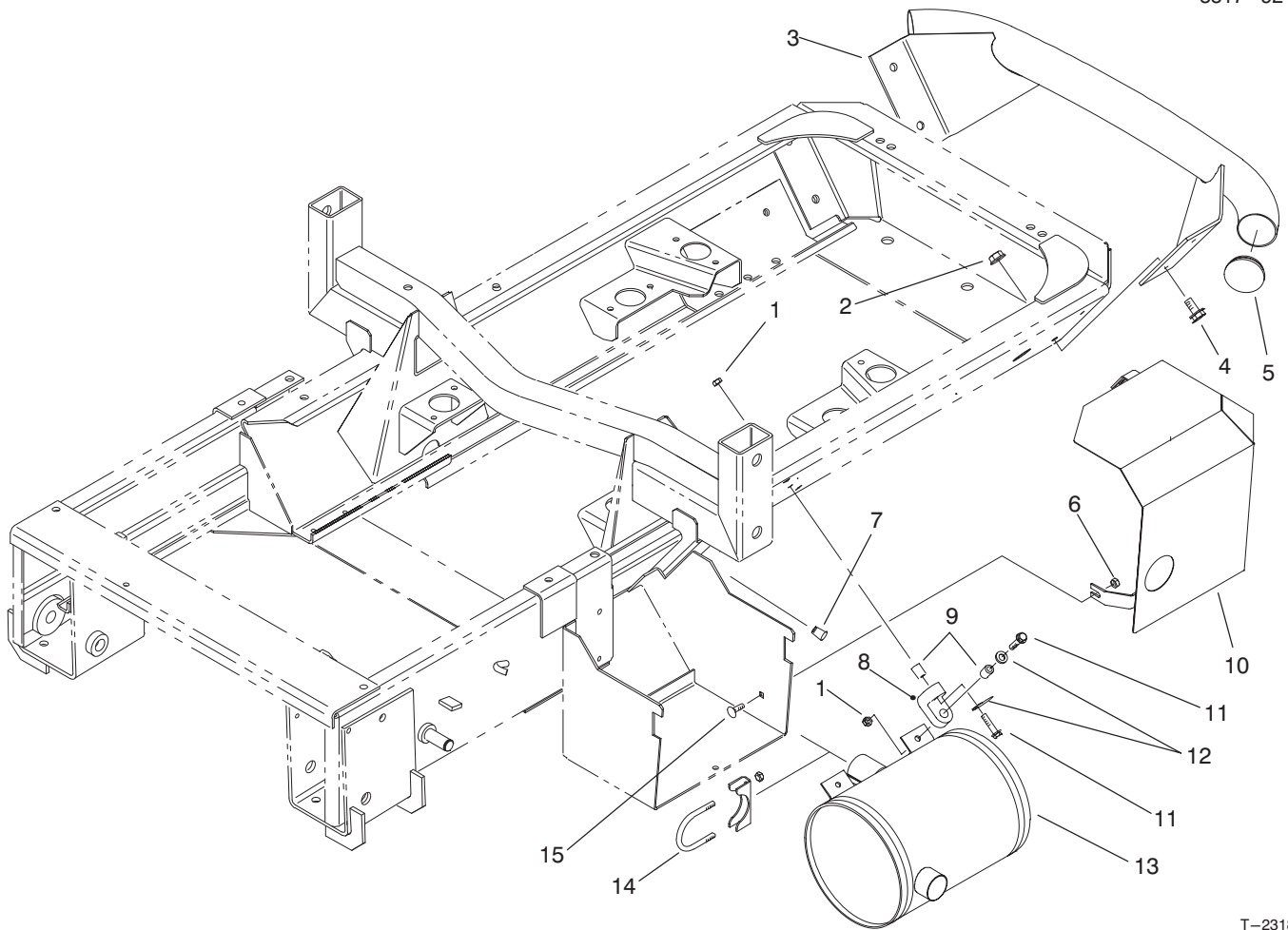
T-2356

SEAT ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	351-80	Clip - Edging	1
2	92-6533	Kit - Cushion, Replacement	1
3	351-78	Edging	1
4	92-6534	Shell	1
5	93-5599	Bracket - Seat, RH	1
6	93-5600	Bracket - Seat, LH	1
7	3234-5	Screw - Flange	4
8	33024-00	Nut - Lock	4

Ref. No.	Part No.	Description	No. Used
9	74-0720	Tube - Manual	1
10	2412-133	Clamp - R	2
11	33114-016	Screw - HH	4
12	321-3	Screw - HH	2
13	92-6282	Switch - Seat	1
*	92-6280	Assembly - Seat (Incl. Ref. 1-4)	1

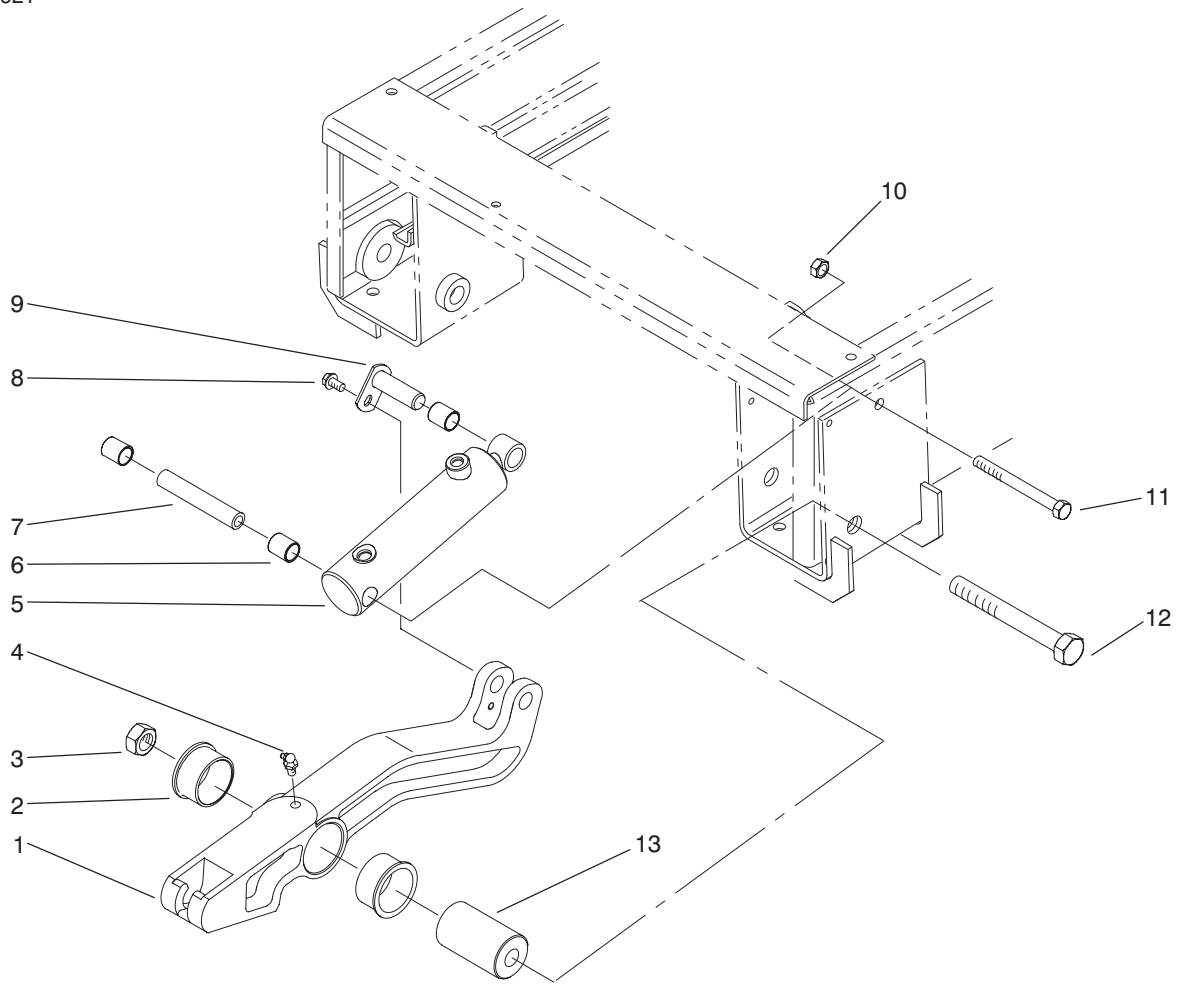
*Not Illustrated



T-2318

MUFFLER & BUMPER ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	33024-00	Nut - Lock	3	9	93-5023	Spacer	4
2	33006-00	Nut - HF	4	10	93-5594	Guard - Muffler	1
3	93-5440	Bumper	1	11	33104-035	Screw - HHF	4
4	33106-025	Screw - HHF	4	12	3256-3	Washer - Flat	4
5	2410-42	Cap - Bumper	2	13	93-5946	Muffler	1
6	33004-00	Nut - HF	3	14	2112-6	Clamp - Muffler	1
7	93-5450	Nut - Clinch	1	15	33124-020	Screw - Carriage	3
8	93-5113	Hanger - Rubber	2				



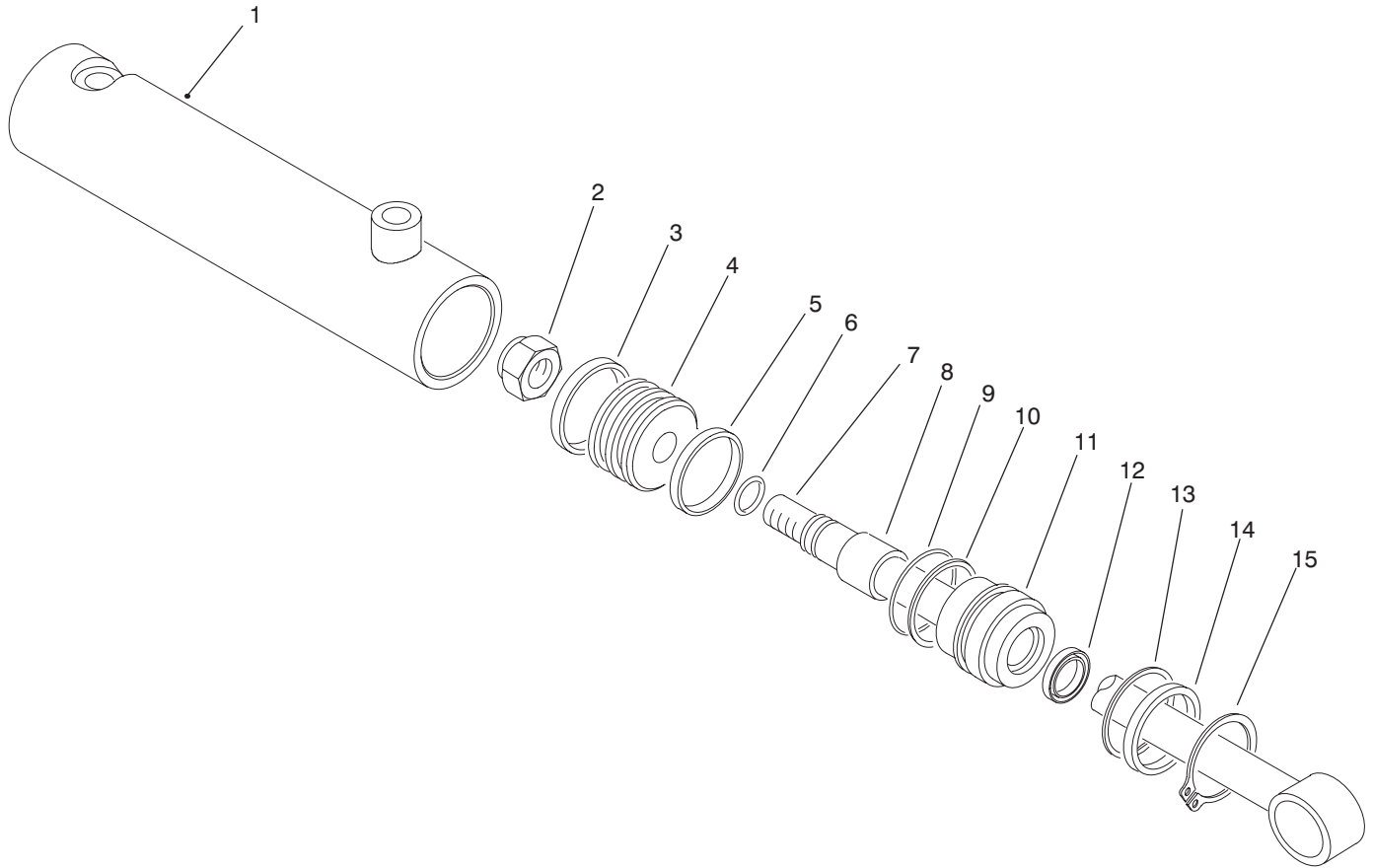
T-2340

LIFT ARM ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	93-4666	Arm - Lift, LH	1
*	93-4574	Arm - Lift, RH	1
2	93-4665	Bushing - Flange	4
3	33019-00	Nut - Hex.	2
4	302-33	Fitting - Grease	2
5	93-4640	Cylinder - Hydraulic	2
6	93-4639	Bushing	6

Ref. No.	Part No.	Description	No. Used
7	93-4586	Spacer - Cylinder	2
8	33104-016	Screw - HHF	2
9	93-4630	Pin	2
10	33026-00	Nut - Lock	2
11	33116-150	Screw - HH	2
12	33119-160	Screw - HH	2
13	93-4587	Spacer - Pivot	2

*Not Illustrated



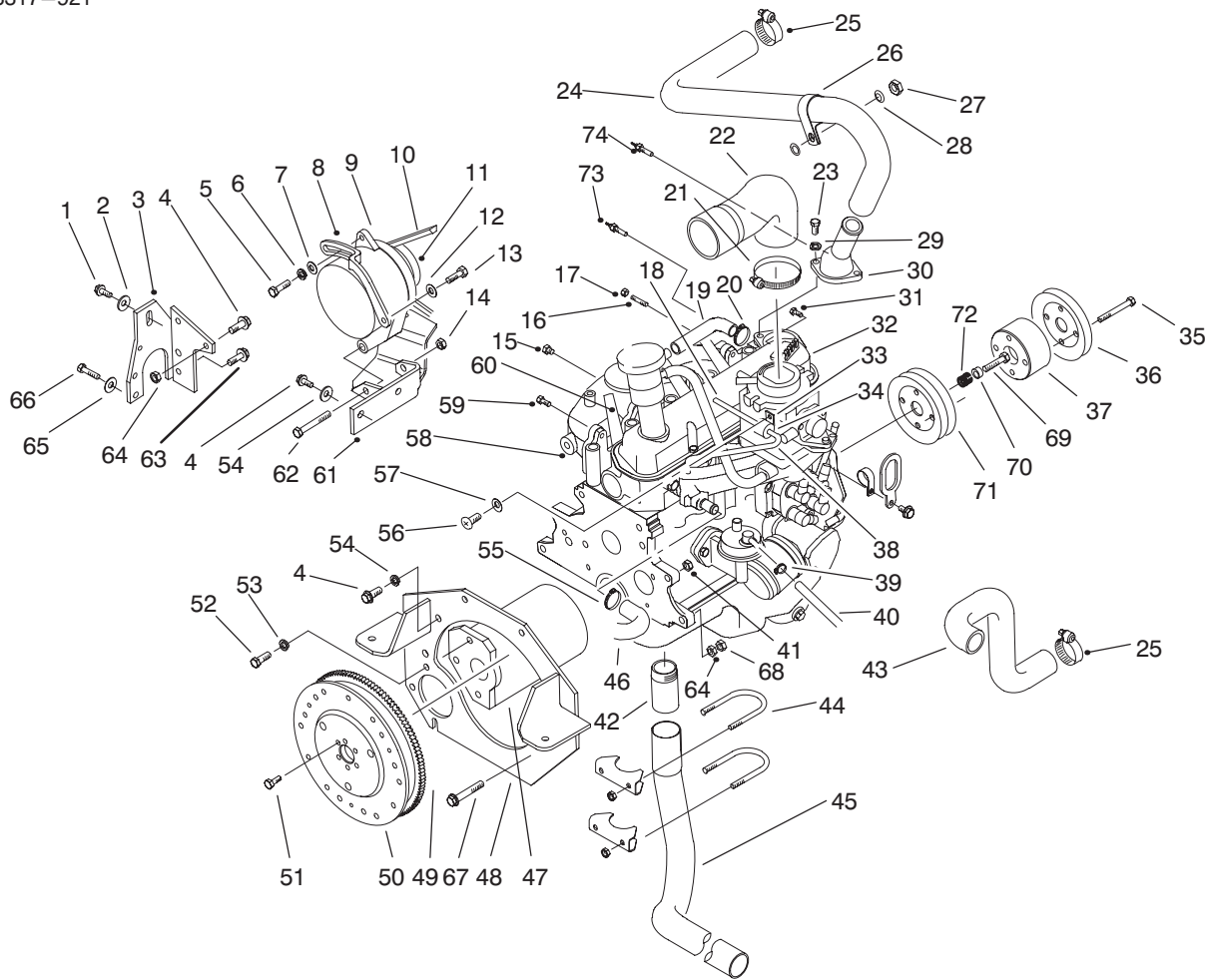
T-2261

HYDRAULIC CYLINDER ASSEMBLY NO. 93-4640

Ref. No.	Part No.	Description	No. Used
1	93-5609	Assembly - Tube	1
2	93-5607	Nut - Lock	1
3		Seal - Piston	1
4	93-5608	Assembly - Piston (Incl. Ref. #3 & 5)	1
5		Ring - Wear	1
6		O-Ring	1
7	93-5610	Assembly - Rod	1
8		Bushing	1
9		O-Ring	1

