

RAMROD



580 SERIES SKID STEER LOADERS

Parts Manual

INTRODUCTION

This manual contains a parts list for your **580 Series Skid Steer Loader**. It is divided into 7 major sections which correspond to the Table of Contents.

The manual does not contain a detailed parts list for the engines as Parts Books are provided by the respective manufacturers.

When replacement parts are needed for such loader components as engines, hydraulic/hydrostatic assemblies, operator's seat, etc., which are manufactured by others, we encourage ordering from their respective dealers.

USING THE MANUAL

ITEM

The item number is the identifying number from the illustration.

PART NUMBER

The part numbers that appear in the part number column, are 6 digit numbers by which the components may be identified and ordered from us.

NSS means Not Sold Separately.

DESCRIPTION

This column contains the name and description of the part. Any part number that appears in this column, is that of our suppliers. They are there to assist you when ordering parts directly from them.

QUANTITY

This column shows the quantity of each part used on that loader component.

NOTE:

The reference to right-hand and left-hand used throughout this Manual refers to the position when seated in the operator's seat, facing forward.

ORDERING PARTS

When ordering parts from us, be sure to state:

- 1) Part Number
- 2) Full Description
- 3) Quantity Required
- 4) Loader Model and Serial Number

REVISIONS AND ADDITIONS

When changes are made to the loader, revised pages will be issued. These pages will bear a more recent date, and are to be inserted in this manual in place of the old one.

TABLE OF CONTENTS

SECTION 1: STRUCTURES

Body	1-1
Roll Over Protective Structure	1-2
Seat, Seat Support and Body Covers	1-3
Lift Arm Assembly - Self Levelling	1-4
Lift Arm Assembly - Non Self Levelling	1-5

SECTION 2: CONTROLS

Steering Control Levers	2-1
Foot Pedals and Linkages	2-2
Parking Brake Assembly	3-3

SECTION 3: ENGINE SYSTEMS

Gas Engine	3-1
Engine Frame Assembly and Throttle Control	3-2
Diesel Engine - Kubota V1902-B	3-4

SECTION 4: DRIVE TRAIN

Hydrostatic Drive Circuit	4-1
Final Drive Assembly	4-2
Transmission Motor	4-3
Hydrostatic Pump R/H	4-4
Hydrostatic Pump L/H	4-5
Wheels and Tires	4-6

SECTION 5: HYDRAULICS

Hydraulic Circuit; Lines and Cylinders	5-1
Hydraulic Circuit; Gear Pump, Cooler and Hose Assemblies	5-2
Hydraulic Gear Pump	5-3
Hydraulic System Filters	5-4
Lift Hydraulic Cylinders	5-5
Tilt Hydraulic Cylinders - Self Levelling	5-6
Tilt Hydraulic Cylinders - Non Self Levelling	5-7
Hydraulic Control Valve	5-8

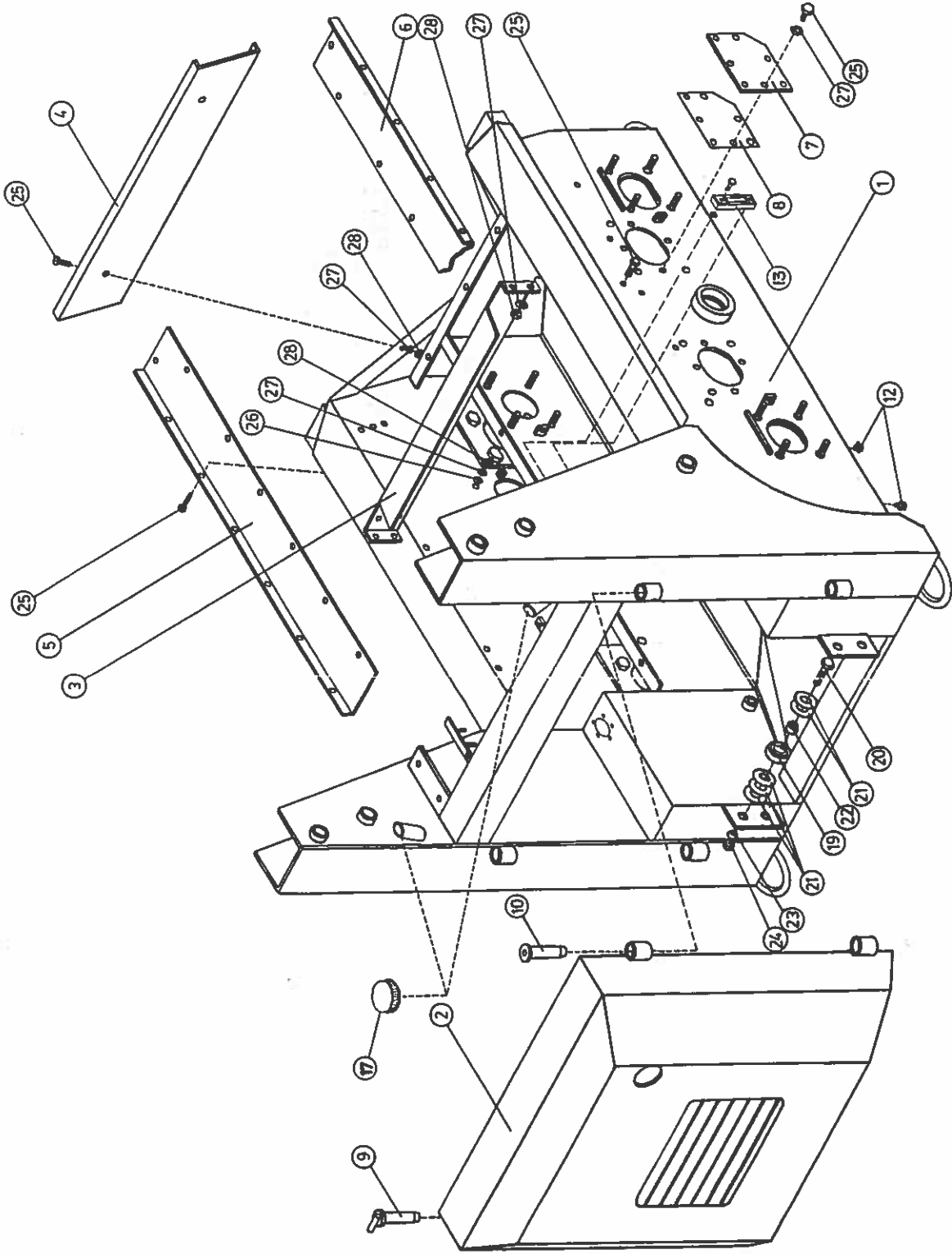
SECTION 6: ELECTRICAL

Gas Engine Electrical Circuit	6-1
Instrument Panel - Gas Engine	6-2
Diesel Engine Electrical Circuit	6-3
Instrument Panel - Diesel Engine	6-4

SECTION 7: DECALS

Decal Location	7-1
----------------------	-----

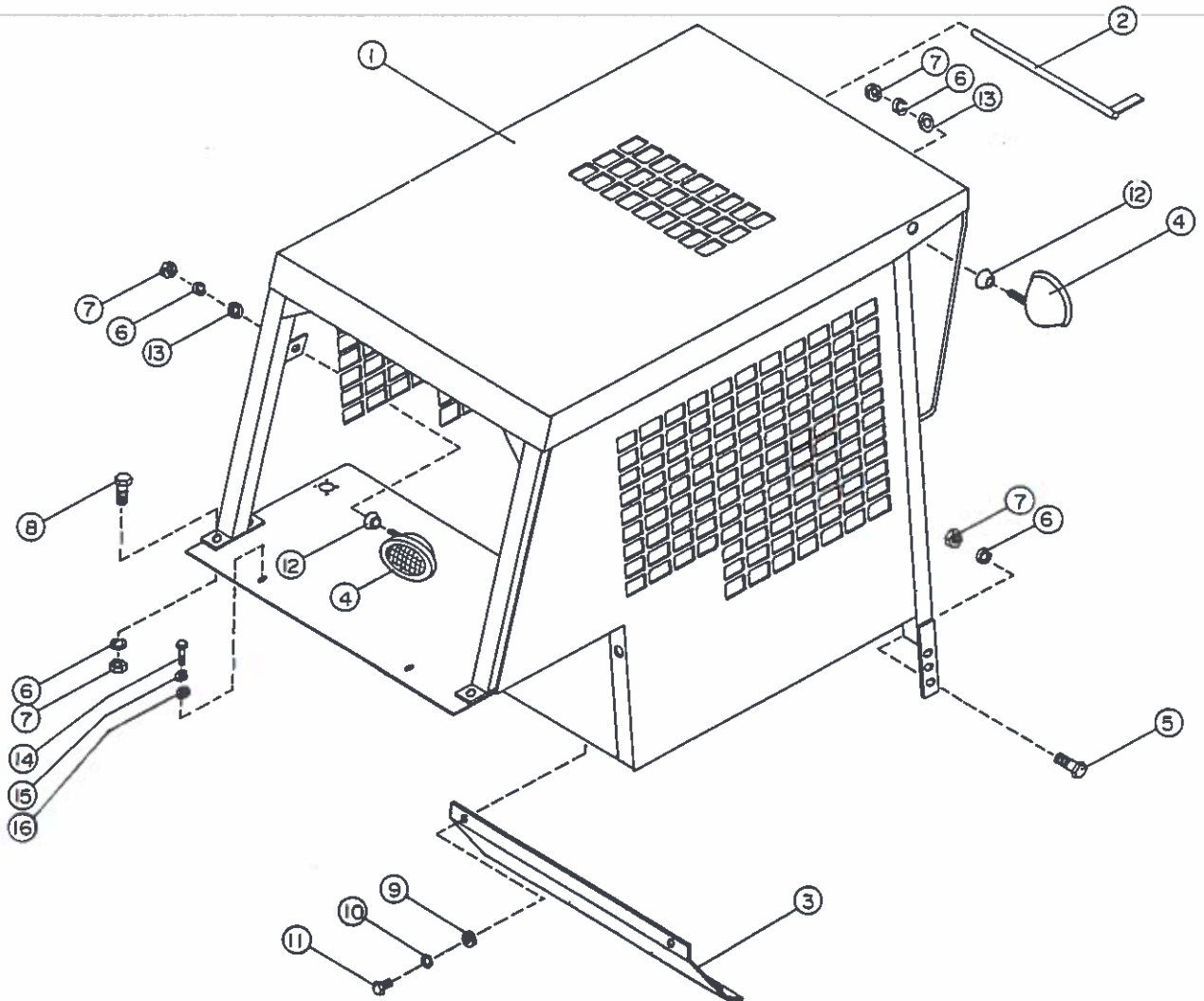
SECTION 1 STRUCTURES



BODY

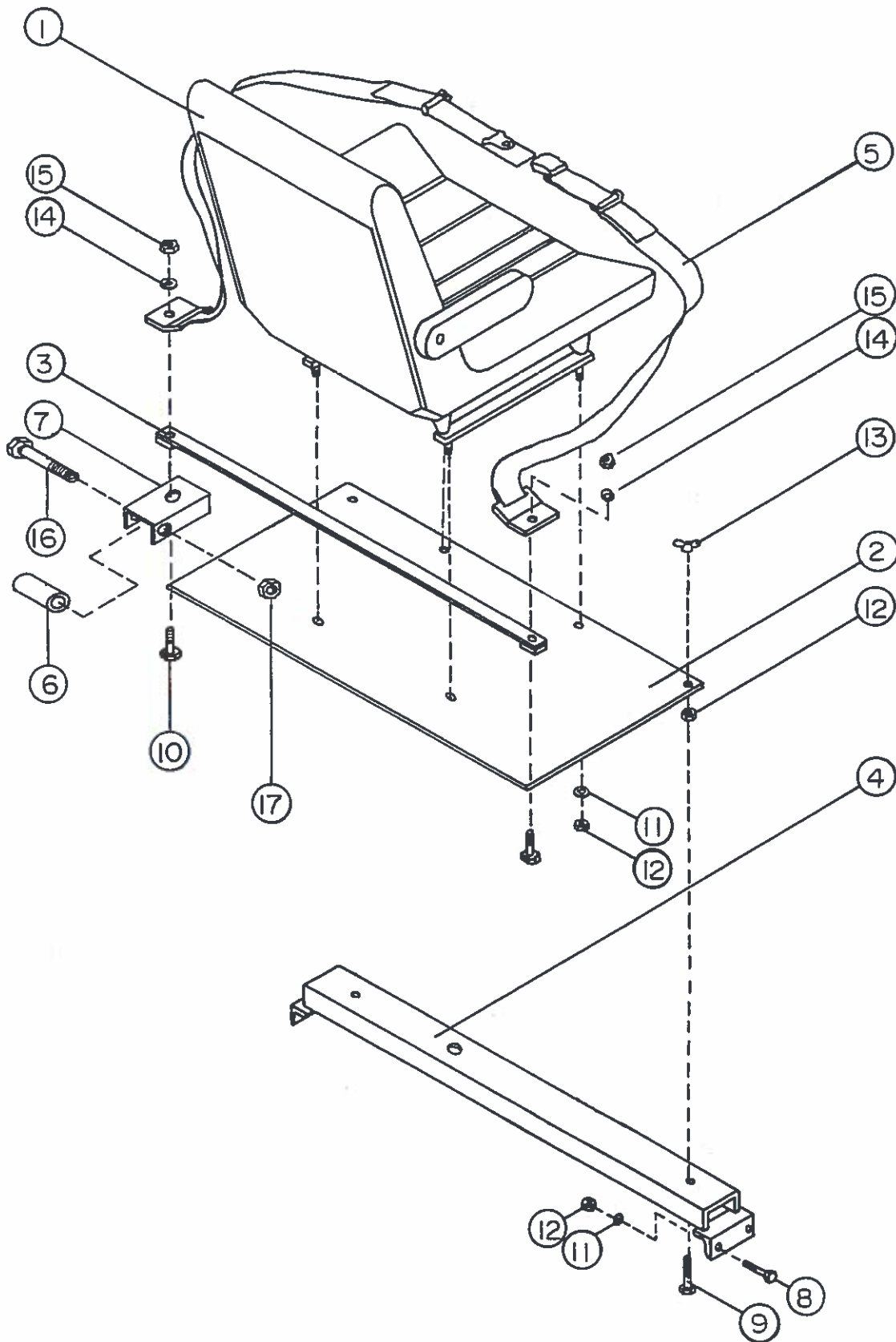
1-1

Item No.	Part No.	Description	Qty.
1	510399	Body	1
2	510377	Rear Door	1
3	510331	Plate, Body Center	1
4	510274	Foot Guard	1
5	510384	Chain Case Cover, Left	1
6	510385	Chain Case Cover, Right	1
7	510392	Cover, Chain Inspection	4
8	155613	Gasket, Inspection Cover	4
9	510247	Pin, Rear Door — Left	2
10	510245	Pin, Rear Door — Right	2
12	122961	Plug, Tank Port	4
13	122982	Sight Glass	1
17	510061	Filler Cap	2
19	115919	Bearing, Ball	4
20	102103	Bolt, Hex. Head — 5/8" x 2 1/2" — UNC	4
21	102613	Flatwasher — 5/8"	20
22	510346	Bushing, Frame Roller	4
23	102594	Lockwasher — 5/8"	4
24	102540	Hex. Nut — 5/8" — UNC	2
25	101950	Bolt, Hex. Head — 5/16" x 1" — UNC	44
26	102608	Flatwasher — 5/16"	30
27	102589	Lockwasher — 5/16"	44
28	102520	Hex. Nut — 5/16" — UNC	18