Ref. No.	Part No.	Description	No. Used
10		Washer - Backup	1
11	93-5611	Assembly - Head (Incl. Ref. #8-10 & 12)	1
12		Wiper	1
13	93-5612	Ring - Retaining	1
14	93-5613	Spacer	1
15	93-5614	Ring - Retaining	1
*	93-5493	Kit - Repair, Seal (Incl. Ref. #3, 5, 6, 9, 10 & 12)	1

*Not Illustrated



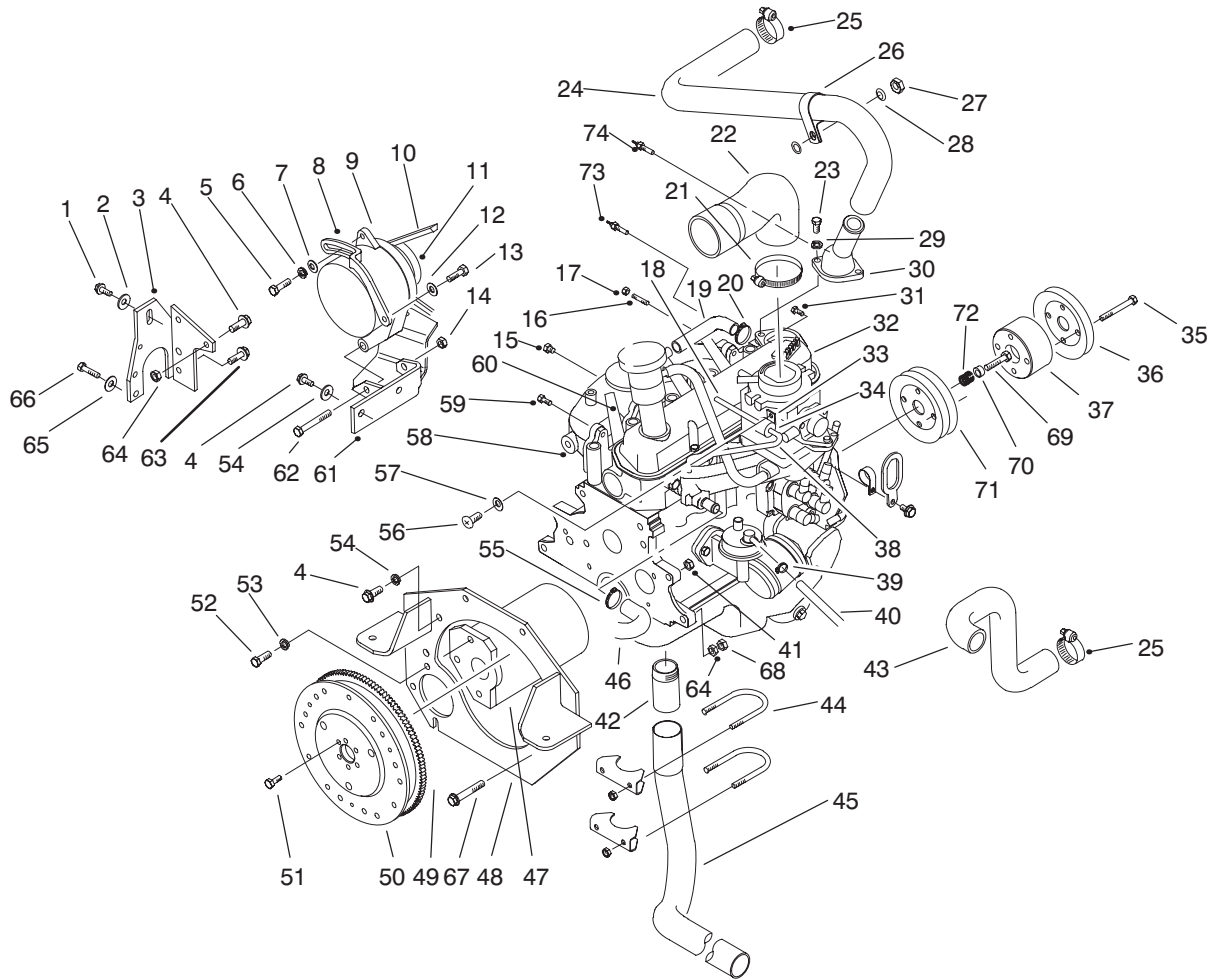
T-2344

ENGINE MOUNT ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	3234-5	Screw - Flange	1
2	3256-56	Washer - Flat	1
3	67-9150	Support - Governor	1
4	33105-025	Screw - HHF	4
5	323-6	Screw - HH	1
6	3253-21	Washer - Lock	1
7	3256-24	Washer - Flat	1
8	93-8489	Arm - Adjustment, Belt	1
†9	E2JL-10346-AA	Alternator	1
10	92-9785	Belt - Alternator	1
†11	D3JL-10A352-B	Pulley - Alternator	1
12	42-9850	Washer - Lock	1
13	48-7730	Screw - HH	1
14	33025-00	Nut - Lock	1
†15	353055-S7	Plug - Drain, Water	1
†16	E805697-S76	Stud	6
†17	N620481-S2	Nut	6
18	70-1920	Hose - Vacuum	1
19	70-2050	Hose - Breather	1
20	2412-108	Clamp - Hose	2
21	2412-110	Clamp - Hose	1
22	93-5085	Hose - Air Cleaner	1
†23	E602187-S72	Screw - HH	2
24	93-5640	Hose - Radiator, Upper	1
25	2412-111	Clamp - Hose	4
26	2412-147	Clamp - R	1
27	32146-1	Nut - Hex.	1
28	3256-1	Washer - Flat	2

Ref. No.	Part No.	Description	No. Used
†29	E60173-S71M	Washer - Lock	2
30	93-5410	Connector - Water, Outlet	1
31	70-1690	Adapter - Gauge, Temp.	1
†32	USG-411-6005A	Assembly - Engine, Ford	1
†33	384007-5	Clamp - Valve	1
†34	D4FZ-9C369A	Fuel Separator	1
35	33114-070	Screw - HH	4
36	93-5193	Pulley - Crank	1
37	93-5195	Spacer - Crank	1
38	70-1910	Hose - Vacuum, Advance	1
39	2412-108	Clamp - Hose	1
40	93-5483	Hose - Fuel	1
†41	N620482-S2	Nut	4
42	67-9130	Pipe - Muffler	1
43	93-5641	Hose - Radiator, Lower	1
44	2112-6	Clamp - Muffler	2
45	93-5048	Pipe - Exhaust	1
46	70-1670	Hose - Heater	1
†47	91AB11000JB	Starter	1
48	93-5074	Plate - Engine, Front	1
†49	89BM-6375-AA	Assembly - Flywheel (Incl. Ref. #50)	1
†50	D8RZ-6384A	Ring Gear - Flywheel	1
†51	D2RY-6379A	Bolt	6
52	48-9470	Screw	3
53	42-9600	Washer - Lock	3
54	3253-6	Washer - Lock	5
55	2412-119	Clamp - Hose	2

†Obtain from your local Ford Power Products Dealer.



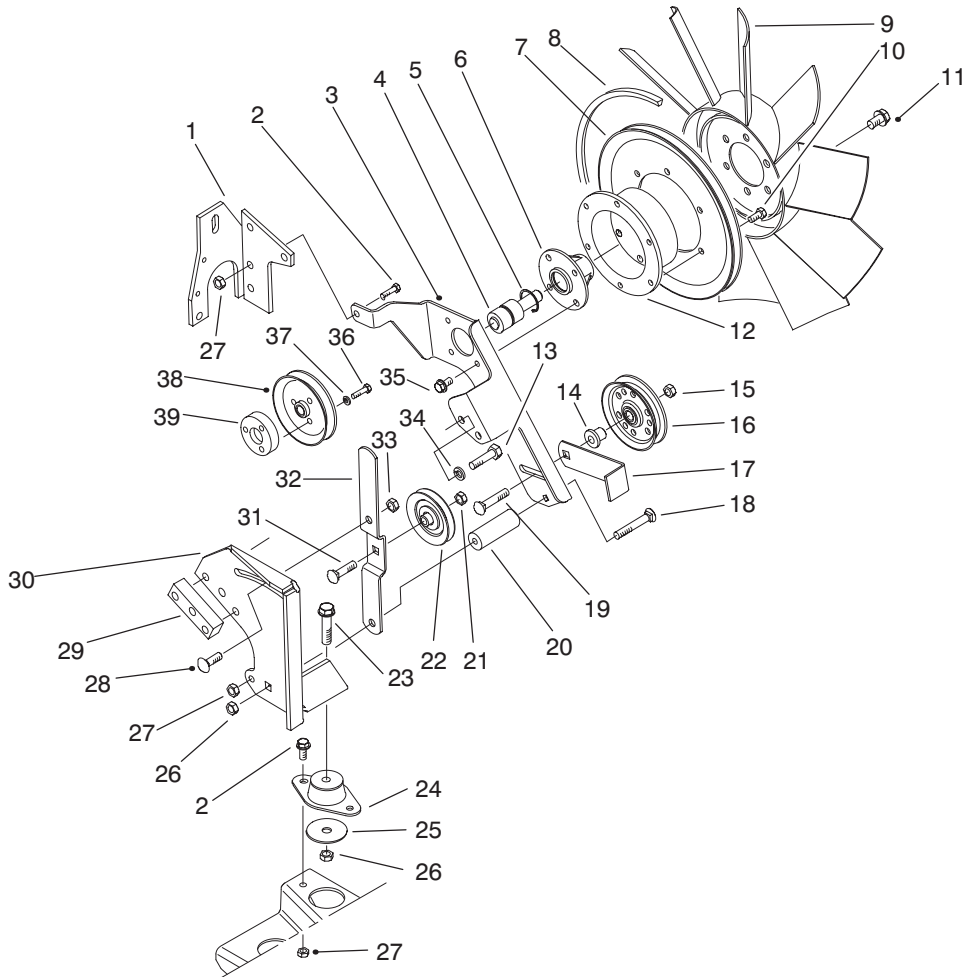
T-2344

ENGINE MOUNT ASSEMBLY (Continued)

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
56	3250-29	Screw	1	66	33114-030	Screw - HH	2
57	3256-21	Washer - Flat	1	67	33105-060	Screw - HHF	1
†58	EBJL-9430BA	Manifold - Exhaust	1	68	33015-00	Nut - HH	1
59	48-7730	Screw - HH	2	69	E7JL-6K340AA	Bolt - Pulley, Crankshaft	1
60	86-7921	Cover - Spark Plug Wire	4	70	E7JL-6378AA	Washer - Compression	1
61	93-5070	Mount - RH	1	71	E7JL-6A312AA	Pulley - Crankshaft	1
62	33115-110	Screw - HH	1	72	E7JL-6N300AA	Locking Rings - Pulley	2
63	33104-020	Screw - HHF	1	73	89FB-10884AA	Thermister	1
64	33005-00	Nut - HF	3	74	DOTZ-10884A	Switch - Temperature	1
65	3253-4	Washer - Lock	2	*†	89BM-9448BA	Gasket - Manifold	4

*Not Illustrated

†Obtain from your local Ford Power Products Dealer.



T-2345

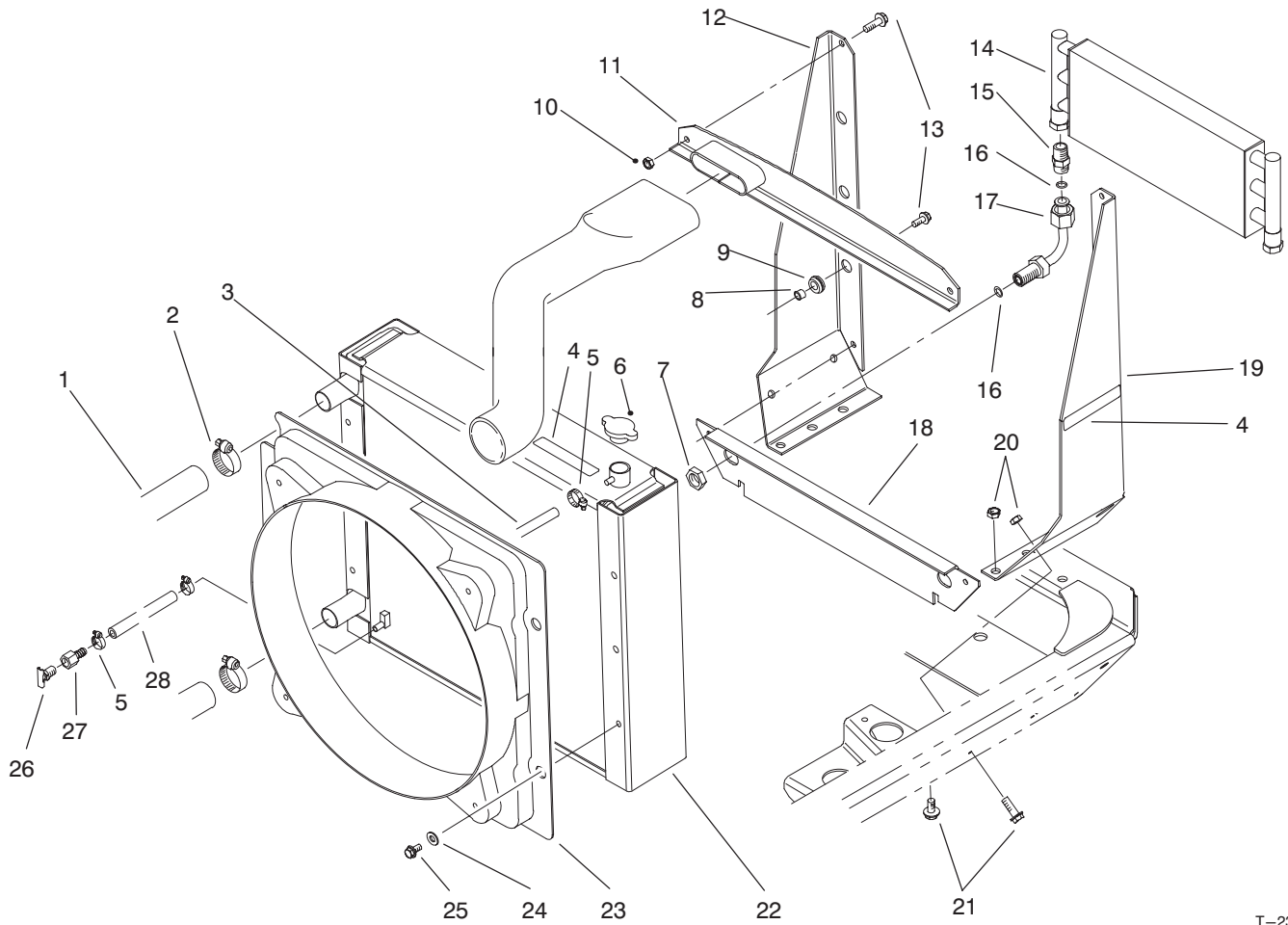
FAN BRACKET & PULLEY ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	67-9150	Support – Governor	1
2	33104-020	Screw – HHF	3
3	93-5170	Bracket – Fan	1
4	36-7290	Bearing	1
5	32120-10	Ring – Retaining	1
6	93-5187	Hub – Fan	1
7	93-5191	Pulley – Fan	1
8	93-5198	V-Belt	1
9	93-5114	Fan	1
10	33114-010	Screw – HH	6
11	33105-020	Screw – HHF	6
12	93-5190	Hub – Fan	1
13	48-7800	Screw	3
14	93-5197	Spacer – Idler	1
15	33005-00	Nut – HF	1
16	93-5194	Pulley – Idler	1
17	93-5504	Lever	1
18	33125-100	Screw – Carriage	1
19	33125-045	Screw – Carriage	1
20	93-5199	Spacer	1
21	3290-357	Nut – Flange	1

Ref. No.	Part No.	Description	No. Used
22	63-8140	Pulley – Idler	1
23	33105-050	Screw – HHF	1
24	93-5265	Mount – Engine	1
25	87-5100	Washer – Snubbing	1
26	33025-00	Nut – Lock	2
27	33024-00	Nut – Lock	2
28	33125-025	Screw – Carriage	1
29	93-5172	Spacer	1
30	93-5067	Mount – LH	1
31	3231-28	Bolt – Carriage	1
32	67-8890	Arm – Idler	1
33	33005-00	Nut – HF	1
34	42-9600	Washer – Lock	6
35	33104-016	Screw – HHF	4
36	43-2600	Screw	3
37	43-5930	Washer – Lock	3
38	92BF-8509AB	Pulley – Pump, Water	1
39	67-8910	Adapter – Pump, Water	1
†*	92BX8591BA	Kit – Water Pump (Incl. Pulley & Gasket)	1

† Obtain from your local Ford Power Products Dealer

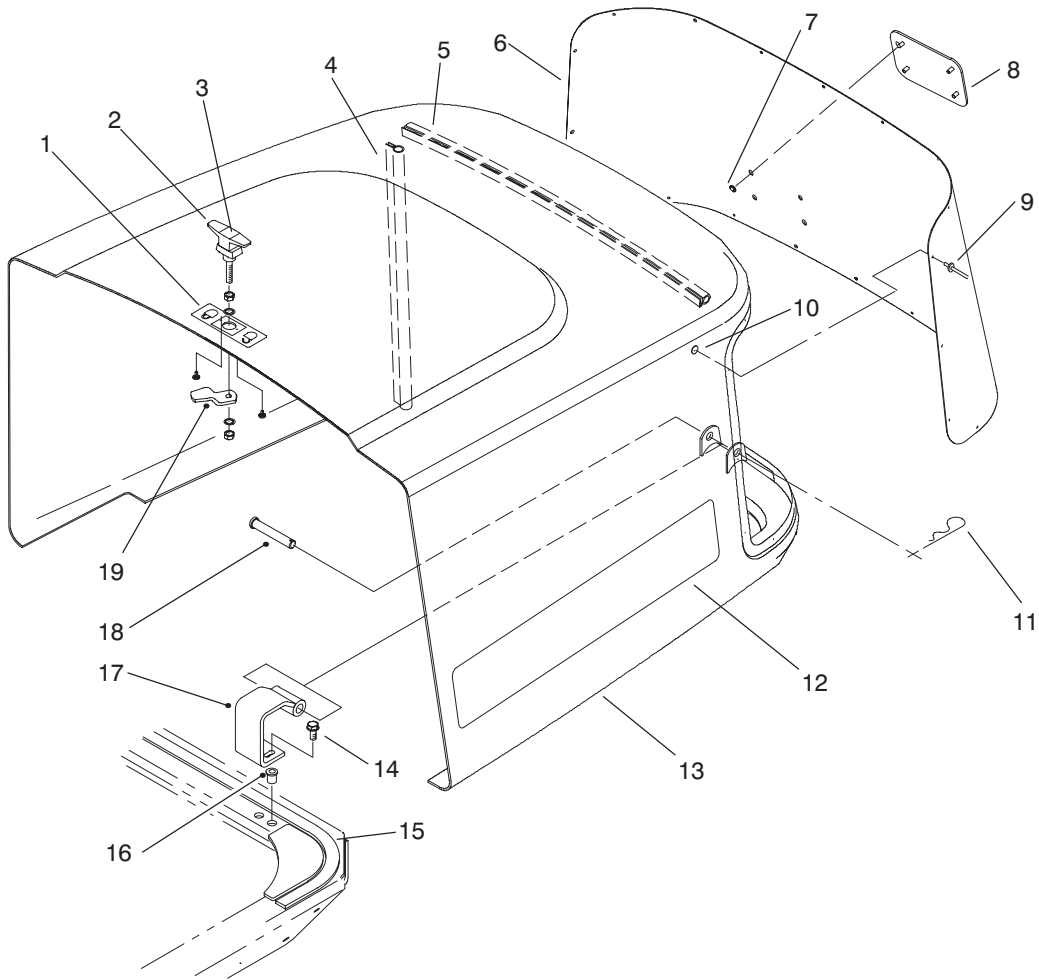
*Not Illustrated



T-2323

RADIATOR & HEAT EXCHANGER ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	93-5595	Hose – Radiator, Upper	1	15	93-5107	Fitting – Adapter	2
2	2412-111	Clamp – Hose	4	16	237-30	O-Ring	4
3	93-5544	Hose	1	17	93-5106	Tube – Cooler, Oil	2
4	77-3100	Decal – Caution	3	18	93-5103	Support – Lower, Radiator	1
5	2412-36	Clamp – Hose	1	19	93-5105	Support – LH, Radiator	1
6	93-5957	Cap – Radiator, Mini	1	20	33025-00	Nut – Lock	4
7	340-127	Nut – Bulkhead	2	21	33105-030	Screw – HHF	4
8	93-5109	Spacer	6	22	93-5644	Radiator	1
9	93-5108	Grommet – Rubber	6	23	93-5034	Shroud – Radiator	1
10	33024-00	Nut – Lock	4	24	3256-35	Washer – Flat	4
11	93-5100	Support – Upper, Radiator	1	25	33104-016	Screw – HHF	4
12	93-5104	Support – RH, Radiator	1	26	93-5528	Fitting – Drain Cock	1
13	33104-020	Screw – HHF	10	27	354-94	Barb – Female, Hose	1
14	63-5400	Exchanger – Heat	1	28	18-2080	Hose	1

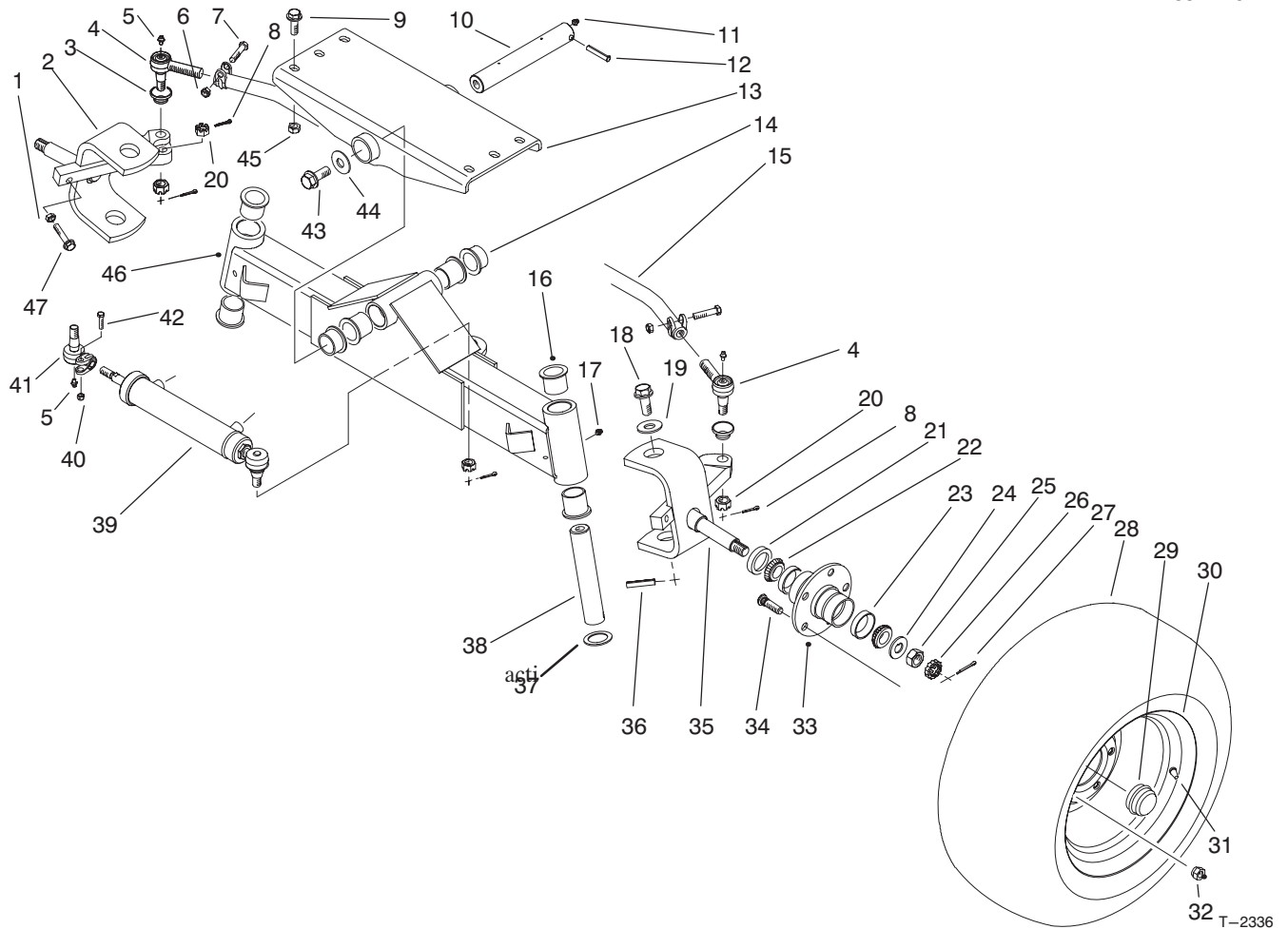


T-2321

HOOD ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	94-6328	Decal	1
2	93-5570	Handle - Latch (Incl. Ref. #19)	1
3	94-6329	Decal	1
4	93-5250	Seal - Bulb, Side	2
5	93-5251	Seal - Bulb, Top	1
6	93-5229	Screen - Rear	1
7	94-2638	Nut - Tinnemann	4
8	93-6028	Plate - Logo, Toro	1
9	117433	Rivet - Pop	22

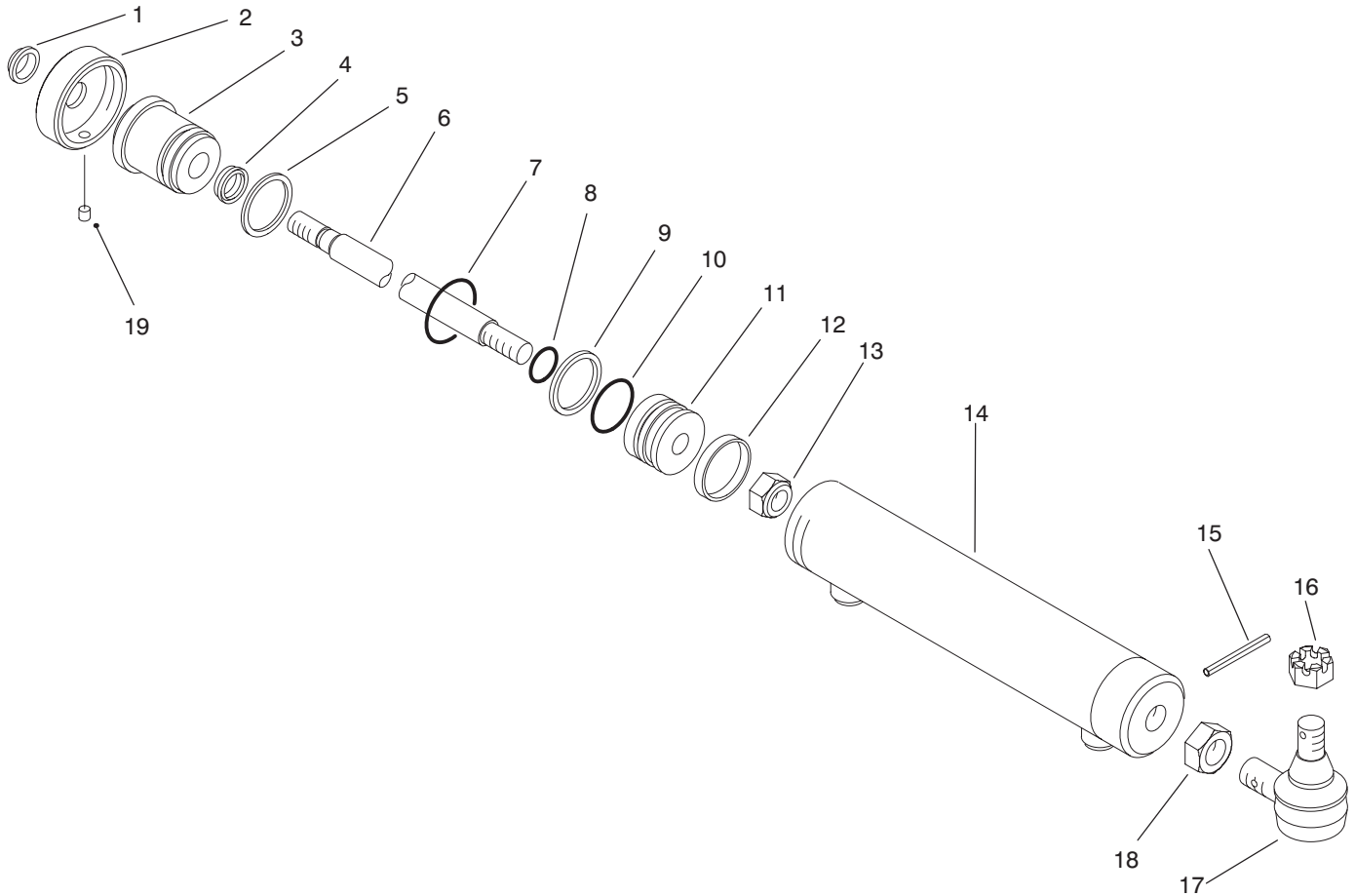
Ref. No.	Part No.	Description	No. Used
10	3269-10	Washer - Flat	22
11	3290-467	Pin - Cotter, Hair	2
12	93-5423	Decal - Hood	2
13	93-5086	Assembly - Hood	1
14	33104-020	Screw - HHF	4
15	93-5254	Strip - Foam, Rear	1
16	93-5450	Nut - Clinch	4
17	93-5093	Pivot - Hood	2
18	283-55	Pin - Clevis	2
19	93-5566	Arm - Latch	1



REAR AXLE ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	33015-00	Nut - HH	2
2	93-5158	Spindle - RH	1
3	71-4760	Seal	2
4	2411-45	Rod - End	2
5	302-55	Fitting - Grease	3
6	3296-39	Nut - Lock	2
7	323-9	Screw - HH	2
8	3272-11	Pin - Cotter	2
9	33106-035	Screw - HHF	6
10	93-5142	Pin - Axle, Pivot	1
11	302-2	Fitting - Grease	1
12	32121-110	Pin - Spring	1
13	93-5140	Pivot - Axle	1
14	93-4510	Bushing - Castor	2
15	93-5168	Asm. - Tie Rod (Incl. Ref. #3-8, & 20)	1
16	69-6470	Bushing	6
17	302-5	Fitting - Grease	2
18	33108-040	Screw - HHF	2
19	3256-7	Washer - Flat	2
20	32136-13	Nut - Castle	4
21	253-129	Seal - Hub	2
22	254-94	Cone - Bearing	4
23	254-72	Cup - Bearing	4
24	93-0309	Washer - Tab	2