ROLL OVER PROTECTIVE STRUCTURE

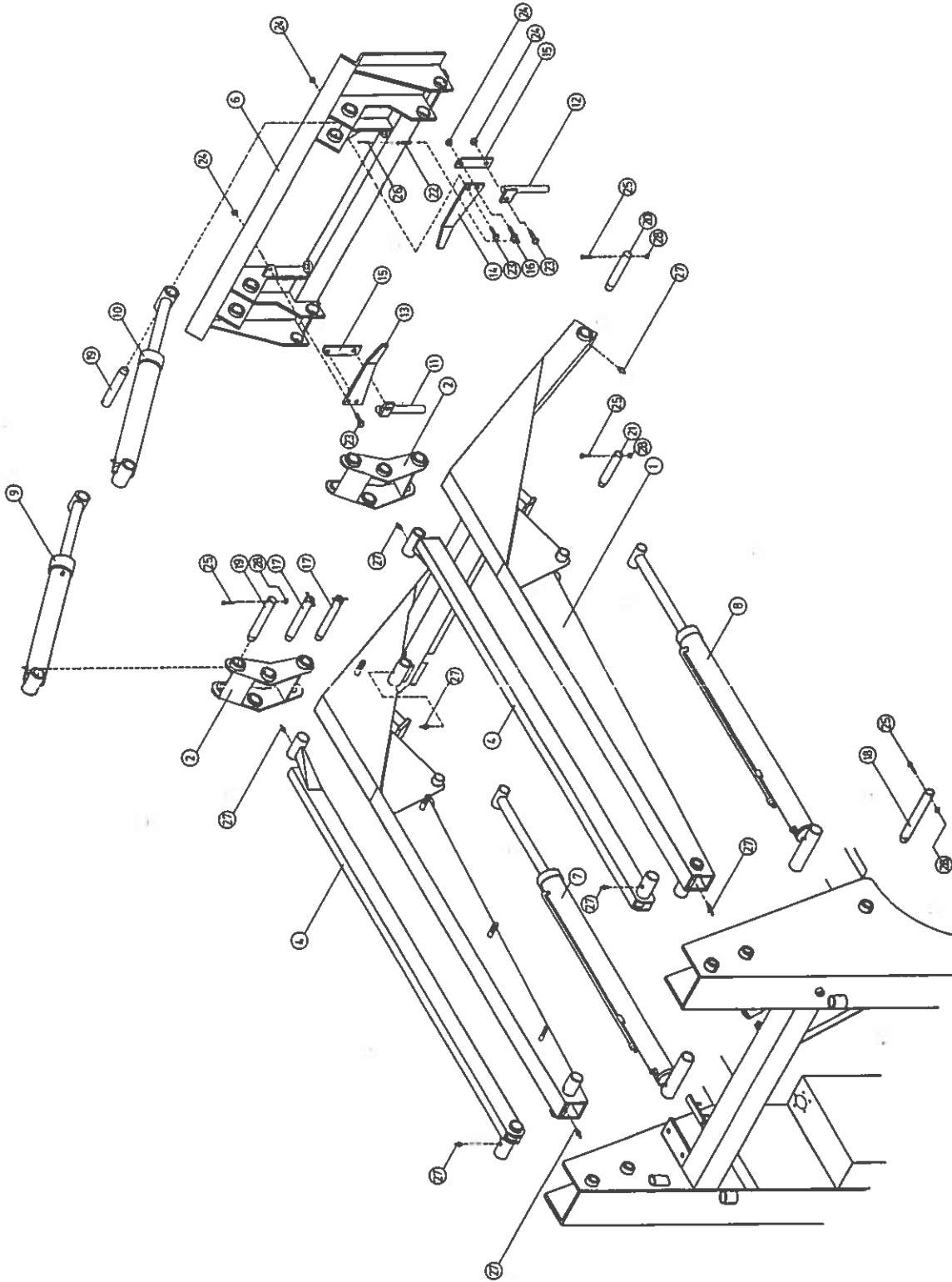
Item No.	Part No.	Description	Qty.
1	512060	Roll Over Protection Structure	1
2	512003	Lock Pin	2
3	510485	Instrument Panel	1
4	179044	Lamp and Housing Kit	3
5	102053	Bolt, Hex. Head — 1/2" UNC x 2" LG.	6
6	102592	Lockwasher — 1/2"	10
7	102535	Hex. Nut — 1/2" UNC	10
8	102052	Bolt, Hex. Head 1/2" UNC x 1 1/2" LG.	4
9	102607	Flatwasher — 1/4"	4
10	102588	Lockwasher — 1/4"	4
11	102923	Bolt, Hex. Head 1/4" UNC x 3/4" LG.	4
12	N.S.S.	Swivel Base	3
13	102642	Flatwasher, Special	3
14	102952	Bolt, Hex. Head — 5/16" x 1 1/2" UNC	2
15	102589	Lockwasher — 5/16"	2
16	102608	Flatwasher — 5/16"	2



SEAT, SEAT SUPPORT AND BODY COVERS

1-3

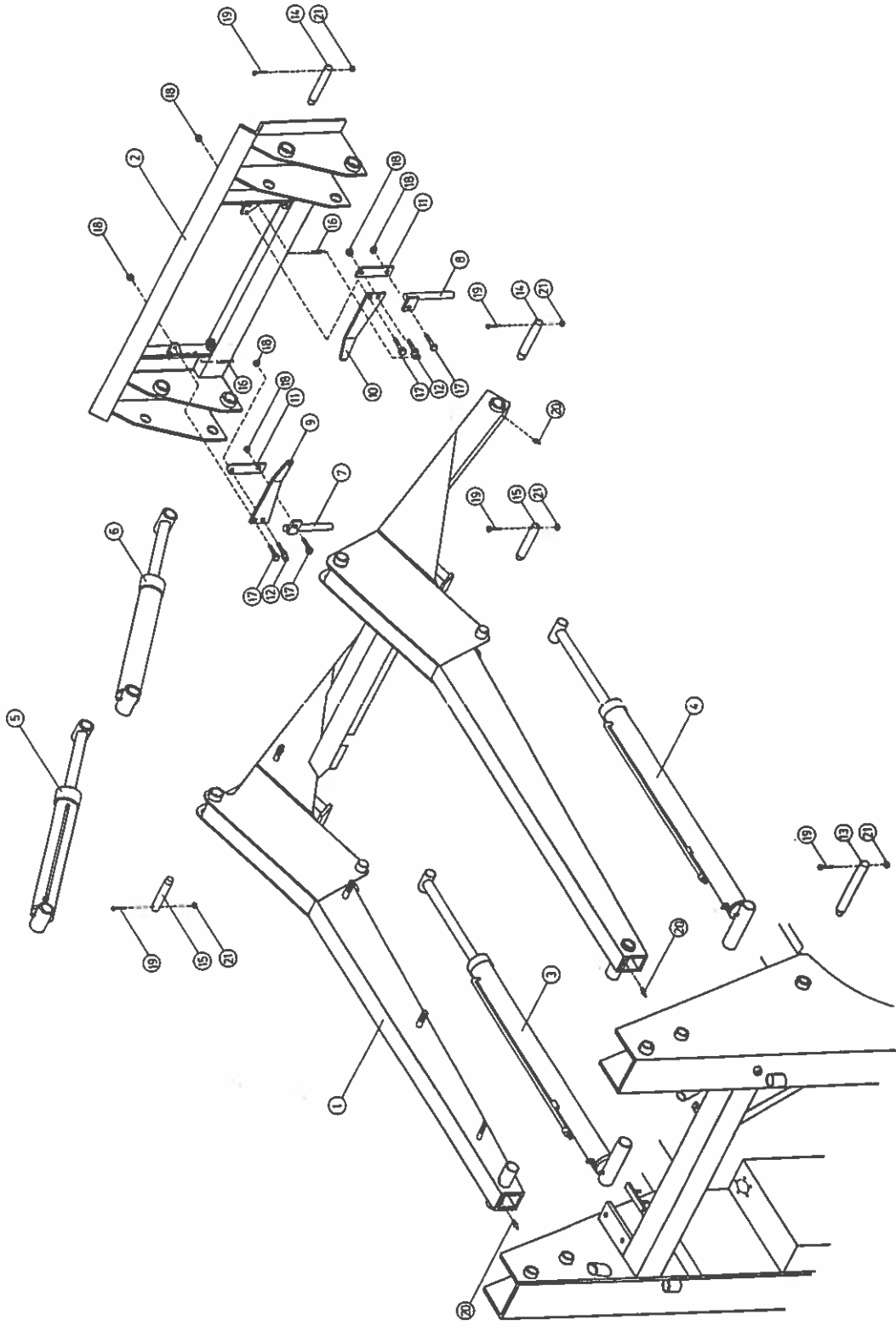
Item No.	Part No.	Description	Qty.
1	179000	Operators Seat (Arm Rests - Optional)	1
2	510273	Plate, Seat	1
3	510270	Clip, Rear Seat	1
4	510069	Cross Channel, Front	1
5	179001	Seat Belt Assembly	1
6	514176	Roller	1
7	514177	Pivot - Brake Cable	1
8	102950	Bolt, Hex. Head - 5/16" x 1" UNC	4
9	102952	Bolt, Hex. Head - 5/16" x 1 1/2" UNC	6
10	102056	Bolt, Hex. Head - 1/2" x 3" UNC	2
11	102589	Lockwasher - 5/16"	12
12	102520	Hex. Nut - 5/16" UNC	14
13	102523	Wing Nut - 5/16" UNC	2
14	102592	Lockwasher - 1/2" \emptyset	2
15	102535	Hex. Nut - 1/2" UNC	2
16	102058	Bolt, Hex. Head 1/2" x 4" LG. - UNC	1
17	102537	Locknut, 1/2" UNC	1



LIFT ARM ASSEMBLY

1-4

Item No.	Part No.	Description	Qty.
1	510170	Lift Arm Frame	4
2	510195	Bellcrank	2
4	510199	Levelling Arm	2
6	510210	Front Mount Frame	1
7	126374	Lift Cylinder, Left (Ram R2 - 25RS - 29.13 L)	1
8	126375	Lift Cylinder, Right (Ram R2 - 25RS - 29.13 R)	1
9	126376	Tilt Cylinder, Left (Ram R2 - 25RS - 14.75 L)	1
10	126377	Tilt Cylinder, Right (Ram R2 - 25RS - 14.75 R)	1
11	510420	Locktooth, Left	1
12	510421	Locktooth, Right	1
13	510234	Lever, Attachment Lock . Left	1
14	510235	Lever, Attachment Lock . Right	1
15	510233	Solid Link, Locktooth	2
16	510236	Lock Spring Bolt	2
17	510206	Pin, Bellcrank	4
18	510325	Pin, Rear Arm and Cylinder Mounting	6
19	510497	Pin, Tilt Cylinder Mounting	4
20	510498	Pin, Front Frame Mounting	2
21	707139	Pin, Front Cylinder Mounting	2
22	105573	Spring, Over Center Lock	2
23	102050	Bolt, Hex. Head - 1-1/2.2" x 1-1/4" - UNC	4
24	102537	Locknut, Hex. - 1/2" - UNC	6
25	101954	Bolt, Hex. Head - 5/16" x 2" - UNC	16
26	102767	Cotter Pin - 5/16" x 2-1/4"	2
27	122788	Grease Nipple - 1/4" - UNF 45°	10
28	102521	Locknut, Hex. - 5/16" - UNC	16