Ref. No.	Part No.	Description	No. Used
25	3220-7	Nut - Jam	2
26	93-0307	Nut - Retainer, Lock	2
27	3272-13	Pin - Cotter	2
28	74-5560	Tire	2
29	241-119	Cap - Dust	2
30	217-122	Rim	2
31	232-27	Stem - Valve	2
32	242-50	Nut - Lug	10
33	21-2820	Assembly - Hub (Incl. Ref. #23 & 34))	2
34	10-6830	Stud - Drive	10
35	93-5496	Spindle - LH	1
36	32121-110	Pin - Spring	2
37	62-2170	Washer - Thrust	2
38	93-5503	Pin - Spindle, Pivot	2
39	93-5502	Cylinder - Steering	1
40	3296-4	Nut - Lock	1
41	92-5072	Rod - End, Ball Joint	1
42	3210-7	Screw - HH	1
46	93-5121	Axle - Rear	1
43	33108-040	Screw - HHF	1
44	3256-7	Washer - Flat	1
45	33026-00	Nut - Lock	6
47	33115-045	Screw - HH	2



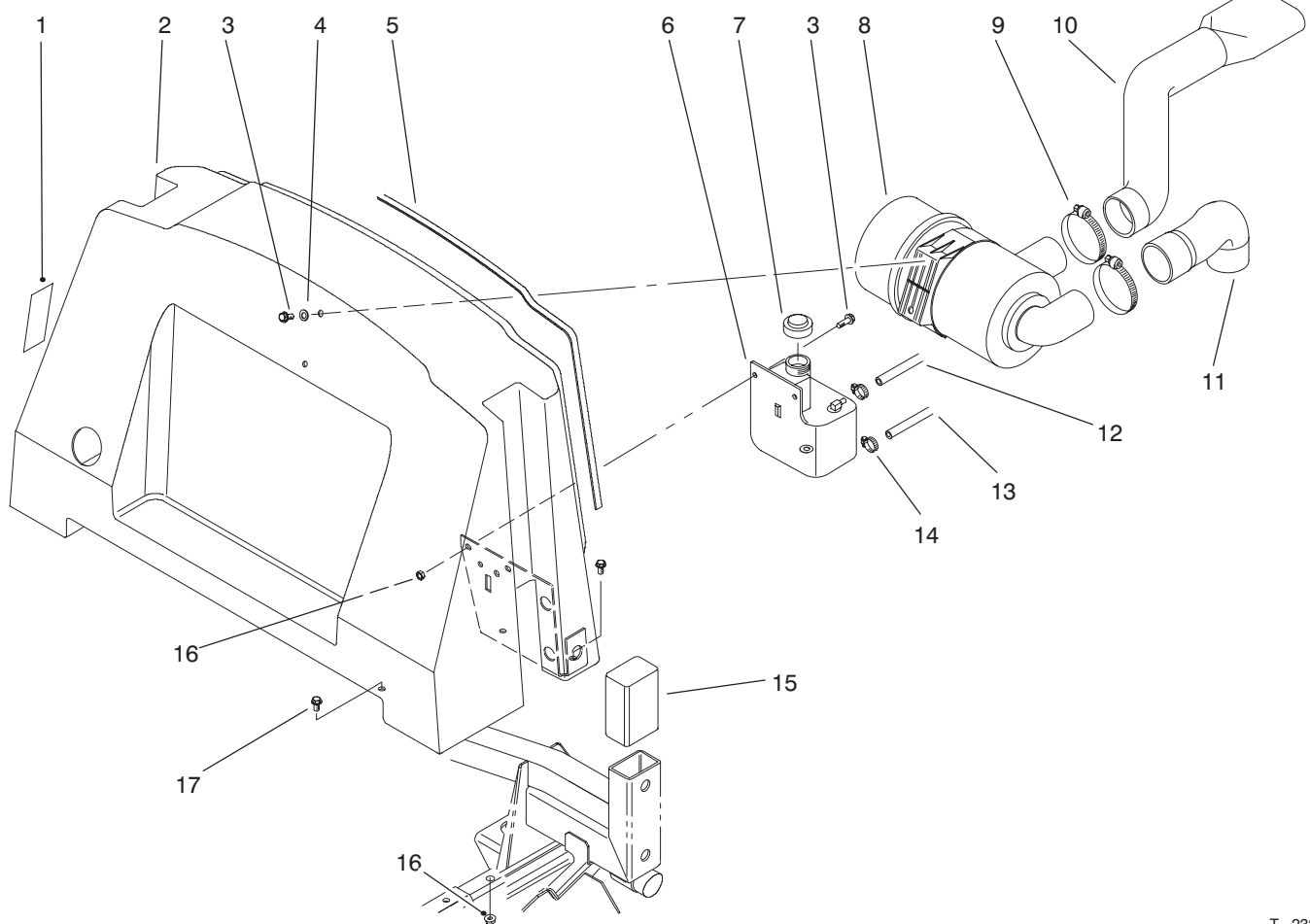
T-2260

STEERING CYLINDER ASSEMBLY NO. 93-5502

Ref. No.	Part No.	Description	No. Used
1		Wiper - Rod	1
2	92-5705	Cap - Threaded	1
3	92-5706	Head - Cap, Threaded	1
4		U-Cup, Loaded	1
5		Ring - Backup	1
6	93-5555	Rod	1
7		O-Ring	1
8		O-Ring	1
9		Ring - Piston, Unithane	1
10		O-Ring	1
11	92-5703	Piston	1

Ref. No.	Part No.	Description	No. Used
12		Ring - Wear	1
13	88-3590	Nut - Lock	1
14		Asm. - Barrel	1
15	32121-44	Pin - Roll	1
16	32136-13	Nut - Slotted	1
17	82-5730	End - Tie Rod	1
18	82-5740	Nut - Jam	1
19	92-5708	Screw - Set, Socket Hd.	1
*	92-5707	Kit - Seal (Incl. Ref. #1, 4, 5, 7-10 & 12)	1

*Not Illustrated

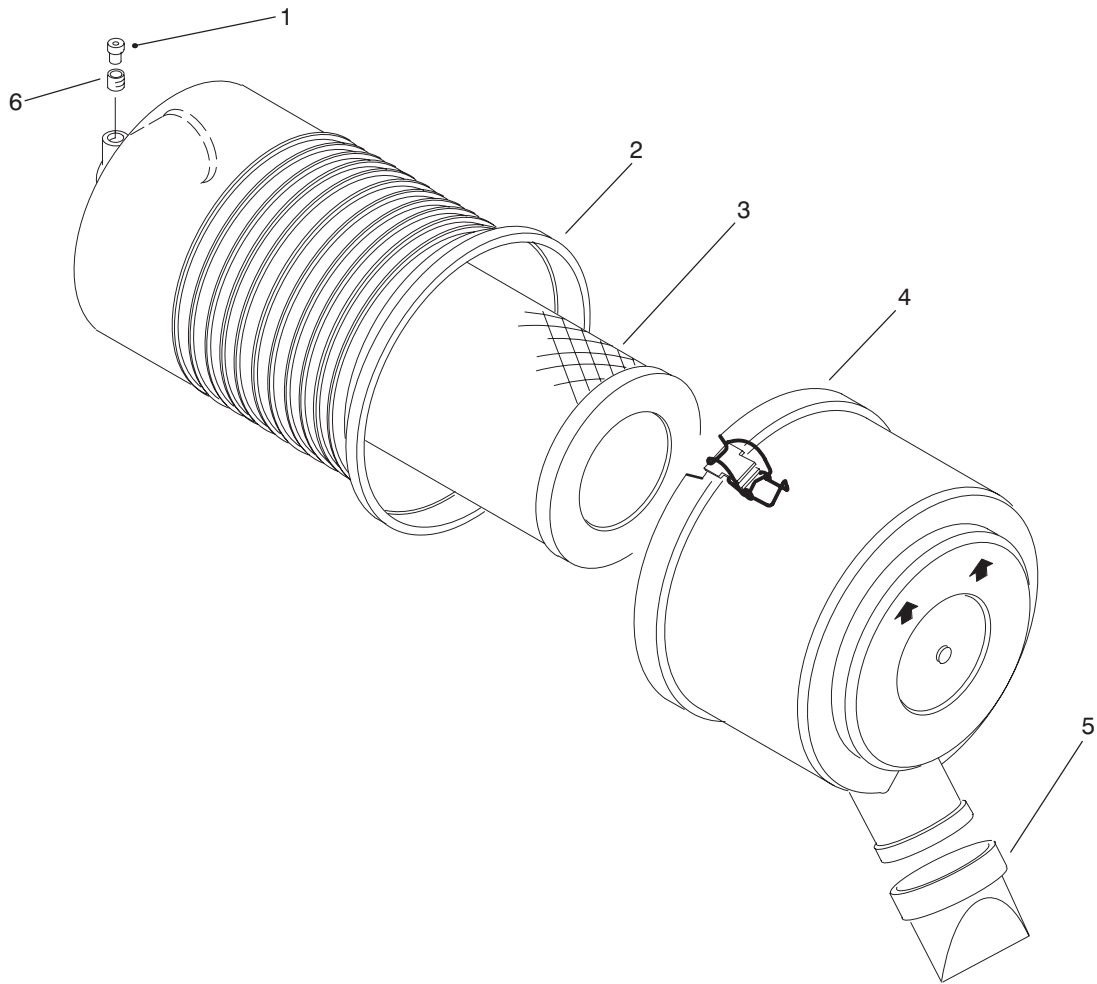


T-2320

CENTER SHROUD & AIR CLEANER ASM.

Ref. No.	Part No.	Description	No. Used
1	93-5617	Decal - Warning	1
2	93-5645	Asm. - Shroud, Center	1
3	33104-020	Screw - HHF	4
4	33094-00	Washer - Flat	2
5	93-5253	Strip - Foam, Hood	1
6	93-5642	Reservoir - Coolant	1
7	93-5960	Cap - Reservoir	1
8	93-5111	Air Cleaner	1
9	2412-110	Clamp - Hose	3

Ref. No.	Part No.	Description	No. Used
10	93-5083	Hose - Air Cleaner	1
11	93-5085	Hose - Air Cleaner	1
12	93-5540	Hose	1
13	93-5544	Hose	1
14	2412-36	Clamp	2
15	93-5638	Cover - Tube	2
16	33004-00	Nut- HF	4
17	33104-016	Screw - HHF	4



T-2252

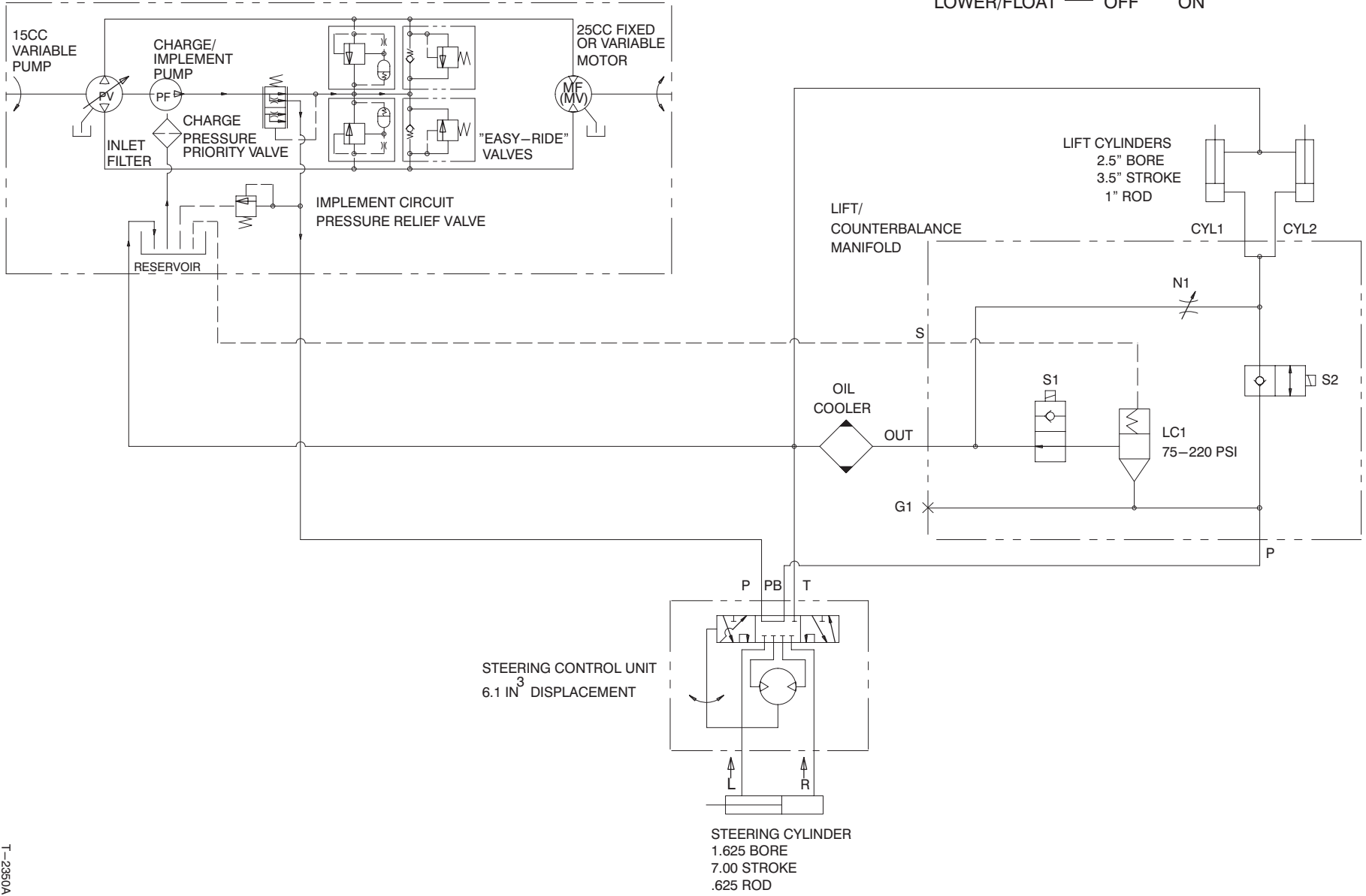
AIR CLEANER ASSEMBLY NO. 93-5111

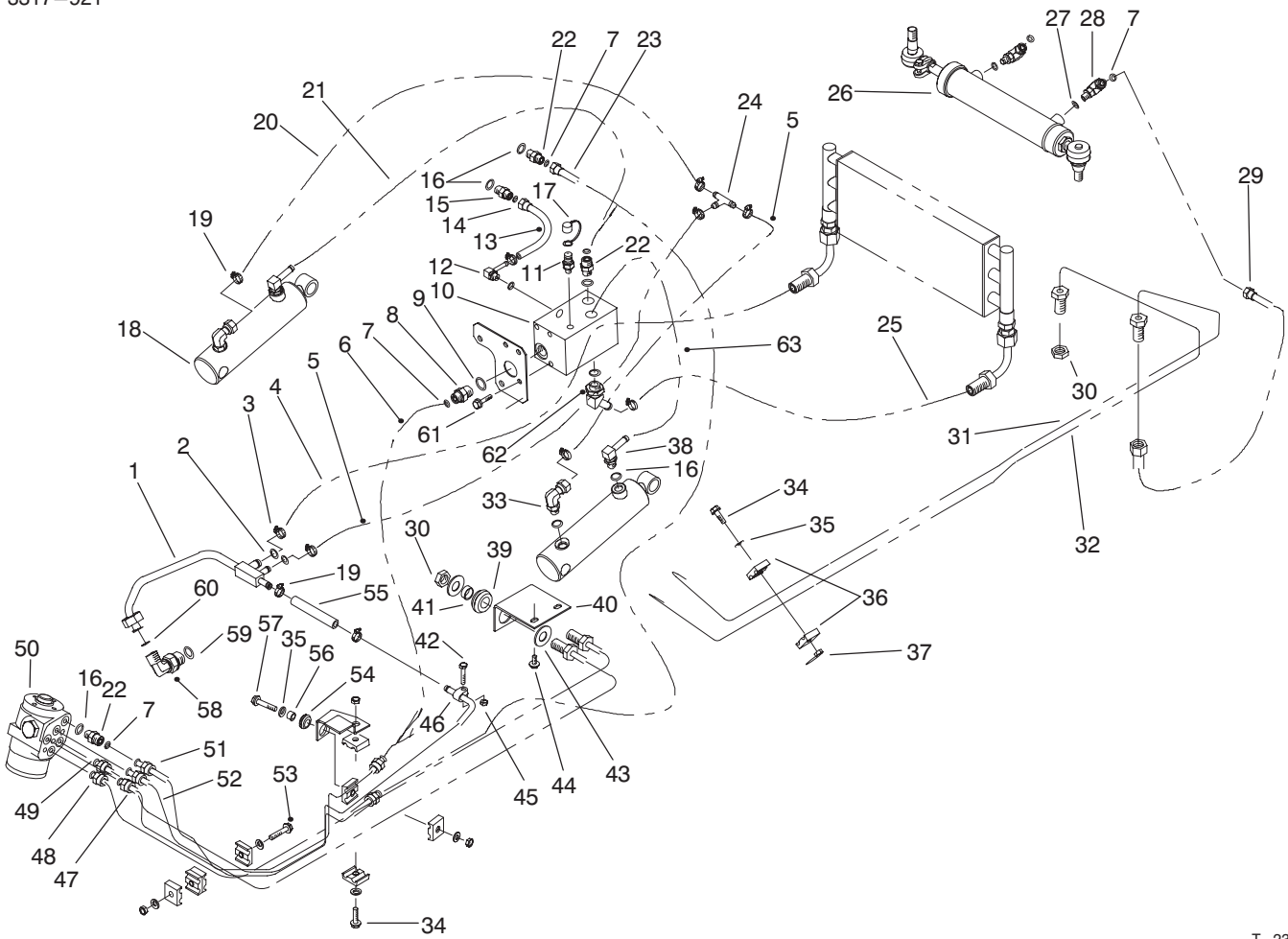
Ref. No.	Part No.	Description	No. Used
1	93-9164	Indicator	1
2		Assembly - Body	1
3	94-1412	Assembly - Element	1