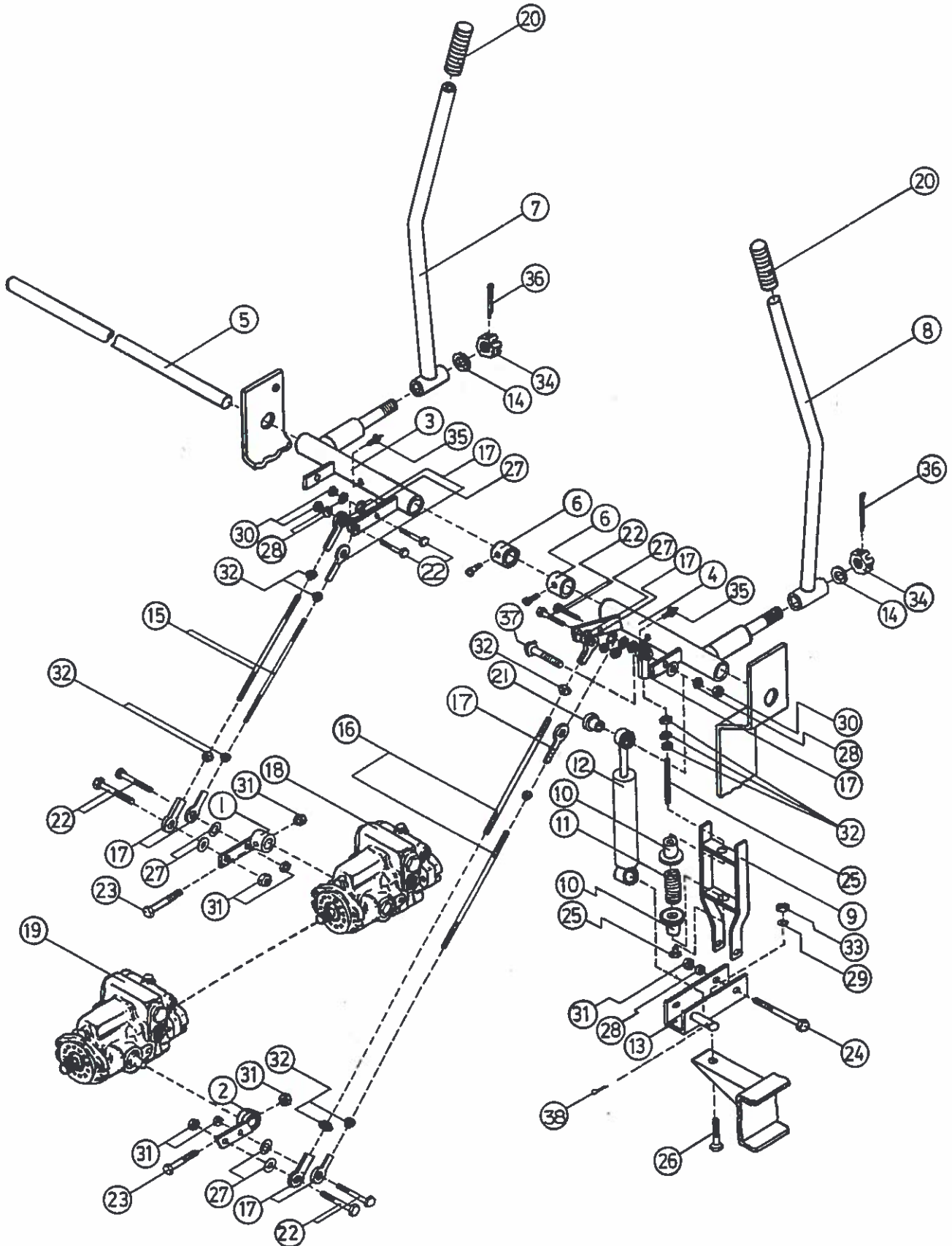


LIFT ARM ASSEMBLY - NON SELF LEVELING

1-5

Item No.	Part No.	Description	Qty.
1	510402	Lift Arm Frame	1
2	510416	Front Mount Frame	1
3	126374	Lift Cylinder, Left (Ram R2 - 25RS - 29.13 L)	1
4	126375	Lift Cylinder, Right (Ram R2 - 25RS - 29.13 R)	1
5	126360	Tilt Cylinder, Left (Ram R2 - 25RS - 18.7 L)	1
6	126361	Tilt Cylinder, Right (Ram R2 - 25RS - 18.7 R)	1
7	510420	Locktooth, Left	1
8	510421	Locktooth, Right	1
9	510234	Lever, Attachment Lock - Left	1
10	510235	Lever, Attachment Lock - Right	1
11	510233	Solid Link, Locktooth	2
12	510236	Lock Spring Bolt	2
13	510325	Pin, Rear Arm and Cylinder Mounting	4
14	510497	Pin, Front Mount Frame	4
15	707139	Pin, Tilt Cylinder Barrel and Front Lift Cylinder Mount	4
16	105573	Spring, Over Centre Lock	2
17	102050	Bolt, Hex. Head - 1/2" x 1-1/4" - UNC	4
18	102537	Locknut, Hex. - 1/2" - UNC	6
19	101954	Bolt, Hex. Head - 5/16" x 2" - UNC	12
20	122788	Grease Nipple - 1/4" - UNF 45 °)	4
21	102521	Locknut, Hex. - 5/16" - UNC	12

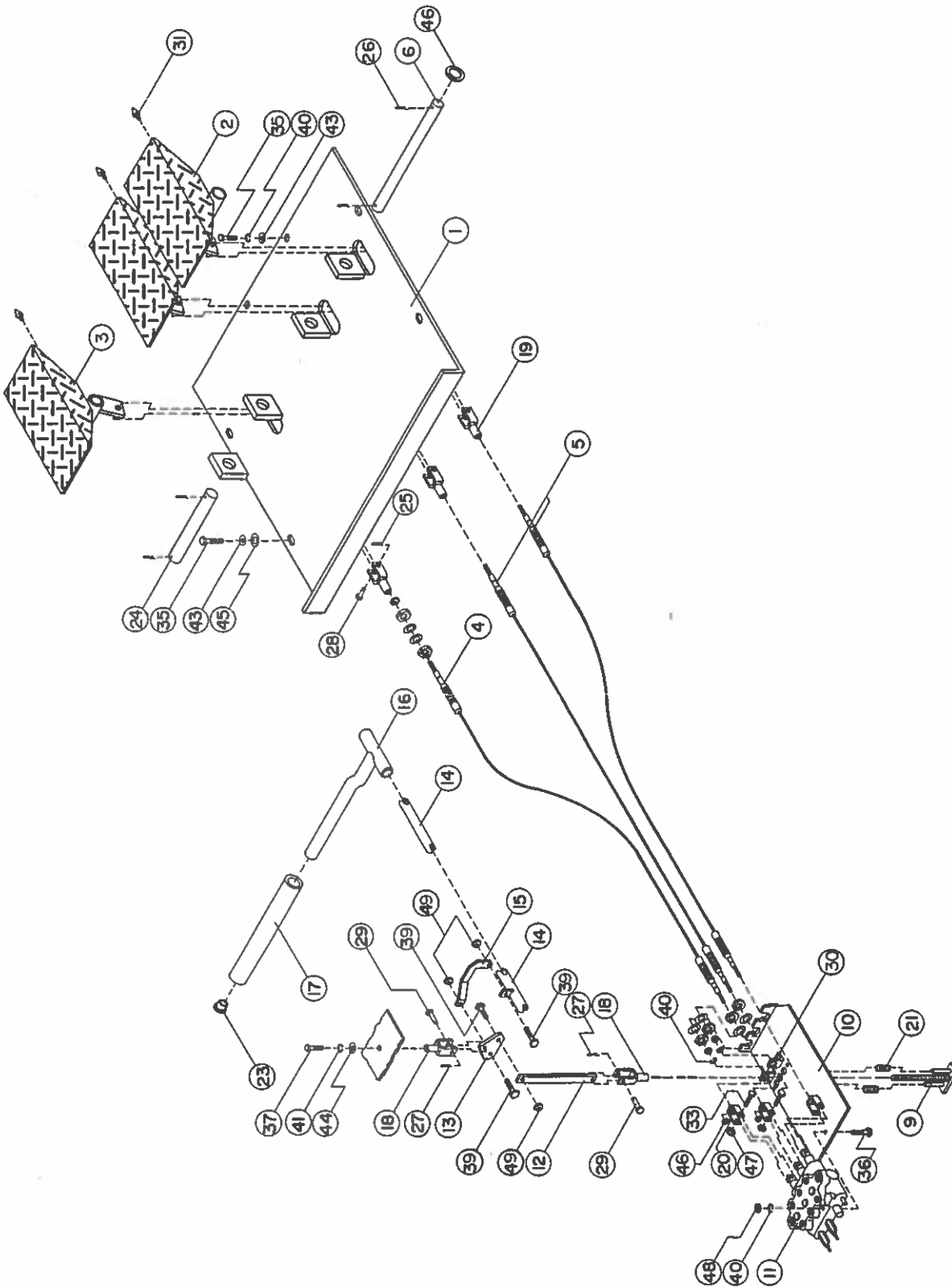
SECTION 2 CONTROLS



STEERING CONTROL LEVERS

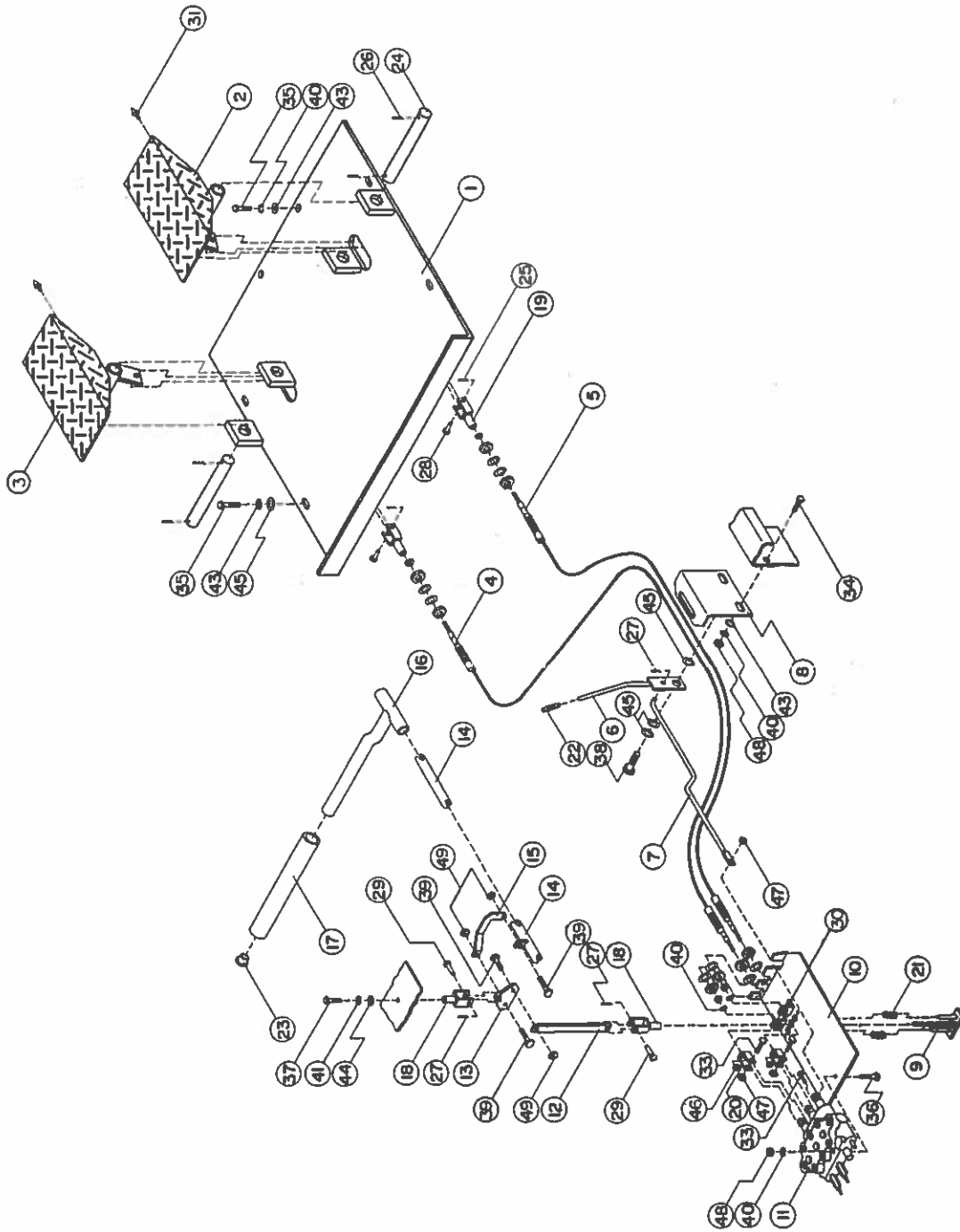
2-1

Item No.	Part No.	Description	Qty.
1	510452	Pump Lever, Left.....	1
2	510455	Pump Lever, Right.....	1
3	510456	Lever Cluster, Left.....	1
4	510462	Lever Cluster, Right.....	1
5	510463	Controls Shaft.....	1
6	510379	Collar c/w Set Screws.....	2
7	510581	Control Handle, Left.....	1
8	510580	Control Handle, Right.....	1
9	510470	Frame, Neutral Control.....	2
10	510473	Piston, Neutral Control.....	4
11	105574	Spring, Centering.....	2
12	179002	Shock Absorber, Cylinder.....	2
13	510475	Base, Controls.....	2
14	102598	Lockwasher - 7/8" Ø.....	2
15	510480	Pump Rod, Left.....	2
16	510478	Pump Rod, Right.....	2
17	115866	Ball Joint, Rod End - (Female - 3/8" Dia. - 24 UNF).....	10
18	117008	Hydrostatic Pump, Left Side Drive.....	1
19	117007	Hydrostatic Pump, Right Side Drive.....	1
20	153350	Handle Grip - (Rubber).....	2
21	512056	Bushing, Shock Absorber.....	2
22	102002	Bolt, Hex Head - (3/8" - 16 UNC x 1-1/2" Lg.).....	8
23	102003	Bolt, Hex Head - (3/8" - 16 UNC x 2" Lg.).....	2
24	102005	Bolt, Hex Head - (3/8" - 16 UNC x 3" Lg.).....	2
25	102019	Bolt, Hex Head - (3/8" - 24 UNF x 6" Lg.).....	2
26	102050	Bolt, Hex Head - (1/2" - 13 UNC x 1-1/4" Lg.).....	2
27	102609	Flatwasher - (3/8").....	10
28	102590	Lockwasher - (3/8").....	8
29	102592	Lockwasher - (1/2").....	2
30	102525	Hex Nut - (3/8" - 16 UNC).....	6
31	102536	Locknut, Hex - (3/8" - 16 UNC).....	10
32	102528	Jam Nut, Hex - (3/8" - 24 UNF).....	14
33	102535	Hex Nut - (1/2" - 13 UNC).....	2
34	102558	Slotted Nut, Hex - (7/8" - 14 UNF).....	2
35	122788	Grease Nipple - (1/4" - 28 UNF - 45 Degrees).....	2
36	102760	Cotter Pin - (3/16" Dia. - 1-1/2" Lg.).....	2
37	102006	Bolt, Hex. Head - (3/8" - 16 UNC x 3 1/2" LG.).....	2
38	102760	Cotter Pin, 3/16" x 1 1/2" LG.	2



FOOT PEDALS AND LINKAGES

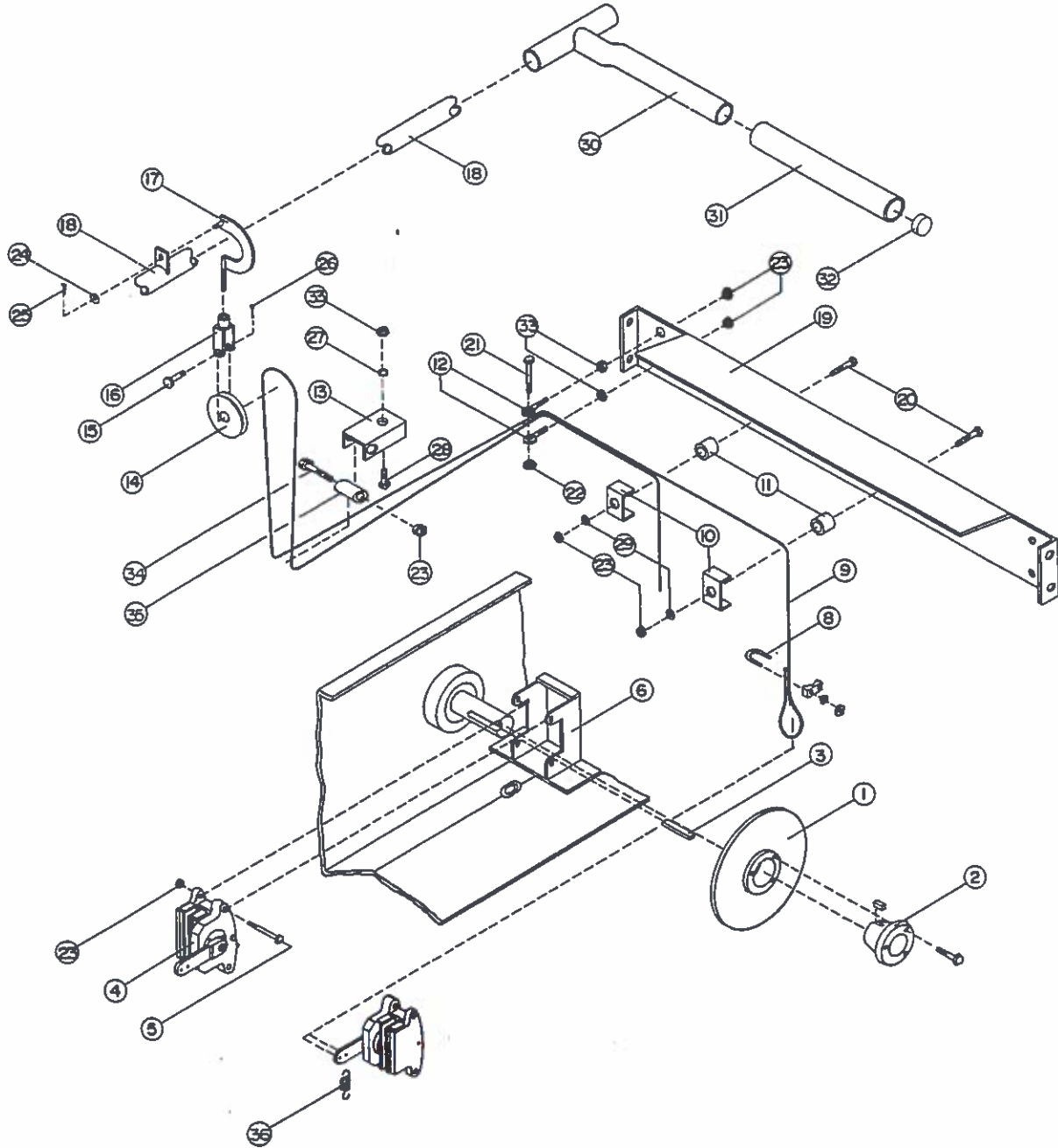
Item No.	Part No.	Description	Qty.
1	510251	Foot Plate	1
2	510640	Pedal Right	2
3	510639	Pedal Left	1
4	127263	Left Control Cable	1
5	127262	Right Control Cable	2
6	510257	Shaft, Pedal	1
9	514170	Valve Lock	1
10	512000	Valve Mt. Plate	1
11	127121	Control Valve	1
12	514160	Hydraulic Lock Arm	1
13	514161	Pivot Plate	1
14	514175	Pivot Pipe	2
15	514167	Over Center Arm	1
16	514181	Operator Handle	2
17	151211	Operator Handle Cover	2
18	115856	Clevis Yoke c/w Clevis Pin and Cotter Pin	2
19	127264	Clevis	3
20	127259	Clevis (Control Valve)	3
21	105576	Spring, Compression	2
23	151110	Cap	2
24	510256	Shaft, Pedal	1
25	102757	Cotter Pin — 1/16" x 3/4" LG.	3
26	102760	Cotter Pin — 3/16" x 1 1/2"	4
27	102764	Cotter Pin — 1/8" x 1"	2
28	115858	Clevis Pin — 1/4" x 3/4" LG.	3
29	115857	Clevis Pin — 3/8" x 1" LG.	2
30	519163	Antirotation Angles	2
31	122787	Grease Nipple	3
33	101924	Bolt, Hex. Head — 1/4" x 1 1/4"	3
35	101951	Bolt, Hex. Head — 5/16" x 1 1/4" UNC	6
36	101954	Bolt, Hex. Head — 5/16" x 2" UNC	2
37	101995	Bolt, Hex. Head — 3/8" x 1" UNF	1
39	102001	Bolt, Hex. Head — 3/8" x 1" UNC	3
40	102589	Lockwasher — 5/16" Ø	6
41	102590	Lockwasher — 3/8" Ø	1
42			
43	102608	Flatwasher — 5/16" Ø	6
44	102609	Flatwasher — 3/8" Ø	1
45	102611	Flatwasher — 1/2" Ø	4
46	102522	Jam Nut — 5/16" UNF	3
47	102516	Locknut — 1/4" UNC	3
48	102520	Hex. Nut — 5/16" UNC	2
49	102526	Locknut — 3/8" UNC	3



FOOT PEDALS AND LINKAGES

2-2A

Item No.	Part No.	Description	Qty.
1	510176	Foot Plate	1
2	510640	Pedal Right	1
3	510639	Pedal Left	1
4	127263	Left Control Cable	1
5	127262	Right Control Cable	1
6	512033	Auxiliary Handle	1
7	512034	Auxiliary Push Rod	1
8	512030	Auxiliary Hand Lever Plate	1
9	514170	Valve Lock	1
10	512000	Valve Mount Plate	1
11	127121	Control Valve	1
12	514160	Hydraulic Lock Arm	1
13	514161	Pivot Plate	1
14	514175	Pivot Pipe	2
15	514167	Over Center Arm	1
16	514181	Operator Handle	2
17	151211	Operator Handle Cover	2
18	115856	Clevis Yoke c/w Clevis Pin and Cotter Pin	2
19	127264	Clevis	2
20	127259	Clevis (Control Valve)	2
21	105576	Spring, Compression	2
22	151208	Rubber Grip	1
23	151110	Cap	2
24	510256	Shaft, Pedal	2
25	102757	Cotter Pin — 1/16" x 3/4" LG.	2
26	102760	Cotter Pin — 3/16" x 1 1/2"	4
27	102764	Cotter Pin — 1/8" x 1"	3
28	115858	Clevis Pin — 1/4" x 3/4" LG.	2
29	115857	Clevis Pin — 3/8" x 1" LG.	2
30	514163	Antirotation Angles	2
31	122787	Grease Nipple	2
32			
33	101924	Bolt, Hex. Head — 1/4" x 1 1/4"	2
35	101951	Bolt, Hex. Head — 5/16" x 1 1/4" UNC	6
36	101954	Bolt, Hex. Head — 5/16" x 2" UNC	2
37	101995	Bolt, Hex. Head — 3/8" x 1" UNF	1
38	102051	Bolt, Hex. Head — 1/2" x 1 1/2"	1
39	102001	Bolt, Hex. Head — 3/8" x 1" UNC	3
40	102589	Lockwasher — 5/16" \emptyset	6
41	102590	Lockwasher — 3/8" \emptyset	1
42			
43	102608	Flatwasher — 5/16" \emptyset	8
44	102609	Flatwasher — 3/8" \emptyset	1
45	102611	Flatwasher — 1/2" \emptyset	5
46	102522	Jam Nut — 5/16" UNF	2
47	102516	Locknut — 1/4" UNC	3
48	102520	Hex. Nut — 5/16" UNC	4
49	102526	Locknut — 3/8" UNC	3

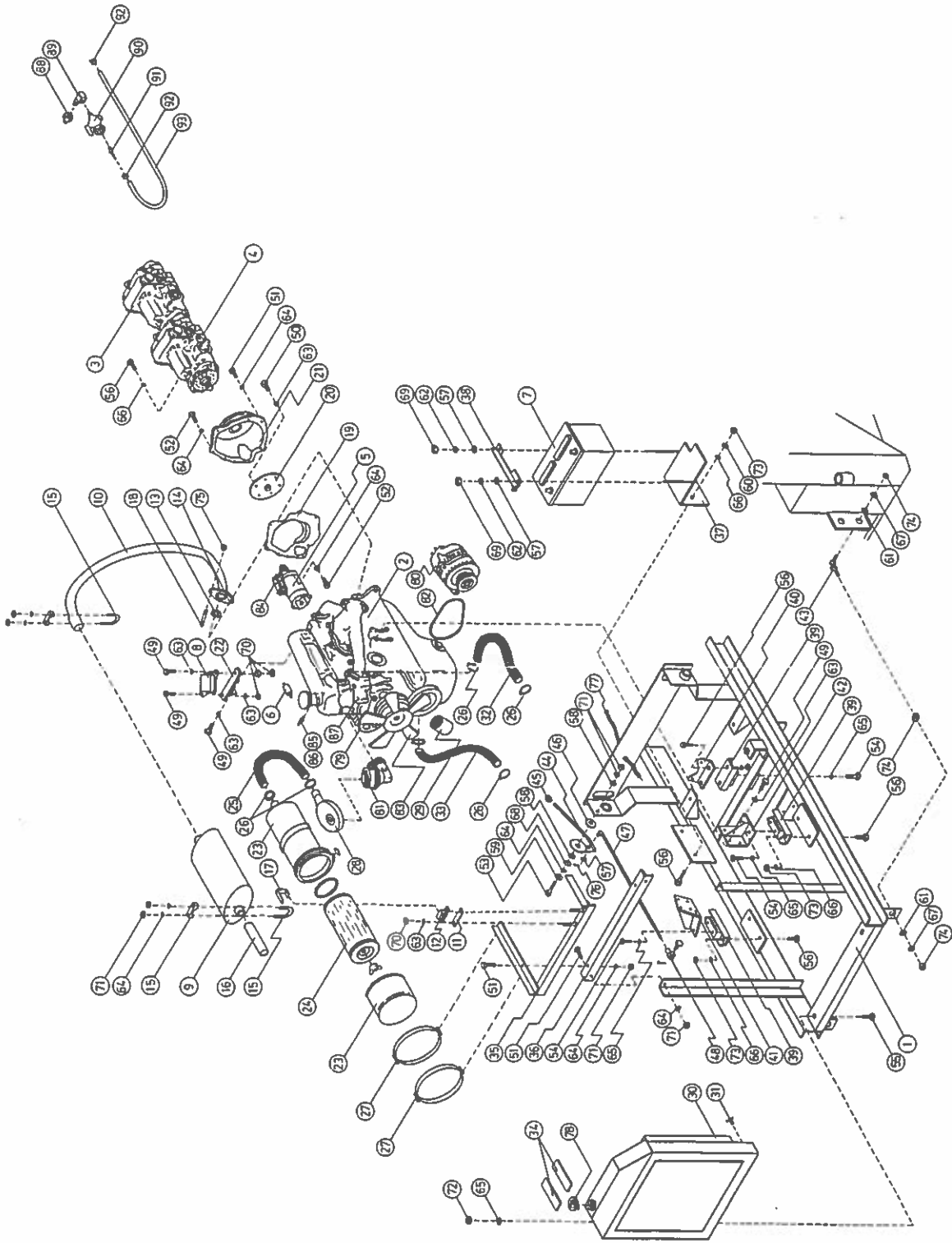


PARKING BRAKE ASSEMBLY

Item No.	Part No.	Description	Qty.
1	141036	Disc Brake	2
2	115922	Bushing, Split Tapered c/w Cap Screws and Key	2
3	510120	Key, Disc Hub	2
4	115927	Caliper Kit	2
5	102059	Bolt, Hex. Head — 1/2" UNC x 4 1/2" LG.	4
6	512053	Disc Brake Mount	2
7			
8	102415	Clamp — 1/4" Dia. Cable	2
9	127265	Cable, Brake — 1/4" Dia. x 120" LG.	1
10	520150	Brake Cable Guide Clamp	2
11	520151	Roller, Brake Cable	2
12	102403	Eye Bolt — 1/2" ϕ x 2" LG.	2
13	514177	Pivot, Brake Cable	1
14	514189	Brake Pulley	1
15	115857	Clevis Pin	
16	115856	Clevis Yoke c/w Clevis Pin and Cotter Pin	1
17	514187	Brake Link	1
18	514175	Pivot Pipe, Left Hand	1
19	510331	Center Plate	1
20	102053	Bolt, Hex. Head — 1/2" UNC x 2" LG.	2
21	102059	Bolt, Hex. Head — 5/8" UNC x 2 1/2" LG.	1
22	102540	Hex. Nut — 5/8" UNC	1
23	102537	Locknut — 1/2" UNC	9
24	102609	Flatwasher — 3/8" ϕ	1
25	102781	Hairpin Cotter — 1/8" ϕ	1
26	102760	Cotter Pin — 1/8" x 1"	1
27	102592	Lockwasher — 1/2" ϕ	1
28	102056	Bolt, Hex. Head — 1/2" UNC x 3"	1
29	102611	Flatwasher — 1/2" ϕ	2
30	514181	Operator Handle	2
31	151211	Operator Handle Cover	2
32	151110	Cap	2
33	102535	Hex. Nut — 1/2" UNC	3
34	102058	Bolt, Hex. Head — 1/2" x 4" LG. — UNC	1
35	514176	Roller	1
36	105573	Spring	1