Ref. No.	Part No.	Description	No. Used
4		Assembly - Cover	1
5	94-1414	Valve	1
6	94-1416	Assembly - Adapter	1

HYDRAULIC SCHEMATIC

LIFT/LOWER CONTROL	SOLENOIDS	
	S1	S2
LIFT	ON	OFF
HOLD	OFF	OFF
LOWER/FLOAT	OFF	ON



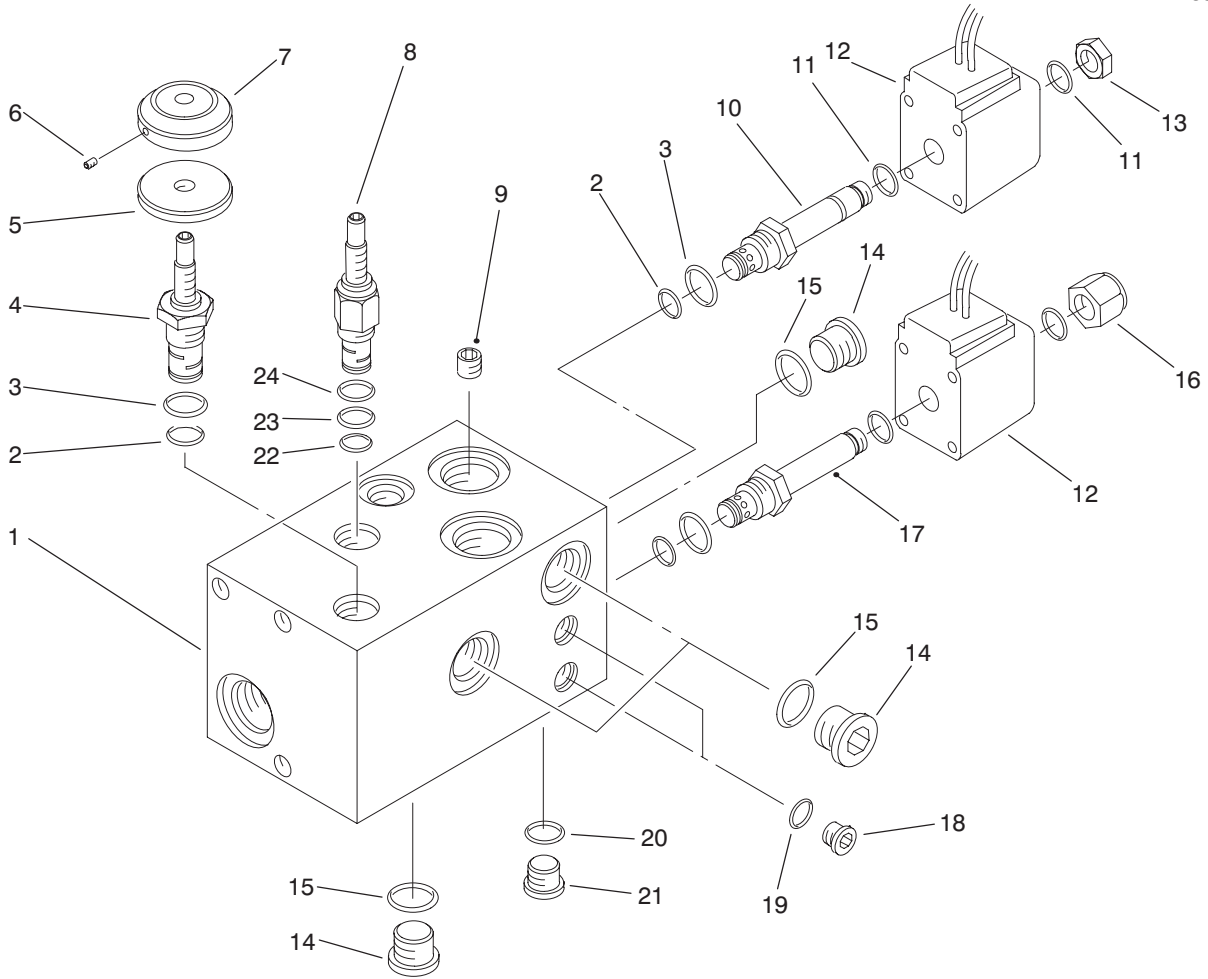


T-2343

HYDRAULIC COMPONENT ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	93-5578	Tube - Hydraulic	1
2		O-Ring	2
3	2412-36	Clamp - Hose	2
4	93-5360	Assembly - Hose	1
5	93-5358	Hose	2
6	93-5346	Assembly - Hose	1
7	237-22	O-Ring	10
8	340-3	Adapter	1
9	237-79	O-Ring	1
10	93-5115	Manifold	1
11	354-77	Fitting - Quick Connect	1
12	304-99	Fitting - Barbed	1
13	93-5361	Assembly - Hose	1
14	237-35	O-Ring	1
15	340-1	Fitting	1
16	237-42	O-Ring	9
17	353-947	Cap - Dust	1
18	93-4640	Cylinder - Hydraulic	2
19	2412-108	Clamp - Hose	9
20	93-5357	Hose	1
21	93-5386	Assembly - Hose	1
22	340-2	Adapter	8
23	93-5355	Assembly - Hose	1
24	354-107	Fitting - Tee	1
25	93-5356	Assembly - Hose	1
26	93-5502	Cylinder - Steering	1
27	237-78	O-Ring	2
28	340-97	Fitting 90°	2
29	93-5353	Assembly - Hose	2
30	340-70	Nut - Bulkhead	4
31	93-5571	Tube - Hydraulic	1
32	93-5572	Tube - Hydraulic	1

Ref. No.	Part No.	Description	No. Used
33	340-77	Elbow 90°	2
34	33104-035	Screw - HHF	2
35	3256-23	Washer - Flat	5
36	56-7973	Clamp - Tube	10
37	33024-00	Nut - Lock	4
38	354-135	Fitting - Barb 90°	2
39	240-4	Grommet	2
40	93-5587	Bracket - Bulkhead	1
41	69-8970	Spacer	2
42	33113-035	Screw - HH	1
43	69-8940	Washer	4
44	33104-016	Screw - HHF	2
45	33023-00	Nut - Lock	1
46	2412-114	Clamp - Tube	1
47	93-5574	Tube - Hydraulic	1
48	93-5576	Tube - Hydraulic	1
49	93-5575	Tube - Hydraulic	1
50	93-5165	Steering Control Unit	1
51	93-5573	Tube - Hydraulic	1
52	93-5577	Tube - Hydraulic	1
53	33114-045	Screw - HH	1
54	93-5108	Grommet - Rubber	1
55	93-5589	Hose	1
56	93-5109	Spacer	1
57	33104-040	Screw - HHF	1
58	340-105	Elbow	1
59		O-Ring	1
60		O-Ring	1
61	33104-025	Screw - HHF	3
62	354-126	Fitting - Barbed 45°	1
63	93-5385	Assembly - Hose	1



MANIFOLD ASSEMBLY NO. 93-5115

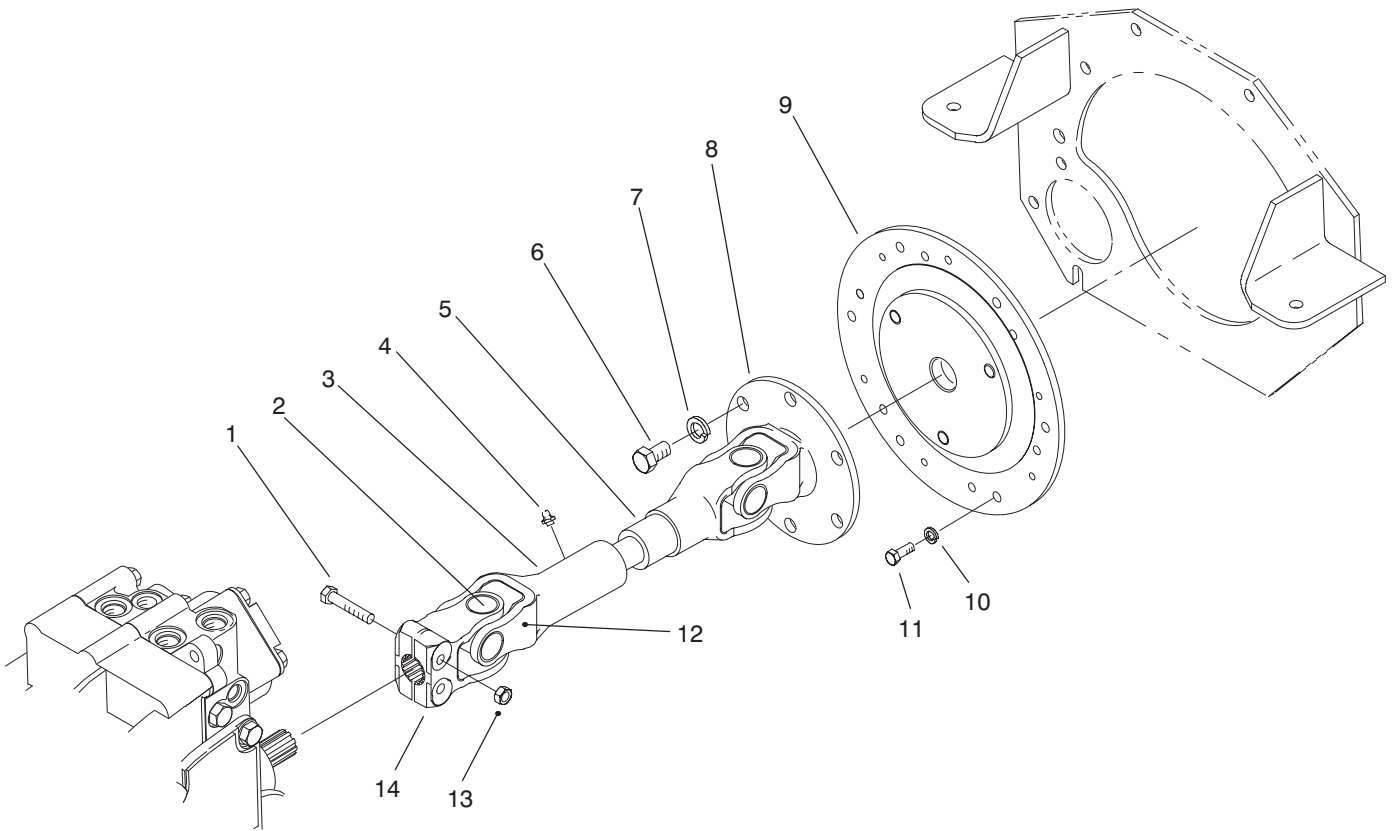
T-2254

Ref. No.	Part No.	Description	No. Used
†1		Body	1
†2		O-Ring	3
†3		O-Ring	3
4	93-5944	Valve - Needle (Incl. Ref. #2, 3, & 5-7)	1
†5		Wheel	1
†6		Screw - Set	1
7	93-5948	Knob - Knurled (Incl. Ref. #5 & 6)	1
8	93-5943	Valve - Logic (Incl. Ref. #22-240)	1
9	93-5945	Plug - Orifice, Optional	1
10	92-6315	Cartridge - NC, Poppet (Incl. Ref. #2, 3, 11 & 13)	1
11	94-5438	O-Ring	4
12	88-9190	Kit - Solenoid Coil	2
13	3219-10	Nut	1
14	353-989	Plug (Incl. Ref. #15)	4

Ref. No.	Part No.	Description	No. Used
15	237-42	O-Ring	4
†16		Nut	1
17	93-7494	Cartridge - NO, Poppet (Incl. Ref. #2, 3, 11 & 16)	1
18	353-991	Plug (Incl. Ref. #19)	4
19	237-156	O-Ring	4
20	237-78	O-Ring	1
21	353-990	Plug (Incl. Ref. #20)	1
†22		O-Ring	1
†23		O-Ring	1
†24		O-Ring	1
*	69-4240	Kit - Seal (Incl. Ref. #22-24)	1
*	75-2080	Kit - Seal (Incl. Ref. #2 & 3)	1

*Not Illustrated

† Not Serviced Separately.



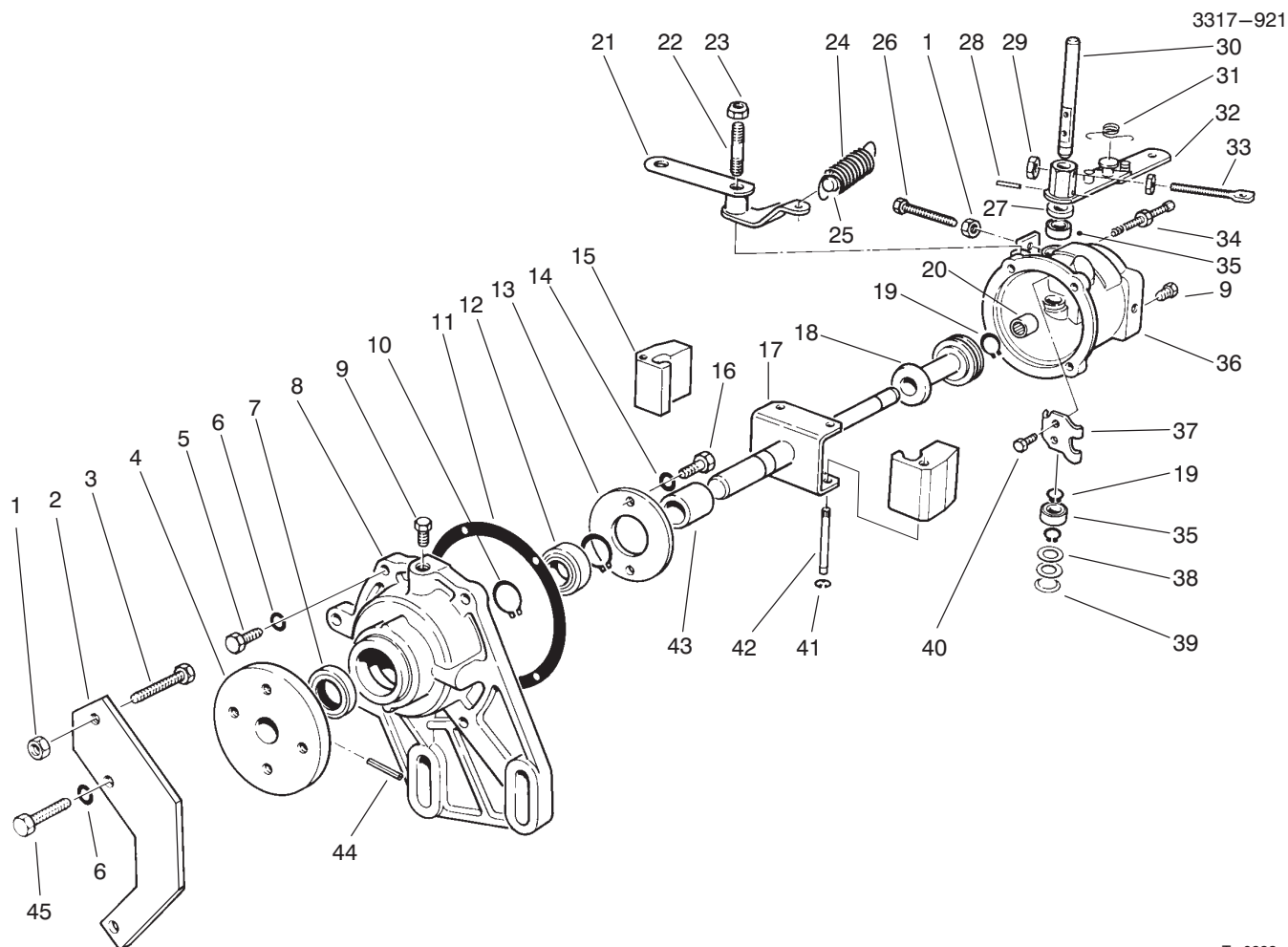
T-2341

DRIVE SHAFT ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	33114-045	Screw - HH	2
2	93-5561	Kit - Cross & Bearing	2
3	93-5563	Yoke - Slip	1
4		Fitting - Grease	1
5	93-5562	Yoke & Shaft	1
6	33106-020	Screw - HHF	3
7	3253-7	Washer - Lock	3
8	93-5559	Yoke - Flange	1