SECTION 3

ENGINE SYSTEMS

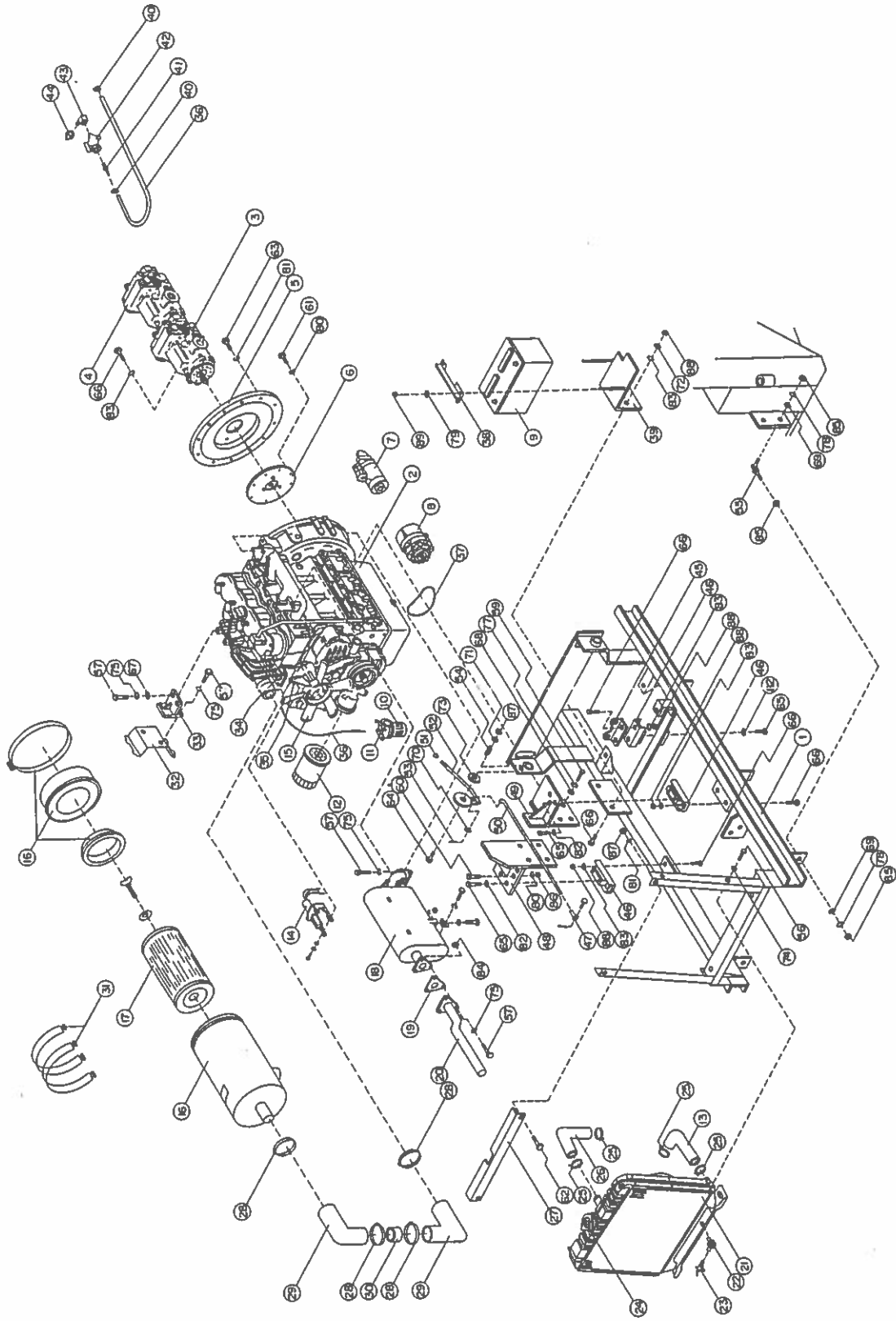


GAS ENGINE

Item No.	Part No.	Description	Qty.
1	511001	Engine Frame	1
2	117091	Engine	1
3	117008	Hydrostatic Pump, Left Side Drive	1
4	117007	Hydrostatic Pump, Right Side Drive	1
5		Starter	1
6		Fuel Filter	1
7	179006	Battery, 12 Volt	1
8		Regulator, Voltage	1
9		Muffler	1
10		Pipe, Exhaust	1
11		Strap, Muffler Support	1
12		Support, Muffler	1
13		Collar, Exhaust	1
14		Flange, Exhaust Pipe	1
15	102427	Clamp, Muffler - (2-1/4" U-Clamp Assembly)	2
16		Pipe, Tail	1
17		Bracket, Muffler Support	1
18	107445	Studs - (M10 - 1.5 x 50)	2
19		Engine Plate, Rear	1
20	115129	Disc Adaptor, Pump Drive	1
21		Housing, F/W Pump Adaptor	1
22		Bracket, Regulator Mount	1
23	117016	Housing, Air Cleaner (c/w Element)	1
24	117047	Filter, Air	1
25		Hose, Air Cleaner to Air Horn	1
26	123296	Clamp, Air Hose and Radiator Hose	6
27	123305	Clamp (Worm Gear)	4
28		Air Horn	1
29		Oil Filter (Motorcraft FL-13)	1
30		Radiator, Engine	1
31	117015	Drain Cock, Radiator	1
32		Radiator Hose, Upper	1
33		Radiator Hose, Lower	1
34		Strap, Rubber Isolator	2
35		Retainer, Radiator	1
36		Bracket, Radiator Support	1
37	510443	Plate, Battery Carrier	1
38	510486	Strap, Battery Hold Down	1
39	117010	Mount, Engine Isolator	3
40	510482	Bracket, Pump Mount	1
41		Bracket, Engine Mount - Left	1
42		Bracket, Engine Mount - Right	1
43	510483	Lock Bolt, Engine Retainer	2
44	510447	Handle, Throttle	1
45	117028	Knob, Throttle	1
46	153352	Fibrewasher	1
47	511058	Rod, Throttle	1
48	115854	Clevis Yoke - (c/w Pin and Cotter Pin)	1
49	101950	Bolt, Hex Head - (5/16" - 18 UNC x 1" Lg.)	11
50	101959	Bolt, Hex Head - (5/16" x 18 UNC x 3/4" Lg.)	6

GAS ENGINE

Item No.	Part No.	Description	Qty.
51	102001	Bolt, Hex Head - (3/8" - 16 UNC x 1" Lg.)	6
52	102002	Bolt, Hex Head - (3/8" - 16 UNC x 1-1/2" Lg.)	9
53	102017	Bolt, Hex Head - (3/8" - 16 UNC x 2-1/4" Lg.)	1
54	102022	Bolt, Hex Head - (7/16" - 14 UNC x 1" Lg.)	6
55	102040	Bolt, Machine Square Neck - (7/16" - 14 UNC x 1" Lg.)	2
56	102050	Bolt, Hex Head - (1/2" - 13 UNC x 1-1/4" Lg.)	10
57	102607	Flatwasher - (1/4" Dia.)	3
58	102609	Flatwasher - (3/8" Dia.)	2
59	102641	Flatwasher - (3/8" Dia. - Extra Heavy)	1
60	102611	Flatwasher - (1/2" Dia.)	2
61	107023	Flatwasher - (16 mm Dia.)	4
62	102588	Lockwasher - (1/4")	2
63	102589	Lockwasher - (5/16")	19
64	102590	Lockwasher - (3/8")	20
65	102591	Lockwasher - (7/16")	8
66	102592	Lockwasher - (1/2")	10
67	107073	Lockwasher - (16 mm)	4
68	102603	Lockwasher - (11/16" - Extra Heavy)	1
69	102527	Hex Nut - (1/4" - 28 UNC)	2
70	102520	Hex Nut - (5/16" - 18 UNC)	5
71	102525	Hex Nut - (3/8" - 16 UNC)	10
72	102530	Hex Nut - (7/16" - 14 UNC)	2
73	102535	Hex Nut - (1/2" - 13 UNC)	8
74	107123	Hex Nut - (M16 - 2.0)	6
75	107155	Locknut - (M10 - 1.5)	2
76	102758	Cotter Pin - (3/32" Dia. x 3/4" Lg.)	1
77	117024	Choke Cable Kit - (Push - Pull)	1
78		Radiator Cap	1
79		Governor	1
80		Alternator	1
81		Carburator	1
82		Fan Belt Alternator	1
83		Cooling Fan, Pusher	1
84	115946	Solenoid, Starter	1
85		Spark Plug (AGR 22 - HC)	4
86		Spark Plug - (Optional) (AGR 32 - LC)	4
87	115948	Thermostat	1
88	122901	Bushing, Pipe - (3/4" - 1/4" NPT)	1
89	124703	Elbow, Street - (1/4" NPT)	1
90	124711	Valve, Fuel Shutoff	1
91	124712	Coupler - (NPTF to Hose)	1
92	123184	Clamps, Hose - (1/2" Adjustable)	2
93	153351	Fuel Line Hose, Rubber	1



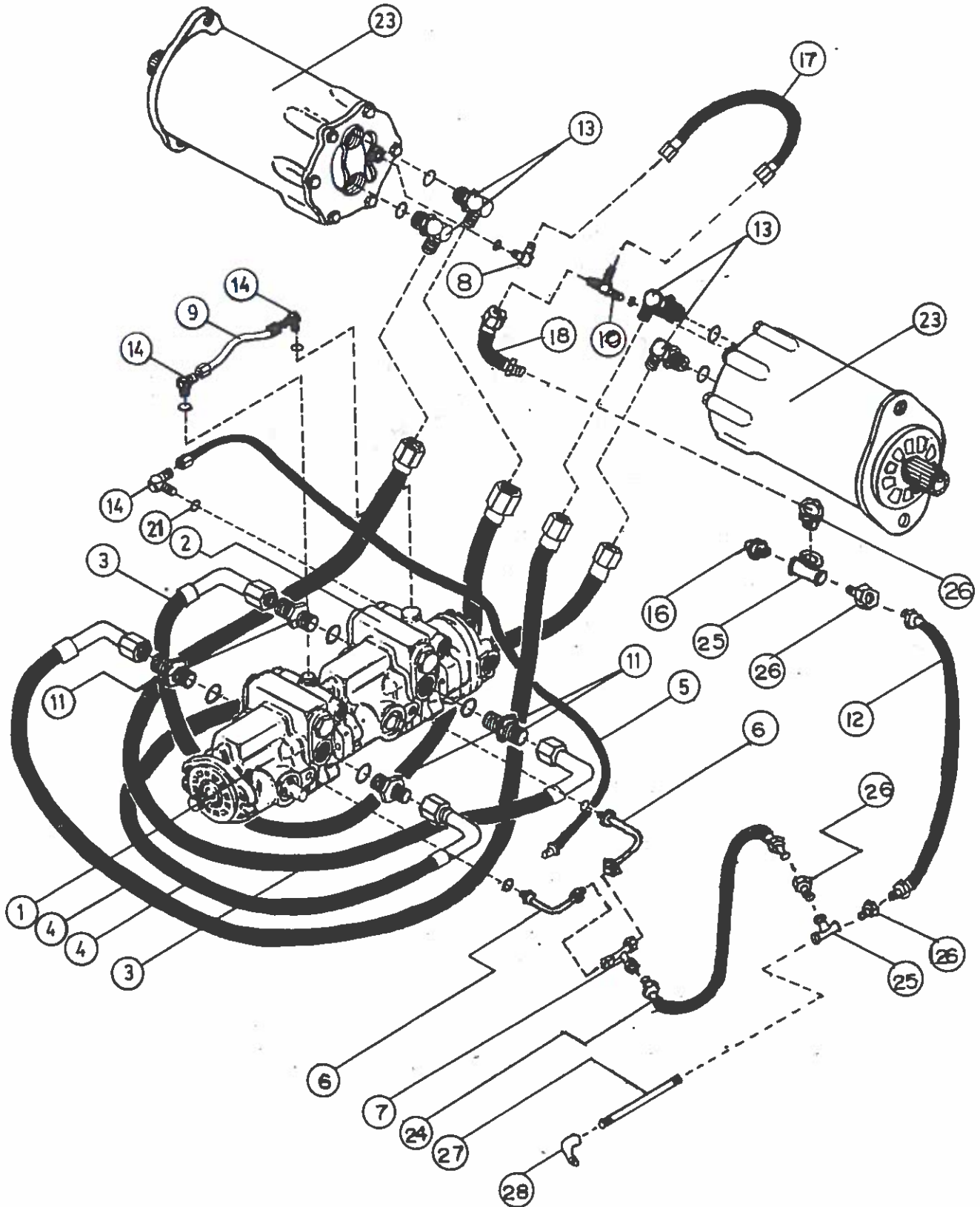
DIESEL ENGINE, KUBOTA V 1902-B

Item No.	Part No.	Description	Qty.
1	514001	Engine Frame	1
2	117030	Engine	1
3	117008	Hydrostatic Pump, Left Side Drive	1
4	117007	Hydrostatic Pump, Right Side Drive	1
5	510490	Housing, Pump Drive	1
6	115129	Adaptor Disc, Pump Drive	1
7	117044	Starter	1
8	117108	Alternator (Internally Regulated)	1
or	117063	Alternator	1
or	117038	Regulator	1
9	179005	Battery, 12 Volt	1
10	117052	Fuel Filter (Spin-On 7000-3450-0)	1
11	117051	Fuel Filter Housing	1
12	117050	Oil Filter (7000-3209-0)	1
13	117035	Hose, Radiator — Lower	1
14	117104	Solenoid — Fuel Shut Off	1
15	117062	Cooling Fan, Pusher	1
16	117039	Air Filter Housing	1
17	117053	Air Filter (Element 7000-1285-0)	1
18	117054	Muffler	1
19	117109	Gasket, Muffler	2
20	514032	Tail Pipe	1
21	117033	Radiator c/w Fan Shroud	1
22,23	117037	Drain Cock Assembly	1
24	115940	Radiator Cap	1
25	117036	Hose Clamps, Radiator — 1 1/2" - 2 1/4" Adjustable	4
26	117034	Hose, Radiator — Upper	1
27	514049	Angle, Radiator Retainer	1
28	123296	Hose Clamp — Wire	4
29	514024	Formed Hose — Air Manifold	1
30	514026	Tube, Air	1
31	117048	Straps, Air Filter Mounting	2
32	117040	Mounting Bracket, Air Filter	1
33	514020	Bracket, Air Filter	1
34	117064	Injector Pump Assembly	1
35	115948	Thermostat	1
36	153351	Hose, Injector Drain To Filter and Fuel Line	2
37	117065	Fan Belt, Alternator	1
38	510486	Strap, Battery Hold Down	1
39	510443	Plate, Battery Carrier	1
40	123184	Clamps, Hose — 1/2" Adjustable	2
41	124712	Coupler — NPTF To Hose	1
42	124711	Valve, Fuel Shut-Off	1
43	124703	Elbow, Street — 1/4" NPT	1
44	122901	Bushing, Pipe — 3/4" - 1/4" NPT	1
45	510482	Bracket, Pump Mount	1

DIESEL ENGINE, KUBOTA V 1902-B

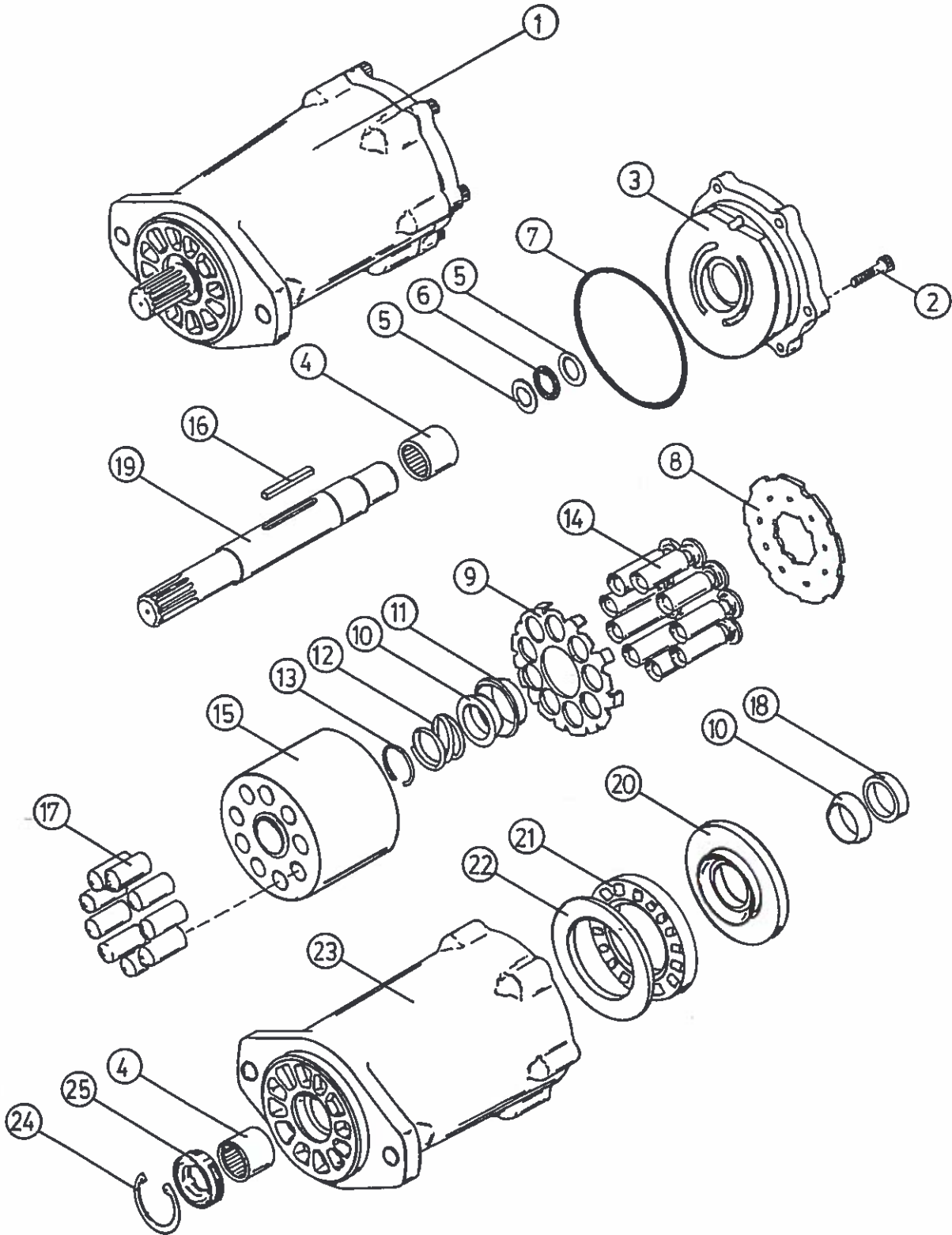
Item No.	Part No.	Description	Qty.
46	117010	Mount, Engine Isolator	3
47	115854	Clevis Yoke c/w Pin and Cotter Pin	1
48	514010	Bracket, Engine Mount — Left	1
49	514014	Bracket, Engine Mount — Right	1
50	514043	Rod, Throttle	1
51	115208	Knob, Throttle	1
52	510447	Handle, Throttle	1
53	102758	Cotter Pin — 3/32" O x 3/4" LG.	1
54	105575	Spring Throttle	1
55	510483	Lockbolt, Engine Retainer	2
56	107307	Bolt, Hex. Head — M6 - 1.00 x 20" LG.	6
57	107358	Bolt, Hex. Head — M8 - 1.25 x 25" LG.	10
58			
59	107398	Bolt, Hex. Head — M12 - 1.25 x 25" LG.	8
60	101952	Bolt, Hex. Head — 5/16" - 18 UNC x 1 1/2" LG.	2
61	101959	Bolt, Hex. Head — 5/16" - 18 UNC x 3/4" LG.	8
62	102001	Bolt, Hex. Head — 3/8" - 16 UNC x 1" LG.	2
63	101998	Bolt, Hex. Head — 3/8" - 16 UNC x 1 1/4" LG.	12
64	102017	Bolt, Hex. Head — 3/8" - 16 UNC x 2 1/4" LG.	1
65	102022	Bolt, Hex. Head — 7/16" - 14 UNC x 1" LG.	6
66	102050	Bolt, Hex. Head — 1/2" - 13 UNC x 1 1/4" LG.	10
67	107017	Flatwasher — 8mm	2
68	107021	Flatwasher — 12mm	8
69	102613	Flatwasher — 5/8" Dia.	4
70	102607	Flatwasher — 1/4" Dia.	1
71	102609	Flatwasher — 3/8" Dia.	2
72	102611	Flatwasher — 1/2" Dia.	2
73	153352	Fibre Washer	1
74	107065	Lockwasher — 6mm	6
75	107067	Lockwasher — 8mm	10
76			
77	107071	Lockwasher — 12mm	8
78	102594	Lockwasher — 5/8" Dia.	4
79	102608	Flatwasher — 5/16" Dia.	2
80	102589	Lockwasher — 5/16" Dia.	8
81	102590	Lockwasher — 3/8" Dia.	21
82	102591	Lockwasher — 7/16" Dia.	6
83	102592	Lockwasher — 1/2" Dia.	11
84	107117	Hex. Nut — M8 - 1.25	10
85	102540	Hex. Nut — 5/8" UNC	6
86	102520	Hex. Nut — 5/16" - 18 UNC	2
87	102525	Hex. Nut — 3/8" - 16 UNC	1
88	102535	Hex. Nut — 1/2" - 13 UNC	8
89	102521	Locknut — 5/16" - 18 UNC	2

SECTION 4 DRIVE TRAIN



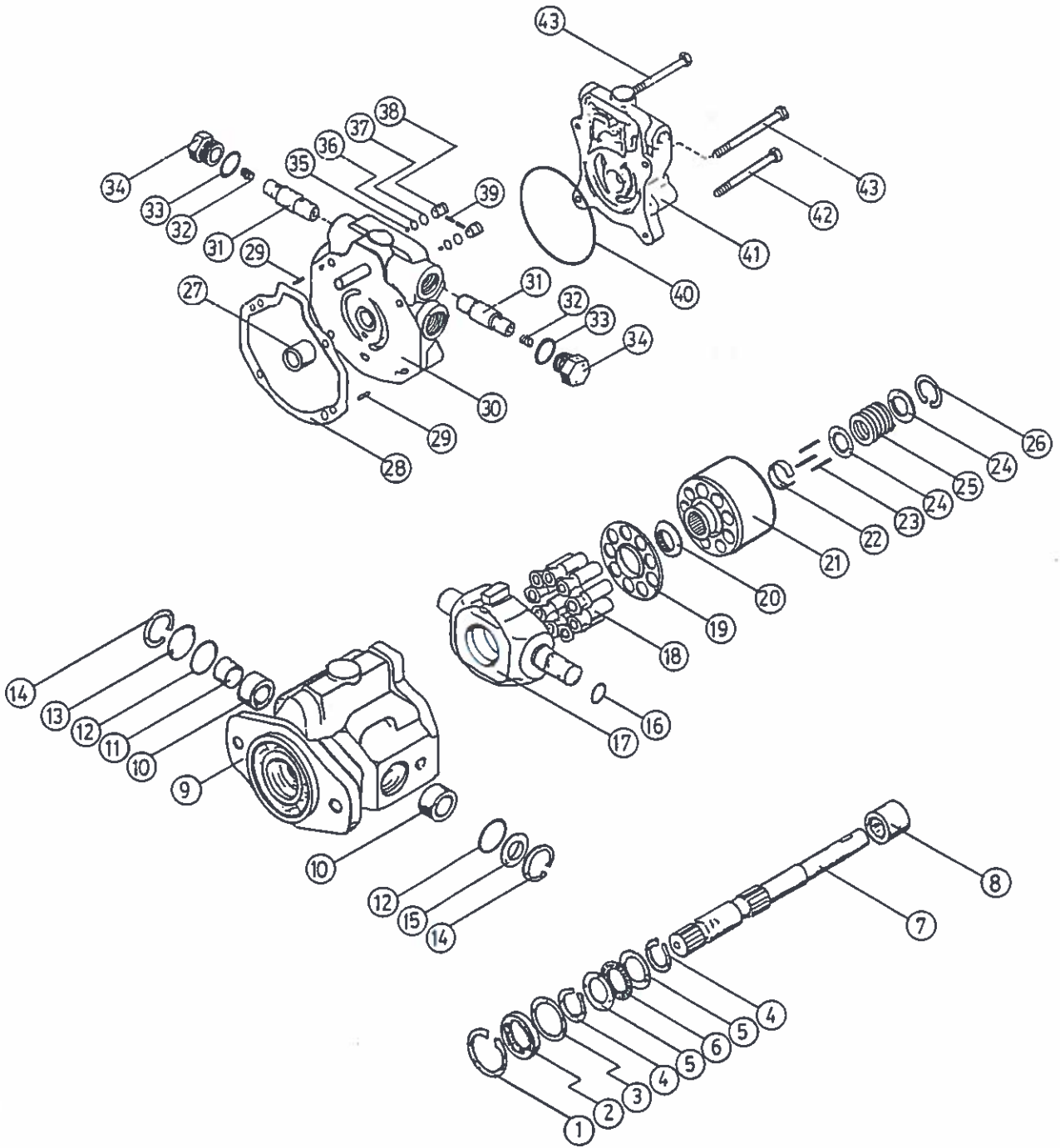
FINAL DRIVE ASSEMBLY

Item No.	Part No.	Description	Qty.
1	127120	Transmission Motor	2
2	510077	Plate, Motor Mount	2
3	155611	Gasket, Transmission Motor	2
4	141Q34	Sprocket, Drive Motor	2
5	102771	Snap Ring — (1" Dia. External)	2
6	141037	Jackshaft	2
7	135358	Seal, Grease	2
8	102773	Snap Ring, — (1-3/8" Dia. External — 35 mm)	2
9	510089	Key, Jackshaft	2
10	102772	Snap Ring — (2-13/16" Dia. Internal — 72 mm)	8
11	115918	Ball Bearing, Self-Aligning	4
12	510088	Spacer, Jackshaft	4
13	141033	Sprocket Cluster	2
14	102617	Flatwasher — (7/8" Dia.)	6
15	102562	Slotted Nut, Hex. — (7/8" Dia. - 14 UNF)	6
16	135353	Dust Cap	2
17	141047	Wheel Sprocket	4
18	510095	Drive Axle Assembly	4
19	135359	Seal, Grease	8
20	510396	Spacer, Axle	4
21	135361	Bearing, Roller Cone	8
22	135360	Cup, Bearing Race	8
23	510096	Housing, Casting	4
24	141044	Axle, Wheel	4
25	135364	Stud, Wheel	32
26	155612	Gasket, Axle Housing	4
28	510105	Chain, Motor Drive — No. 50 Chain — 83 Pitches	2
29	113360	Link, Chain Connector — No. 50 Cottered Link	2
30	510382	Chain, Front Axle Drive — No. 80 Heavy — 57 Pitches	2
31	113359	Link, Chain Connector — No. 80 Heavy — Cottered Link	4
32	510383	Chain, Rear Axle Drive — No. 80 Heavy — 59 Pitches	2
34	102041	Bolt, Flat Head Machine — (1/2" - 13 UNC x 1 1/2" LG.)	4
35	102103	Bolt, Hex. Head — 3/8" x 2" — UNC	6
36	102611	Flatwasher — 1/2"	8
37	102613	Flatwasher — 5/8"	16
38	102592	Lockwasher — 1/2"	12
39			
40	107073	Lockwasher — 5/8"	16
41	102529	Jam Nut, Hex. — 3/8" — UNC	6
42	102535	Hex. Nut — 1/2" — 13 UNC	12
44	102540	Hex. Nut — 5/8" — UNC	16
45	135357	Wheel Nut — 9/16" — 18 UNF — Cone	32
46	102760	Cotter Pin — 3/16" Dia. x 1 1/2" LG.	2
47	102762	Cotter Pin — 3/16" ϕ x 2" LG.	4
48	102618	Flatwasher — 1" ϕ Heavy	4
49	105399	Hex. Slotted Nut — 1" ϕ - 14 UNF	4



TRANSMISSION MOTOR

Item No.	Part No.	Description	Qty.
1	127120	Transmission Motor	2
2		Bolt, Hex Socket Head - (5/8" - 18 UNF x 1" Lg.) - 16032-510	6
		Plate Assembly, Back - 74624-305	1
3	NSS	Plate, Back	1
4		Bearing - 74600-153	2
5		Spacer, Race - 74600-103	1
6		Bearing, Thrust - 74600-104	1
7		Seal, O-Ring - 16015-57	1
8		Plate, Connector - 74604-59	1
9		Spider - 74600-601	1
10		Pivot, Spider - 74600-600	2
11		Pilot, Spider and Connector Plate - 74600-614	1
12		Spring, Piston - 17142-1	1
13		Ring, Retaining - 16009-118	1
14		Piston Kit - (Set Of 9) - 74604-903	1
15		Block Piston - 74614-50	1
16		Key - 74600-603	1
17		Piston Kit - (Set Of 9) - 74604-904	1
18		Spacer, Pivot - 74600-605	1
19		Shaft, Drive - 74624-201	1
20		Race Assembly, Piston - 74600-110	1
21		Bearing, Thrust - 74600-102	1
22		Race, Bearing - 74600-100	1
		Housing Assembly, Motor - 74624-307	1
23	NSS	Housing, Motor	1
24		Ring, Retaining - 16077-26	1
25		Seal, Shaft - 16232-16	1