Ref. No.	Part No.	Description	No. Used
9	93-5043	Plate - Adapter, Engine	1
10	3253-4	Washer - Lock	6
11	33104-016	Screw - HH	6
12		Fitting - Grease 45°	2
13	33024-00	Nut - Lock	2
14	93-5560	Yoke & Clamp	1
*	93-5041	Asm. - Drive Shaft, Engine (Incl. Ref. #2-5, 8, 12, & 14)	1

*Not Illustrated

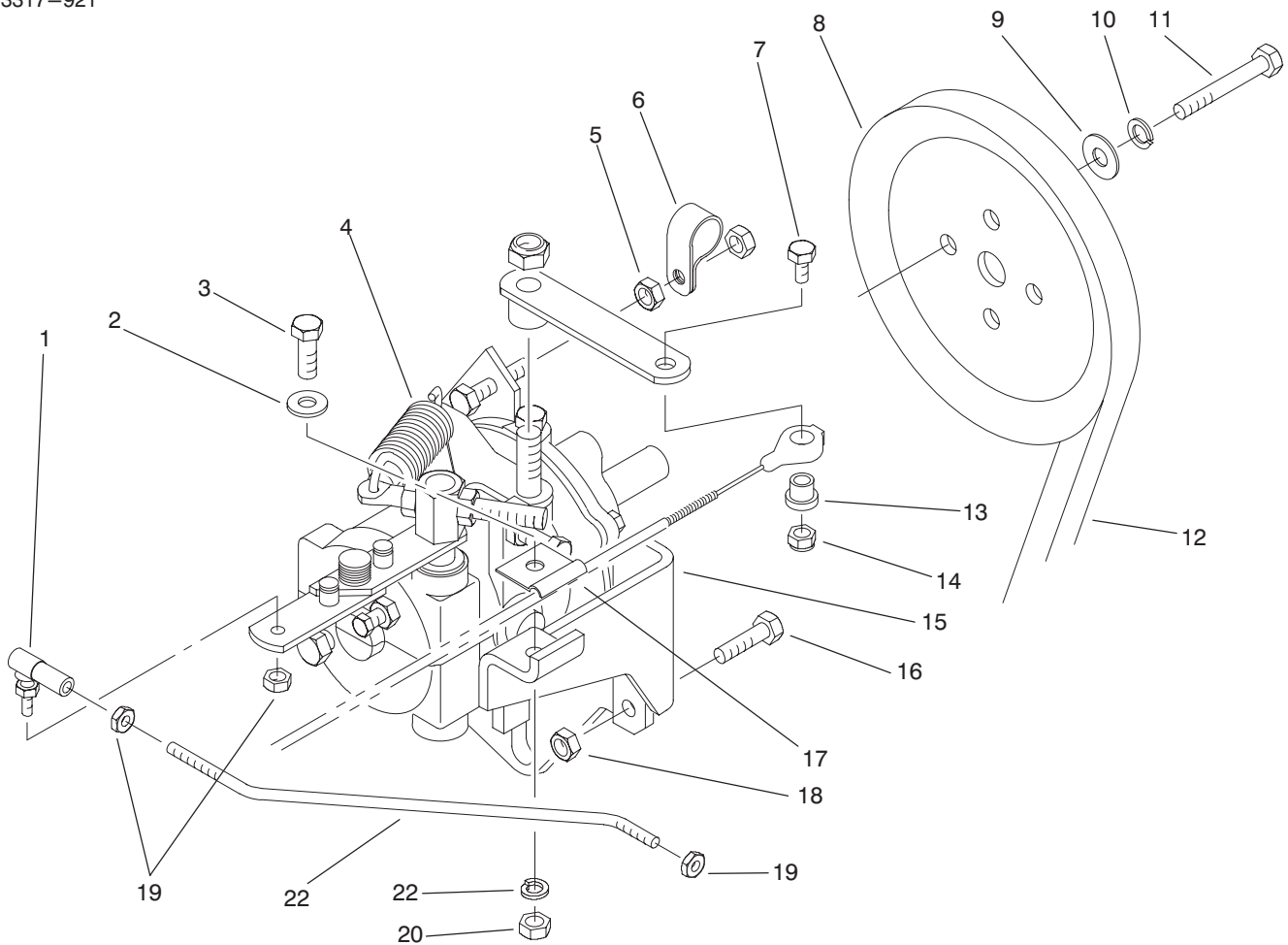


T-0933

GOVERNOR ASSEMBLY NO. 93-5407

Ref. No.	Part No.	Description	No. Used
1	3219-1	Nut	2
2	70-2160	Bracket - Speed Stop	1
3	72-5920	Screw	1
4	67-8370	Hub	1
5	18-5620	Screw	2
6	18-5630	Washer - Lock	4
7	18-5580	Seal - Oil Front	1
8	70-2060	Cover - Governor	1
9	285-17	Plug - Pipe	2
10	18-5640	Ring - Retaining	2
11	18-5790	Gasket	1
12	70-2140	Bearing - Front	1
13	70-2130	Clamp - Bearing to Cover	1
14	18-5770	Washer - Lock	2
15	93-5408	Flyweight	2
16	329-3	Screw - Cap, Hex. Hd.	2
17	70-2110	Main Shaft & Yoke	1
18	70-2100	Sleeve & Bearing Assy.	1
19	18-5540	Ring - Retaining	3
20	72-5940	Bearing - Needle	1
21	70-2070	Lever - Speed Adjusting	1
22	70-2090	Stud - Pivot Lever	1
23	3296-5	Nut - Lock	1

Ref. No.	Part No.	Description	No. Used
24	93-5409	Spring - Governor	1
25	72-5850	Pin - Force Idle	1
26	72-5930	Screw	1
27	71-4780	Seal - Oil Rocker Shaft	1
28	18-5750	Pin	1
29	3219-2	Nut	2
30	72-5890	Shaft - Rocker	1
31	18-5410	Spring - Torsion	1
32	72-5880	Throttle Lever Assy. (Incl. Ref. #31)	1
33	93-5437	Eyebolt	1
34	72-5910	Bumper Screw Assy.	1
35	18-5450	Bearing	2
36	70-2080	Body	1
37	18-5520	Lever - Rocker	1
38	18-5440	Spacer	2
39	18-5430	Plug - Expansion	1
40	18-5530	Screw & Lockwasher	2
41	18-5670	Retainer - Pin Pivot	2
42	18-5660	Pin - Pivot Flyweight	2
43	70-2120	Spacer	1
44	32121-51	Pin - Hub To Shaft	1
45	71-4770	Screw	2



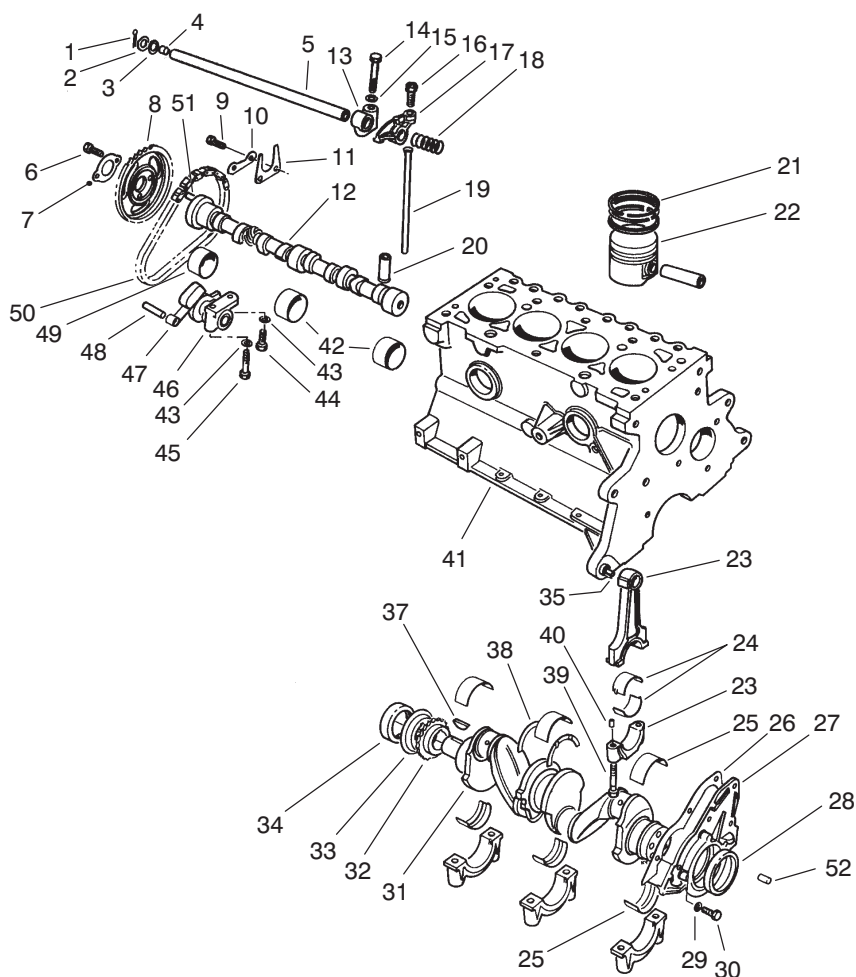
T-2337

GOVERNOR HARDWARE & PULLEY ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	21-5640	Ball Joint	1
2	33093-00	Washer - Flat	1
3	33103-020	Screw - HHF	1
4	93-5407	Governor - Mechanical	1
5	3219-1	Nut - Hex.	1
6	2412-39	Clamp - R	1
7	25-8640	Screw - SHH	1
8	67-8380	Pulley - Fan	1
9	3256-2	Washer - Flat	4
10	3253-4	Washer - Lock	4
11	322-3	Screw - HH	4

Ref. No.	Part No.	Description	No. Used
12	67-8510	Belt - Fan	1
13	93-5387	Spacer	1
14	3296-20	Nut - Lock	1
15	67-8240	Bracket - Throttle	1
16	33103-025	Screw - HHF	2
17	2412-31	Clamp - Bodine	1
18	33023-00	Nut - Lock	2
19	3219-14	Nut - Hex.	3
20	33013-00	Nut - Hex.	1
21	3253-3	Washer - Lock	1
22	67-8250	Rod - Throttle	1

*Not Illustrated



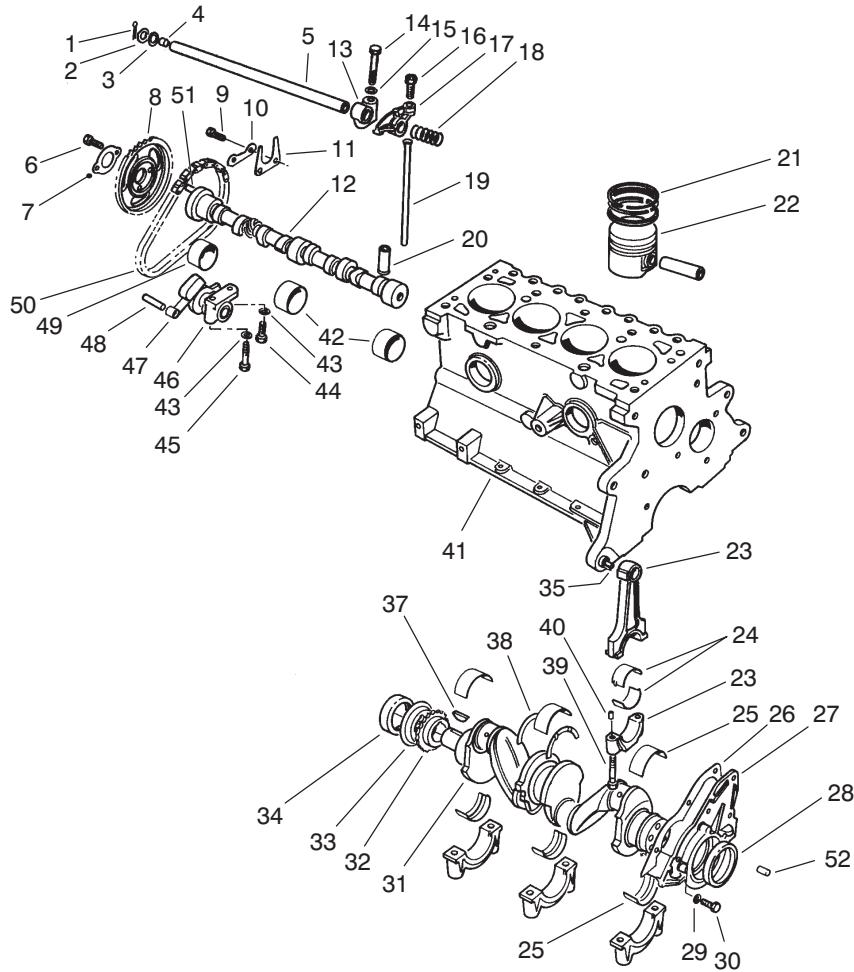
T-1004

CRANKSHAFT & CAMSHAFT ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	72025-S7	Cotter Pin	2	22	89BM-6102-AA	Piston Assembly STD. (Inc. Ref. #21)	4
2	77BM-6598-AB	Washer - Spring	2	*	89BM-6102-BA	Piston Assembly .020 OS. (Inc. Ref. #21)	A/R
3	DORY-6590-A	Washer - Flat	2	*	89BM-6102-CA	Piston Assembly .040 OS. (Inc. Ref. #21)	A/R
4	357966-S	Plug - Rocker Arm Shaft	2	23	89BM-6200-AD	Connecting Rod Assy.	4
5	89BM-6A557-AA	Rocker Arm Shaft Assy. (Incl. Ref. #4)	1	24	89BM-6211-AA	Bearing - Rod STD.	8
6	E602351-S72	Bolt	2	*	89BM-6211-BA	Bearing - Rod .001 U.S.	A/R
7	DORY-6258-A	Retainer	1	*	89BM-6211-CA	Bearing - Rod .010 U.S.	A/R
8	77BM-6256-AA	Sprocket - Camshaft	1	*	89BM-6211-DA	Bearing - Rod .020 U.S.	A/R
9	N602166-S2	Bolt	2	*	89BM-6211-EA	Bearing - Rod .030 U.S.	A/R
10	DORY-6255-A	Retainer	1	25	89BM-6333-AA	Bearing - Crank Upper STD. OD STD. ID	5
11	DORY-6269-A	Plate - Thrust	1	*	89BM-6331-AA	Bearing - Crank Lower STD. OD STD. ID	5
12	89BM-6251-AA	Camshaft	1	*	89BM-6333-BA	Bearing - Crank Upper STD. OD .005 US. ID	A/R
13	77BM-6531-BB	Support - Rocker Shaft	4	*	89BM-6331-BA	Bearing - Crank Lower STD. OD .005 US. ID	A/R
14	E800509-S72	Bolt - Rocker Support	4	*	89BM-6333-CA	Bearing - Crank Upper STD. OD .010 US. ID	A/R
15	E630031-S101	Washer	4				
16	DORY-6549-B	Screw	8				
17	89BM-6529-AB	Valve Rocker Arm - R.H. (Inc. Ref. #16)	4				
*	89BM-6K528-AB	Valve Rocker Arm - L.H. (Inc. Ref. #16)	4				
18	DORY-6587-A	Spring - Locating	3				
19	89BM-6565-AA	Rod - Valve Push	8				
20	89BM-6500-AA	Tappet - STD.	8				
21	89BM-6148-AA	Ring Set - STD.	4				
*	89BM-6148-BA	Ring Set - .020 OS.	A/R				
*	89BM-6148-CA	Ring Set - .040 OS.	A/R				

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.