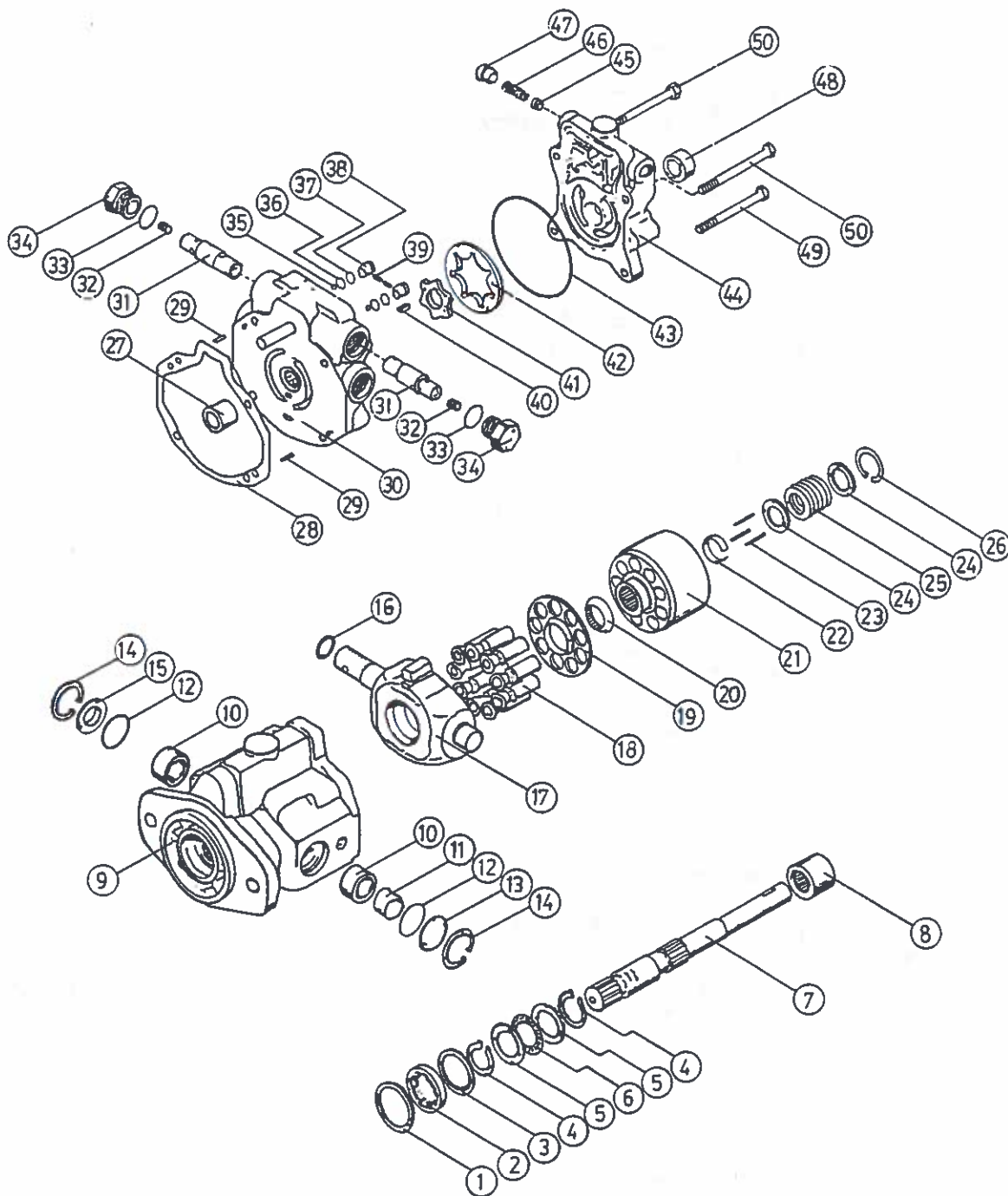


HYDROSTATIC PUMP R/H

4-4

Item No.	Part No.	Description Cessna #081 - W70442 - DBB	Qty.
	117007	Hydrostatic Pump, Right Side Drive	1
* 1		Ring, Retaining - 16077-32	1
* 2		Seal, Shaft - 16253-18	1
3		Washer, Seal - 16048-319	1
* 4		Ring, Retaining - 16078-18	2
5		Race Thrust - 74308-100	2
6		Bearing, Thrust - 74308-101	1
7		Shaft Drive - 70442-203	1
8		Housing Assembly - 70402-324	1
9	NSS	Bearing, Housing - 16238-11816	1
10		Housing, Front - 70402303	1
11		Bearing, Needle - 70412-151	2
12		Race, Inner - 70402-100	1
* 13		Seal, O-Ring - 16015-27	2
14		Cover, Trunnion - 74012-607	1
* 15		Ring, Retaining - 16077-26	2
16		Sleeve, Trunnion - 70402-600	1
* 17		Seal, O-Ring - 16015-217	1
18	NSS	Cam Plate - (Right Hand) - 70402-614	1
19	NSS	Piston Kit - (Set Of 9)	1
20	NSS	Spider, Cam Plate	1
21		Pivot, Spider	1
22	NSS	Rotating Kit Assembly - 70402-615	1
23	NSS	Block, Piston	1
24	NSS	Keeper, Pin	1
25	NSS	Pin, Loading	3
26	NSS	Washer, Spring	2
27	NSS	Spring, Loading	1
28	NSS	Ring, Retaining	1
* 29		Bearing, Shaft - 52200-23	1
30		Gasket, Housing - 70412-626	1
31		Back Plate Assembly - 70441-350	1
32		Pin, Roll - 16026-808	2
33	NSS	Back Plate	1
34		Valve Assembly, Relief - 32040-1A	2
35		Plug Assembly - 70111-514	2
36		Spring, Internal Plug - 17045-14	1
* 37		O-Ring, Plug - 16015-18-90	1
38	NSS	Cap	2
39		Check Valve Assembly - 70111-505	2
40	NSS	Ball, Steel (5/16" Dia.)	1
* 41		Seal, O-Ring - 16015-1-90	1
* 42		Washer, Back-Up - 16101-301	1
43	NSS	Body, Check Valve	1
	NSS	Pin, Roll	1
* 44		O-Ring, Tandem Adaptor - 16015-57	1
45		Tandem Adaptor - 70441-309	1
46		Hex Head Cap Screw - (5/16" - 18 UNC x 3-1/4" Lg.) - 16032-634	2
47		Hex Head Cap Screw - (5/16" - 18 UNC x 3-3/4" Lg.) - 16032-640	2
48		Special Adaptor Repair Kit - 70442-921	1
49		Seal Kit - 70442-903	1

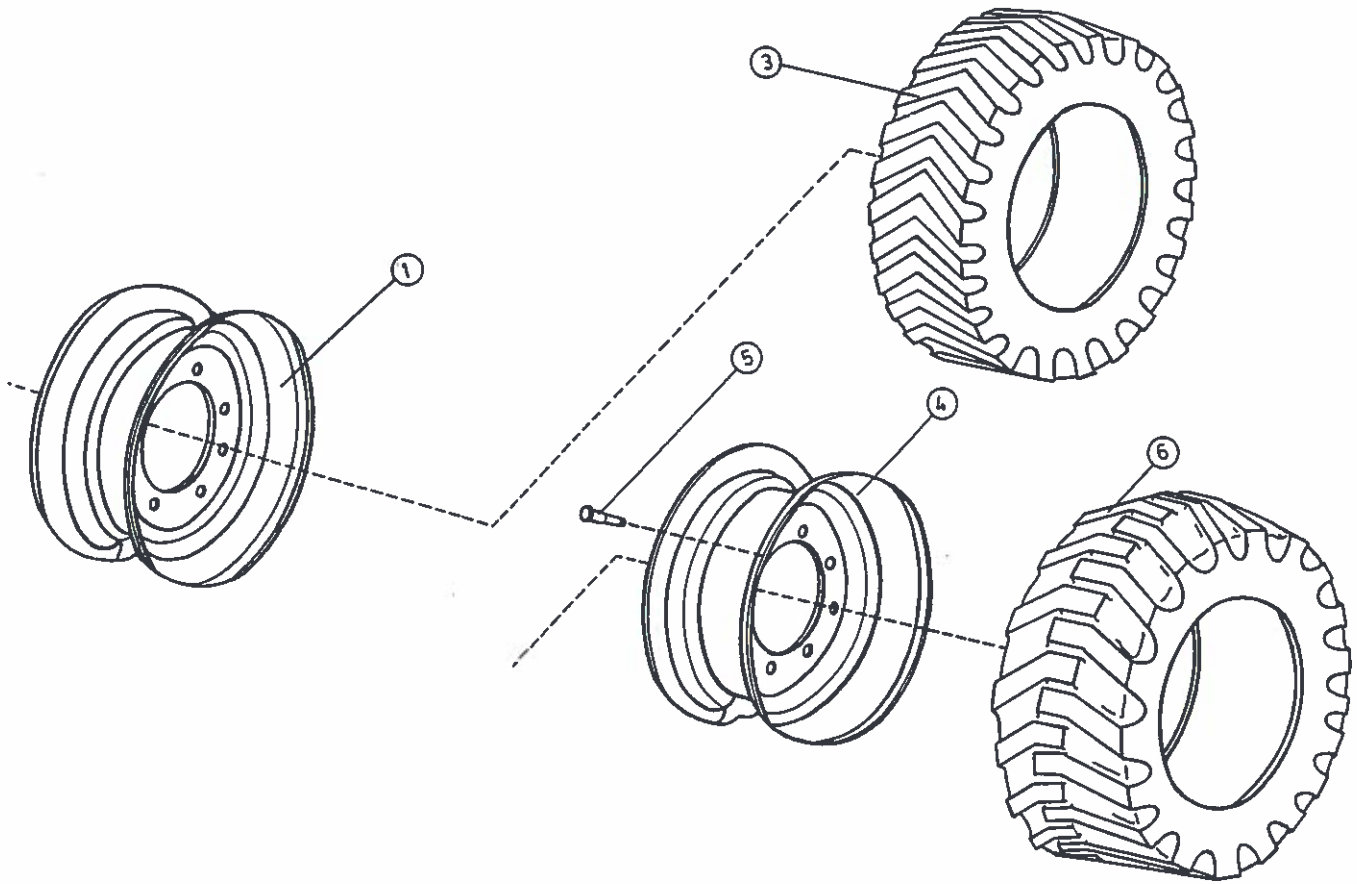
All Items Preceeded By An Asterisk (*) Are Part Of The Seal Kit



HYDROSTATIC PUMP L/H

Item No.	Part No.	Description Cessna 081 - W70442 - RCL	Qty.
	117008	Hydrostatic Pump, Left Side Drive	1
* 1		Ring, Retaining - 16077-32	1
* 2		Seal, Shaft - 16253-18	1
3		Washer, Seal - 16048-319	1
* 4		Ring, Retaining - 16078-18	2
5		Race Thrust - 74308-100	2
6		Bearing, Thrust - 74308-101	1
7		Shaft Drive - 70442-200	1
8		Housing Assembly - 70402-324	1
9	NSS	Bearing, Housing - 16238-11816	1
10		Housing, Front	1
11		Bearing, Needle - 70412-151	2
12		Race, Inner - 70402-100	1
* 13		Seal, O-Ring - 16015-27	2
14		Cover, Trunnion - 74012-607	1
* 15		Ring, Retaining - 16077-26	2
16		Sleeve, Trunnion - 70402-600	1
* 17		Seal, O-Ring - 16015-217	1
18	NSS	Cam Plate - (Left Hand) - 70402-613	1
19	NSS	Piston Kit - (Set Of 9)	1
20	NSS	Spider, Cam Plate	1
		Pivot, Spider	1
		Rotating Kit Assembly - 70402-615	1
21	NSS	Block, Piston	1
22	NSS	Keeper, Pin	1
23	NSS	Pin, Loading	3
24	NSS	Washer, Spring	2
25	NSS	Spring, Loading	1
26	NSS	Ring, Retaining	1
27		Bearing, Shaft - 52200-23	1
* 28		Gasket, Housing - 70412-626	1
		Back Plate Assembly - 70441-350	1
29		Pin, Roll - 16026-808	2
30	NSS	Back Plate	1
31		Valve Assembly, Relief - 32040-1A	2
		Plug Assembly - 70111-514	2
32		Spring, Internal Plug - 17045-14	1
* 33		O-Ring, Plug - 16015-18-90	1
34	NSS	Cap	1
		Check Valve Assembly - 70111-505	2
35	NSS	Ball, Steel - (5/16" Dia.)	1
* 36		Seal, O-Ring - 16015-1-90	1
* 37		Washer, Back-Up - 16101-301	1
38	NSS	Body, Check Valve	1
39	NSS	Pin, Roll	1
40		Key, Gerotor - 15222-20	1
		Gerotor Kit, Matched Set - 28301-900	1
41	NSS	Gerotor, Inner Gear	1
42	NSS	Gerotor, Outer Ring	1
* 43		O-Ring, Tandem Adaptor - 16015-57	1
		Tandem Adaptor Assembly - 70441-309	1
44	NSS	Adaptor, Charge Pump	1
45		Poppet, Spring - 70111-507	1
46		Spring, Pressure - 17000 - 48 B	1
47		Retainer, Spring - 70400-505	1
48		Bearing, Adaptor - 16239-1148	1
49		Hex Head Cap Screw - (5/16" - 18 UNC x 3-1/4" Lg.) - 16032-634	2
50		Hex Head Cap Screw - (5/16" - 18 UNC x 3-3/4" Lg.) - 16032-640	2
		Special Adaptor Repair Kit - 70442-921	1
	117054	Seal Kit - 70442-903	1