T-1004

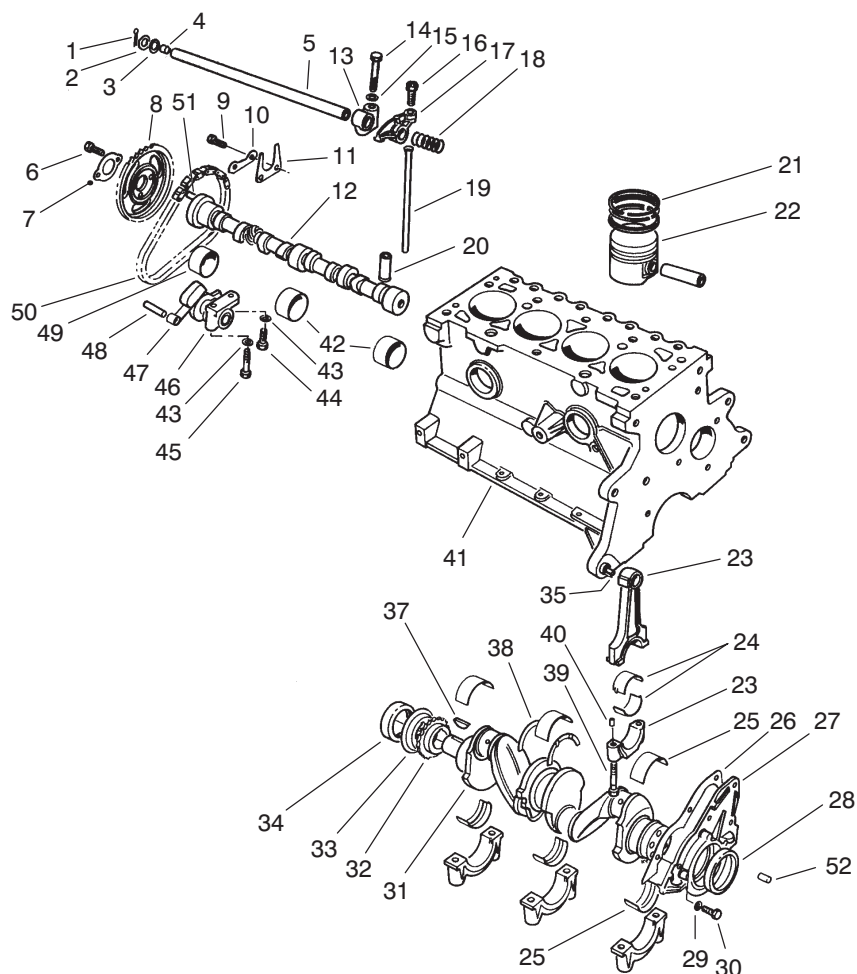
CRANKSHAFT & CAMSHAFT ASSEMBLY (Continued)

Ref. No.	Part No.	Description	No. Used
*25	89BM-6333-DA	Bearing - Crank Upper .015 OD STD. ID	A/R
*	89BM-6331-DA	Bearing - Crank Lower .015 OD STD. ID	A/R
*	89BM-6333-EA	Bearing - Crank Upper STD. OD .020 US. ID	A/R
*	89BM-6331-EA	Bearing - Crank Lower STD. OD .020 US. ID	A/R
*	89BM-6333-FA	Bearing - Crank Upper STD. OD .030 US. ID	A/R
*	89BM-6331-FA	Bearing - Crank Lower STD. OD .030 US. ID	A/R
*	89BM-6333-GA	Bearing - Crank Upper .015 OS. OD .010 US. ID	A/R
*	89BM-6331-GA	Bearing - Crank Lower .015 OS. OD .010 US. ID	A/R
*	89BM-6333-HA	Bearing - Crank Upper .015 OS. OD .020 U.S. ID	A/R
*	89BM-6331-HA	Bearing - Crank Lower .015 OS. OD .020 US. ID	A/R
26	89BM-6344-BA	Gasket Rear Retainer	1

Ref. No.	Part No.	Description	No. Used
27	86BM-6K318-AA	Retainer Assembly Rear	1
28	86HM-6701-A1A	Seal Crankshaft Rear	1
29	E630173-S71M	Lockwasher	4
30	E602187-S72	Bolt	4
31	89BM-6303-DA	Crankshaft Assembly	1
32	DORY-6306-A	Sprocket	1
33	D8RZ-6310-A	Slinger Oil	1
34	83BM-6700-A4A	Seal - Front Cover	1
35	70HM-6397-AA	Dowel	2
37	D0RY-6B316-A	Key - Woodruff	1
38	89BM-6A341-AA	Washer - Bearing Thrust STD.	2
*	89BM-6A341-BA	Washer - Bearing Thrust .015 OS.	A/R
39	89BM-6214-DB	Bolt - Connecting Rod	8
40	116336-ES100	Dowel Pin - Rod	8
41	93BM-6011-AA	Cylinder Block	1
42	DORY-6262-C	Bearing - STD. ID STD. OD	2
*	DORY-6262-B	Bearing - STD. ID +.020 OD	A/R
43	34805-S8	Lockwasher	2
44	E602166-S72	Bolt	1
45	E600116-S204	Bolt	1
46	DIFZ-6284-A	Tensioner	1

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.



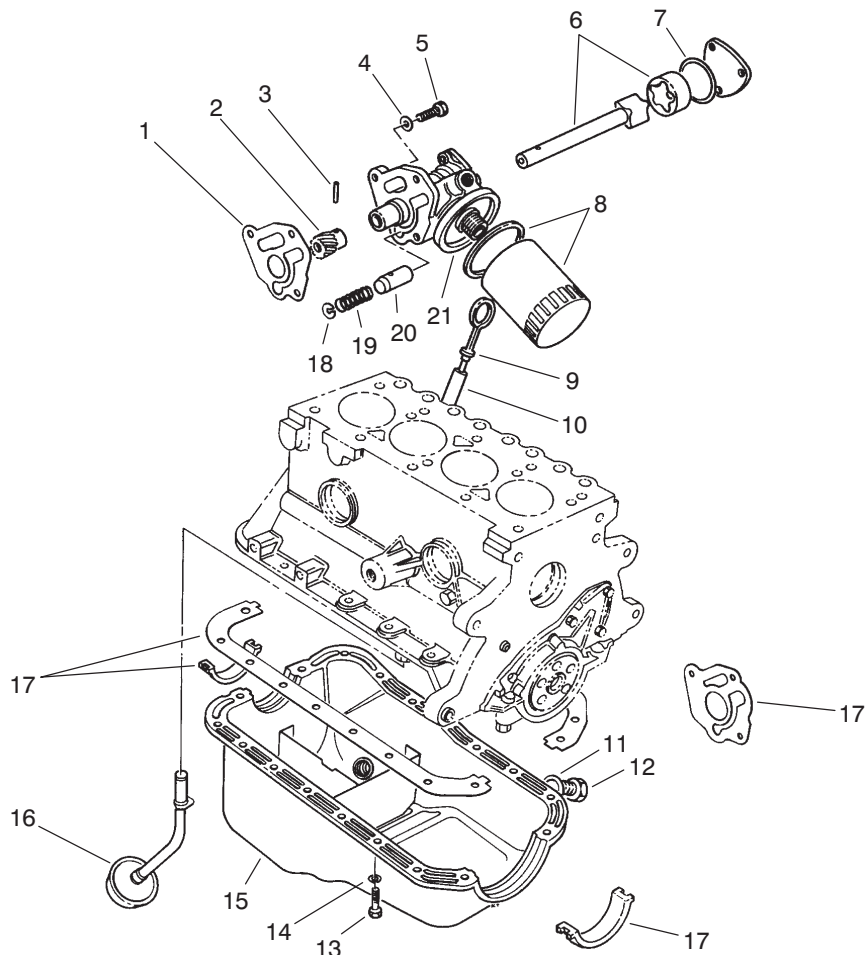
T-1004

CRANKSHAFT & CAMSHAFT ASSEMBLY (Continued)

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
47	77BM-6K255-AC	Arm - Tensioner	1	50	DORY-6268-A	Chain	1
48	E43-CP-1	Pin	1	51	E93A-6253-A	Dowel	1
49	DORY-6261-A	Bearing - STD. ID STD. OD	1	52	E-840161-S	Dowel	1
*	DORY-6261-B	Bearing - STD. ID +.020 OD	A/R	*	88BX-6008-AA	Gasket Kit Complete	1
				*	88BX-6014-AA	Gasket Kit Upper	1

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.

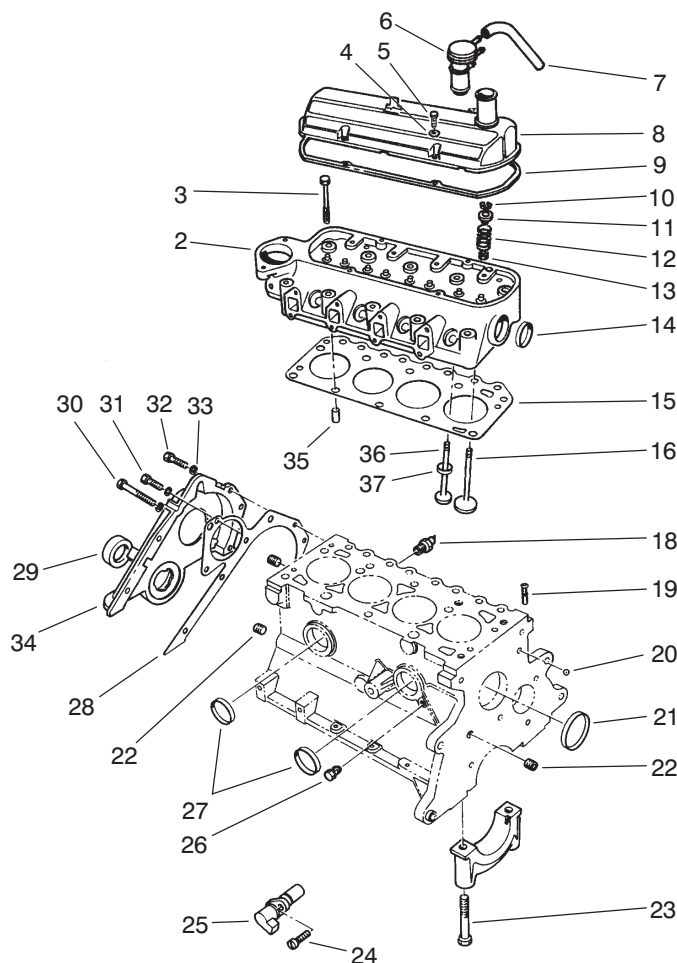


T-1003

OIL PUMP & FILTER ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	89BM-6659-AA	Gasket - Oil Pump	1	12	E9DZ-6730-B	Plug - Oil Drain	1
2	DORY-6652-A	Gear	1	13	E602165-S72	Bolt	18
3	72432-S	Pin - Drive Gear	1	14	34805-S8	Lockwasher	18
4	E630173-571M	Lockwasher	3	15	86BM-6675-AA	Oil Pan	1
5	E800519-S72	Bolt	3	16	86BM-6617-AA	Oil Pickup Tube Assy.	1
6	DIFZ-6608-B	Rotor & Shaft	1	17	A850X-6013-AA	Kit - Gasket Seal	1
7	116682-ES	Seal Cover Plate	1	18	DORY-6666-A	Plug	1
8	FL-400-A	Filter - Oil	1	19	DORY-6670-A	Spring	1
9	92BM-6750-AA	Indicator - Oil Level	1	20	DORY-6674-A	Plunger	1
10	89BM-6784-AA	Tube Oil Level Indicator	1	21	D8RZ-6600-A	Pump - Oil	1
11	E9DZ-6734-B	Gasket Oil Drain Plug	1				

Note: Order parts from your local Ford Power Products Dealer.



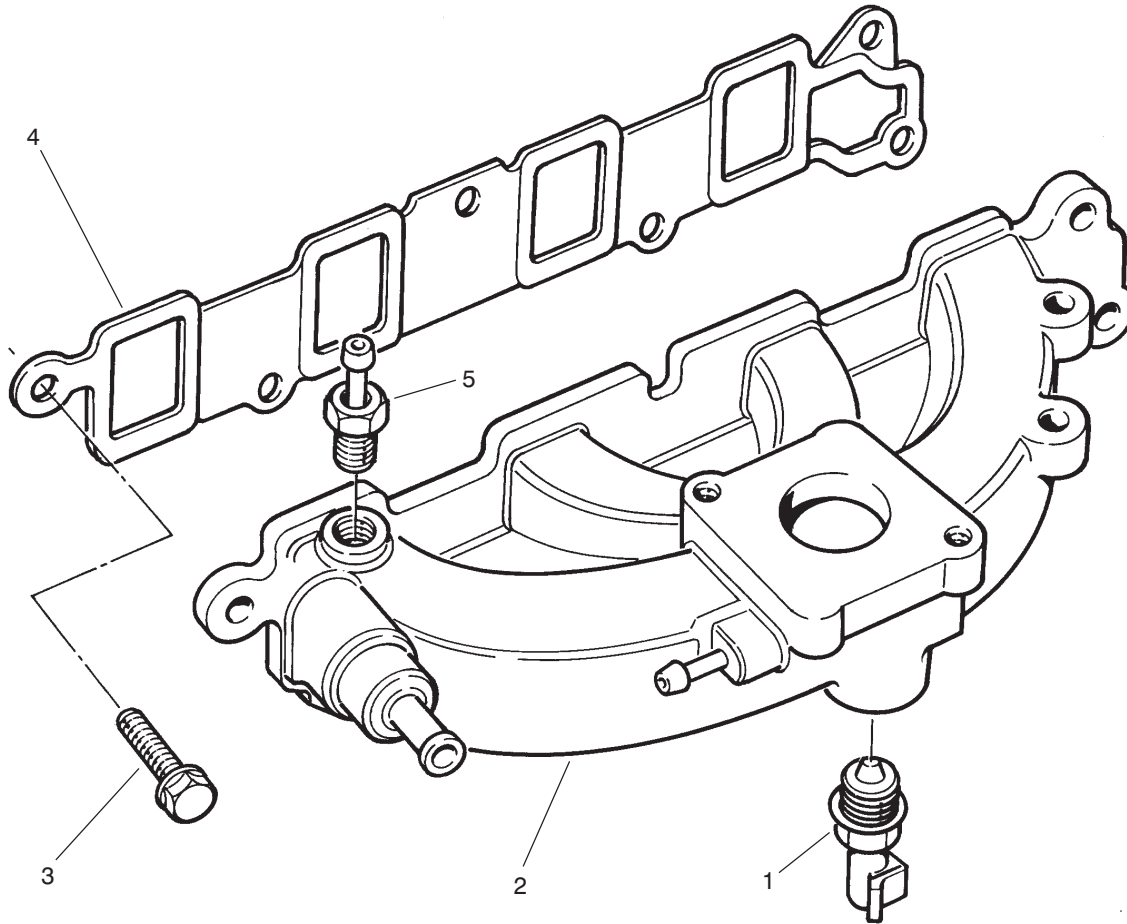
T-1002A

CYLINDER HEAD & VALVE ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
2	89BM-6049-HB	Cylinder Head Assembly	1	21	D8RZ-6026-A	Plug	1
3	89BM-6065-DA	Bolt - Cylinder Head	10	22	F1ZZ-6026-A	Plug	3
4	E630024-S201	Washer - Flat	4	23	D1FZ-6345-A	Bolt - Bearing Cap	10
5	E800516-S72	Screw - Rocker Cover	4	24	E802666-S72	Screw	1
6	84BF-6K614-CA	Cap - Oil Fill	1	25	89BF-66315-AB	Transducer	1
7	E9JL-6K609-AA	Hose - PCV	1	26	353055-S7	Plug	1
8	91BM-6582-GA	Cover - Rocker Arm	1	27	DORY-6026-A	Plug	2
9	77BM-6584-CA	Gasket - Cover	1	28	D8RZ-6020-A	Gasket - Front Cover	1
10	88WM-6518-AA	Lock Valve Spring	16	29	83BM-6700-A4A	Seal - Front Cover	1
11	89BM-6A536-AA	Retainer	8	30	E800518-S72	Bolt	1
12	89BM-6513-AA	Spring - Valve	8	31	E600113-S72	Bolt	3
13	88WM-6571-BB	Seal - Valve Stem	8	32	E800512-S72	Bolt	4
14	DORY-6026-A	Plug	1	33	E832108-S71M	Lockwasher	8
15	89BM-6051-B2C	Gasket - Cylinder Head	1	34	89BM-6019-AA	Cover & Seal Assembly (Incl. Ref. #29)	1
16	89BM-6507-AA	Valve - Intake - Std.	4	35	E840126S	Dowel	2
*	89BM-6507-AC	Valve - Intake .040mm O.S.	A/R	36	89BM-6505-EA	Valve - Exhaust .040mm O.S.	A/R
18	E7RZ-9278-A	Switch Oil Pressure	1	*	89BM-6505-CA	Valve - Exhaust Std.	4
19	D8RZ-6767-A	Adapter	1	37	89BM-6057-A2E	Insert - Exhaust Seat	4
20	E890100-S	Plug - Ball - Oil Gallery	1				

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.

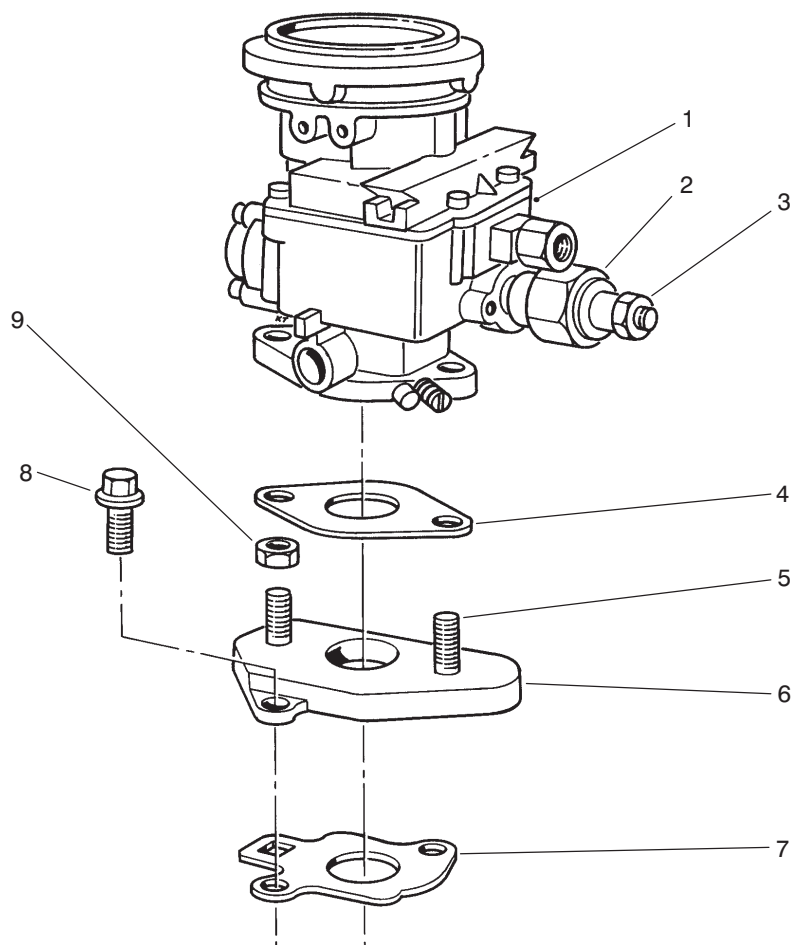


T-1176

MANIFOLD ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	E1AZ-12A648-A	Sensor - Temp. Water	1
2	89BF-9424-AD	Manifold - Intake	1
3	E800157-S72	Bolt	6

Ref. No.	Part No.	Description	No. Used
4	89BM-9441-AB	Gasket - Intake Manifold	1
5	77BF-9K442-AA	Adapter - Vacuum	1



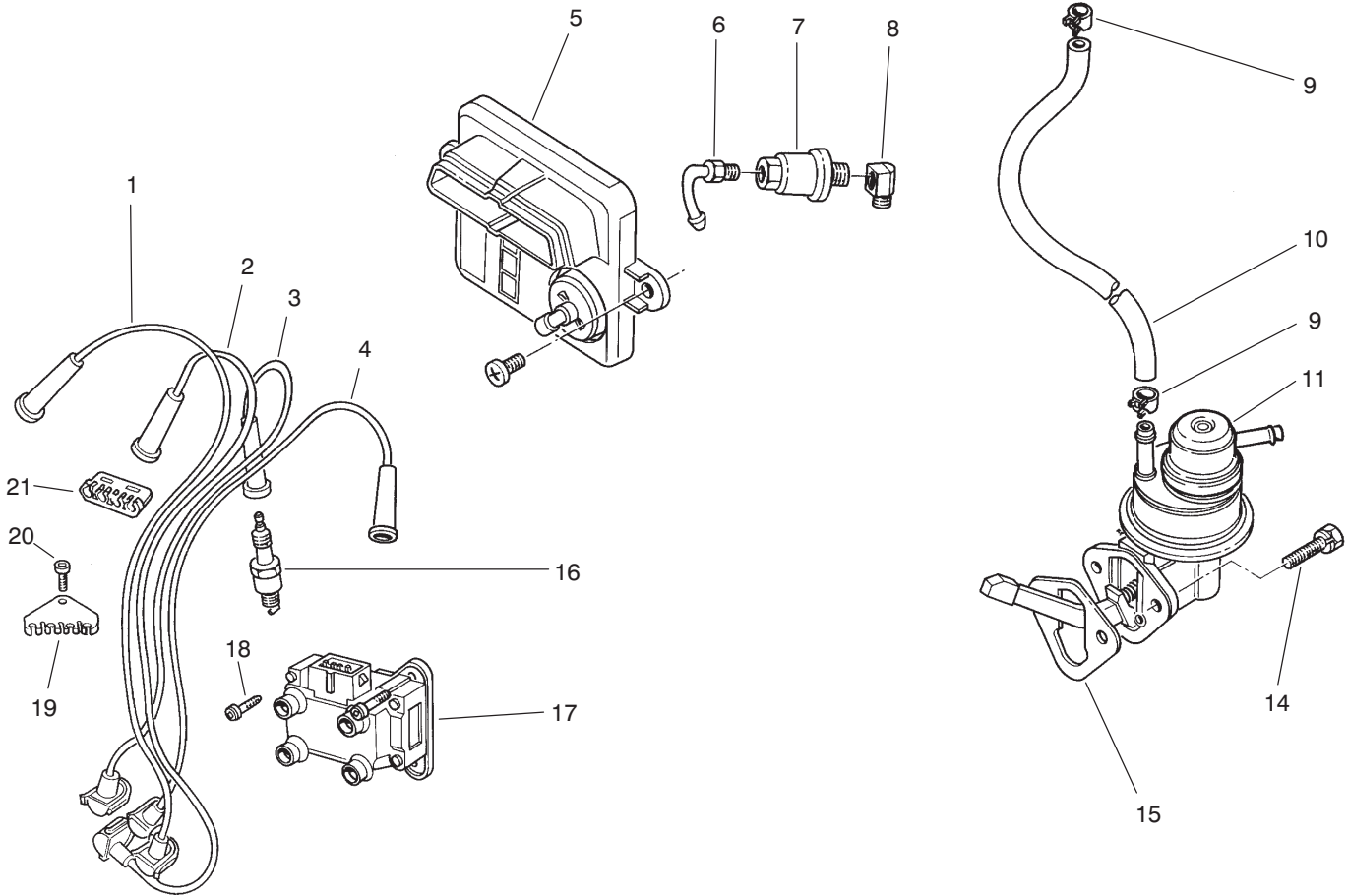
T-0999

CARBURETOR ASSEMBLY

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1	F6JL-9510-MA	Carburetor Assembly	1	6	E8JL-9A589-CB	Adapter	1
2	84FB-9K765-BA	Solenoid	1	7	87BF-9447-BA	Gasket	1
3	N621903-S2	Nut & Washer	1	8	N800055-S	Bolt	2
4	E5JL-9447-BA	Gasket	1	9	N620041-S51	Nut	2
5	E804216S	Stud	2	*		Repair Kit	1

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.



T-1233

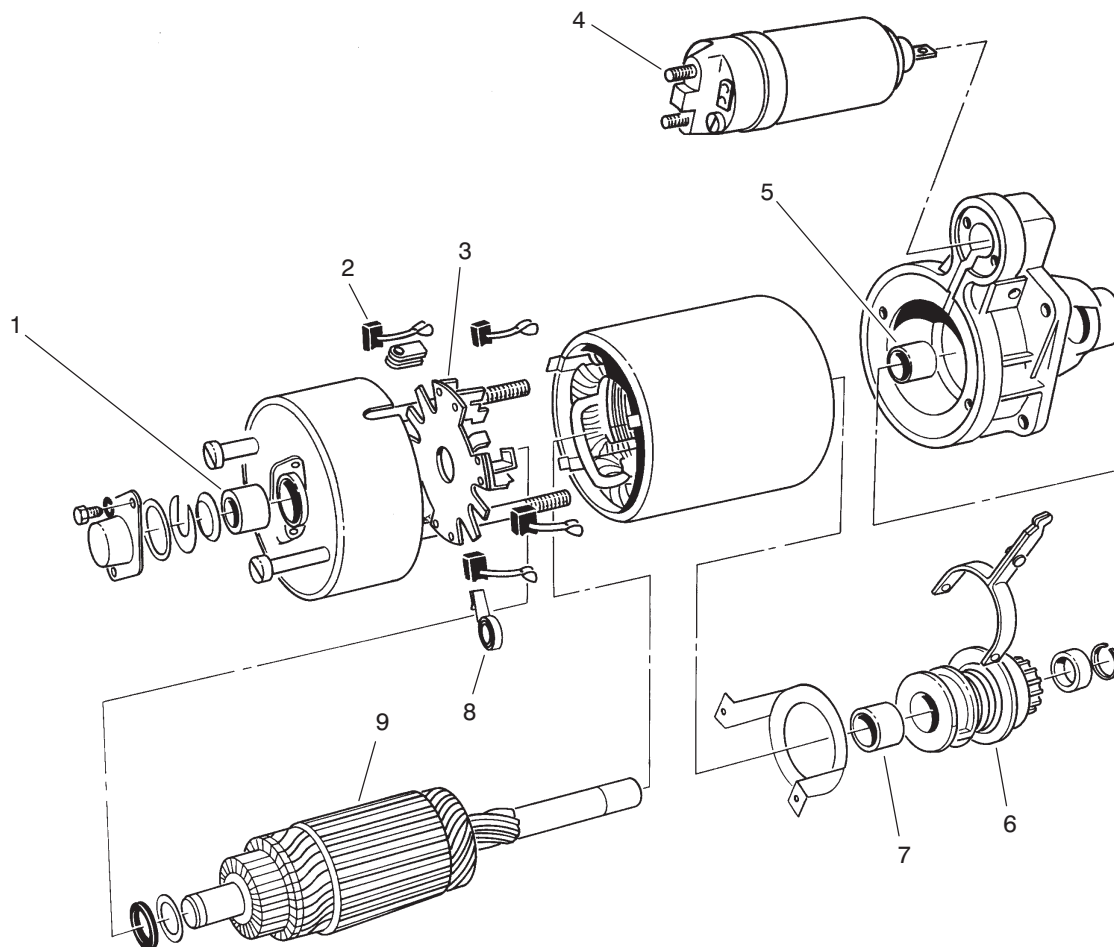
IGNITION & FUEL PUMP ASSEMBLY

Ref. No.	Part No.	Description	No. Used
1	89BF-12287-AC	Wire - Spark Plug #4	1
2	89BF-12284-AD	Wire - Spark Plug #3	1
3	89BF-12283-AD	Wire - Spark Plug #2	1
4	88BF-12286-AD	Wire - Spark Plug #1	1
5	89FB-12A297-GA	Module - Ignition	1
6	D9JI-9A520-A	Adapter	1
7	FG795A	Filter - Fuel (Motorcraft)	1
8	370829-S101	Elbow	1
9	380882-S32	Clamp - Fuel Hose	A/R
10	381103-S180A	Hose - Fuel	1

Ref. No.	Part No.	Description	No. Used
11	83BF-9350-AA	Fuel Pump	1
14	N602551-S2	Screw & Washer	2
15	83BM-9417-A1A	Gasket - Fuel Pump	1
16	AGRF22	Spark Plug	1
	* AGSF22C	(Motorcraft)	4
17	89BF-12024-A1B	Coil & Bracket Assy.	1
18	E804335-S201	Screw	3
19	89BF-12297-AA	Separator - Wire	1
20	E802166-S76	Screw	1
21	E865648-S	Separator - Wire	1

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.



T-1005

STARTER MOTOR ASSEMBLY (91AB11000JB)

Ref. No.	Part No.	Description	No. Used	Ref. No.	Part No.	Description	No. Used
1		Bushing – Brush End	1	6		Drive Assembly	1
2		Brush Set	1	7		Bushing – Starter Drive	1
3		Holder – Brush	1	8		Spring – Brush	4
4		Solenoid	1	9		Kit – Armature Installation	1
5		Bushing – Drive End	1	*		Kit – Wiring, Service	1

*Not Illustrated

Note: Order parts from your local Ford Power Products Dealer.

PRODUCT CHANGES

In an effort to make improvements available to TORO owners as quickly as possible minor changes are incorporated into Toro's products from time to time that do not become immediately shown in the Parts Catalog. If such a change has been made in your unit which is not reflected in your manual see your TORO Distributor or his Authorized TORO Service Dealer for information and part numbers.

IDENTIFICATION AND ORDERING

MODEL AND SERIAL NUMBERS

The Groundsmaster 3000 has two identification numbers; a model number and a serial number. The two numbers are stamped on a plate which is located on the main frame under the seat. In any correspondence concerning the Groundsmaster 3000, supply model and serial numbers to assure that correct information and replacement parts are obtained.

To order replacement parts from an Authorized TORO Service Dealer supply the following information:

1. Model and serial number of the Groundsmaster 3000.
2. Part number description and the quantity of part(s) desired.

NOTE: Do not order by reference number if a parts catalog is being used; use the PART NUMBER.

TABLE OF CONTENTS

Description	Page	Description	Page
Main Frame	1	Radiator & Heat Exchanger Assembly	23
Front Frame & Seat Base Assembly	2	Hood Assembly	24
Steering Assembly	3	Rear Axle Assembly	25
Steering Control Valve Asm. 93-5165	4	Steering Cylinder Assembly No. 93-5502	26
Traction Pedal Assembly	5	Center Shroud & Air Cleaner Asm.	27
Front Axle Assembly	6	Air Cleaner Assembly No. 93-5111	28
Hydraulic Housing Assembly	7-8	Hydraulic Schematic	29
Front Axle Gear Housing Assembly	9	Hydraulic Component Assembly	30
Front Axle Cover Assembly	10	Manifold Assembly No. 93-5115	31
Front Axle Center Section Assembly	11	Drive Shaft Assembly	32
Brake Pedal Assembly	12	Governor Assembly No. 93-5407	33
Control Console Assembly	13	Governor Hardware & Pulley Assembly	34
Operator's Control Console Assembly	14	Crankshaft & Camshaft Assembly	35-37
Electrical Schematic	15	Oil Pump & Filter Assembly	38
Seat Assembly	16	Cylinder Head & Valve Assembly	39
Muffler & Bumper Assembly	17	Manifold Assembly	40
Lift Arm Assembly	18	Carburetor Assembly	41
Hydraulic Cylinder Assembly No. 93-4640	19	Ignition & Fuel Pump Assembly	42
Engine Mount Assembly	20-21	Starter Motor Assembly	43
Fan Bracket & Pulley Assembly	22	Numerical Parts Index	44-50