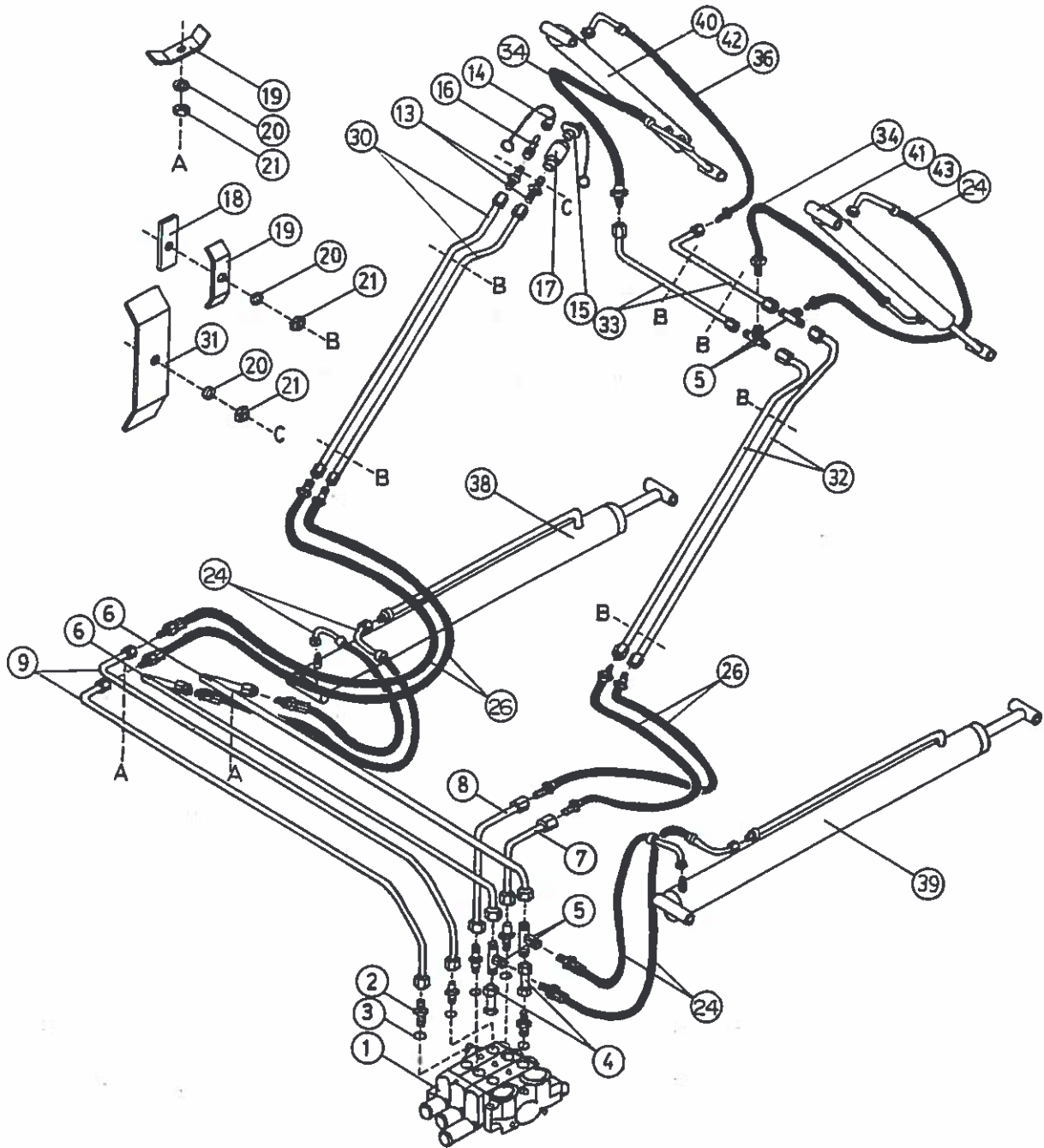
All Items Preceeded By An Asterisk (*) Are Part Of The Seal Kit



WHEELS AND TIRES

Item No.	Part No.	Description	Qty.
1	135032	Rim, Wheel — (8 Bolt - 6" Pilot)	4
3	135066	Tire, Loader Service — (7.00 x 15" NHS — 6 Ply)	4
4	135033	Rim, Wheel — (8 Bolt - 6" Pilot) — Optional	4
5	135153	Valve Stem Assembly	4
6	135067	Tire, Sure Grip Lug — (10 x 16.5 - 6 Ply) — Optional	4
7	135035	Rim, Wheel — (8 Bolt - 6" Pilot - 9.75 x 16.5) — Optional	4
8	135068	Tire, Sure Grip Lug — (12 x 16.5 - 6 Ply) — Optional	4

SECTION 5 HYDRAULICS

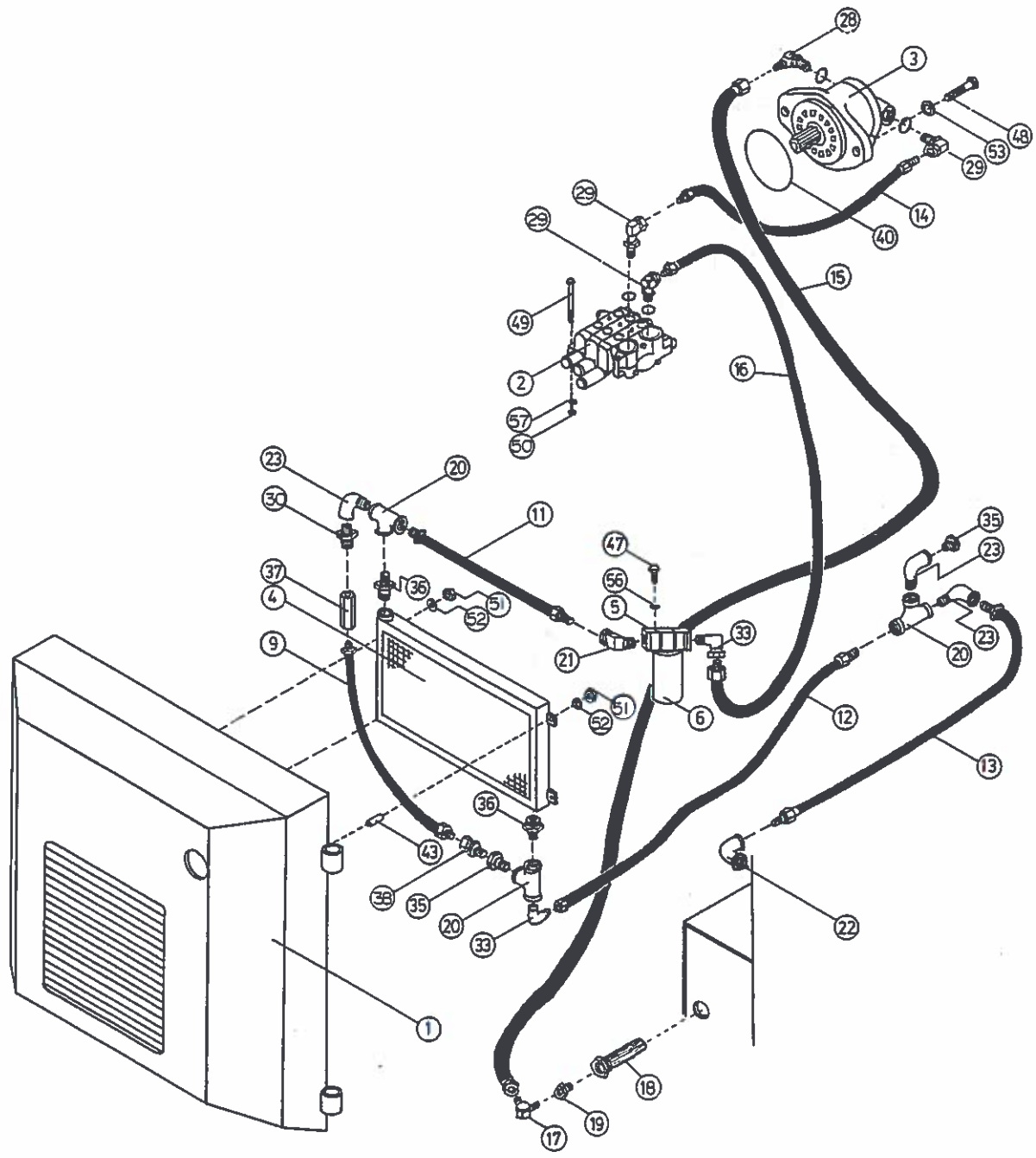


1128101

HYDRAULIC CIRCUIT: LINES AND CYLINDERS

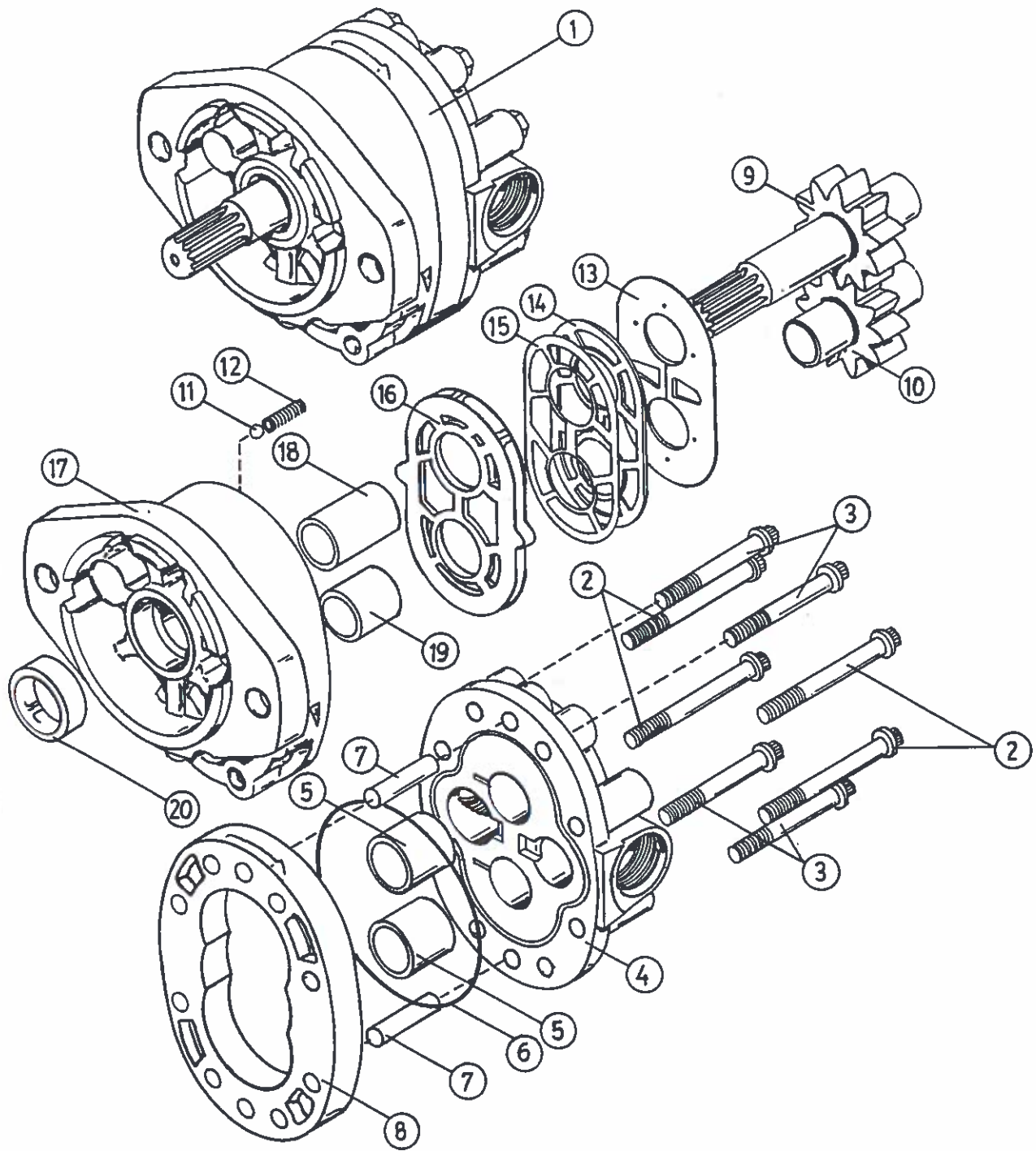
5-1

Item No.	Part No.	Description	Qty.
1	128121	Control Valve	1
2	122838	Adaptor, Work Ports	6
3			
4	128101	Tube, Lift, A and B, Vertical	2
5	124401	Union Tee	4
6	128102	Tube, Lift, A and B Horizontal	2
7	128103	Tube, Tilt A	1
8	128104	Tube, Tilt B	1
9	128105	Tube, Auxiliary, A and B	2
13	122829	Adaptor, Tube to Coupler	2
14	127086	Cap, Rubber — (c/w Chain and Ring)	1
15	127085	Plug, Rubber — (c/w Chain and Ring)	1
16	127011	Male Coupler, Auxiliary A	1
17	127010	Female Coupler, Auxiliary B	1
18	510129	Clamp, Flat — Tube Mount	9
19	510130	Clamp, Formed — Tube Mount	9
20	102589	Lockwasher — 5/16"	10
21	102520	Hex Nut — 5/16" — UNC	10
24	124581	Hose Assembly Lift A and B — Left & Right, Tilt Right	5
26	128051	Hose Assembly — Tilt A	4
30	128106	Tube, Auxiliary A and B — Lift Arm	2
31	510191	Clamp, Formed, Coupler Mount	1
32	128107	Tube, Tilt A and B, Lift Arm	2
33	128108	Tube, Tilt A and B, Lift Arm Front	2
34	124583	Hose, Tilt A and B	2
36	124582	Hose, Tilt B, Front Left	1
38	126374	Lift Cylinder, Left — R2 — 25RS — 29.13 L	1
39	126375	Lift Cylinder, Right — R2 — 25RS — 29.13 R	1
40	126376	Tilt Cylinder, Left - (Self Leveling) — R2 — 25RS — 14.75L	1
41	126377	Tilt Cylinder, Right - (Self Leveling) — R2 — 25RS — 14.75R	1
42	126360	Tilt Cylinder, Left - (Non-Self Leveling) — R2 — 25RS — 18.7 L	1
43	126361	Tilt Cylinder, Right - (Non-Self Leveling) — R2 — 25RS — 18.7 R	1



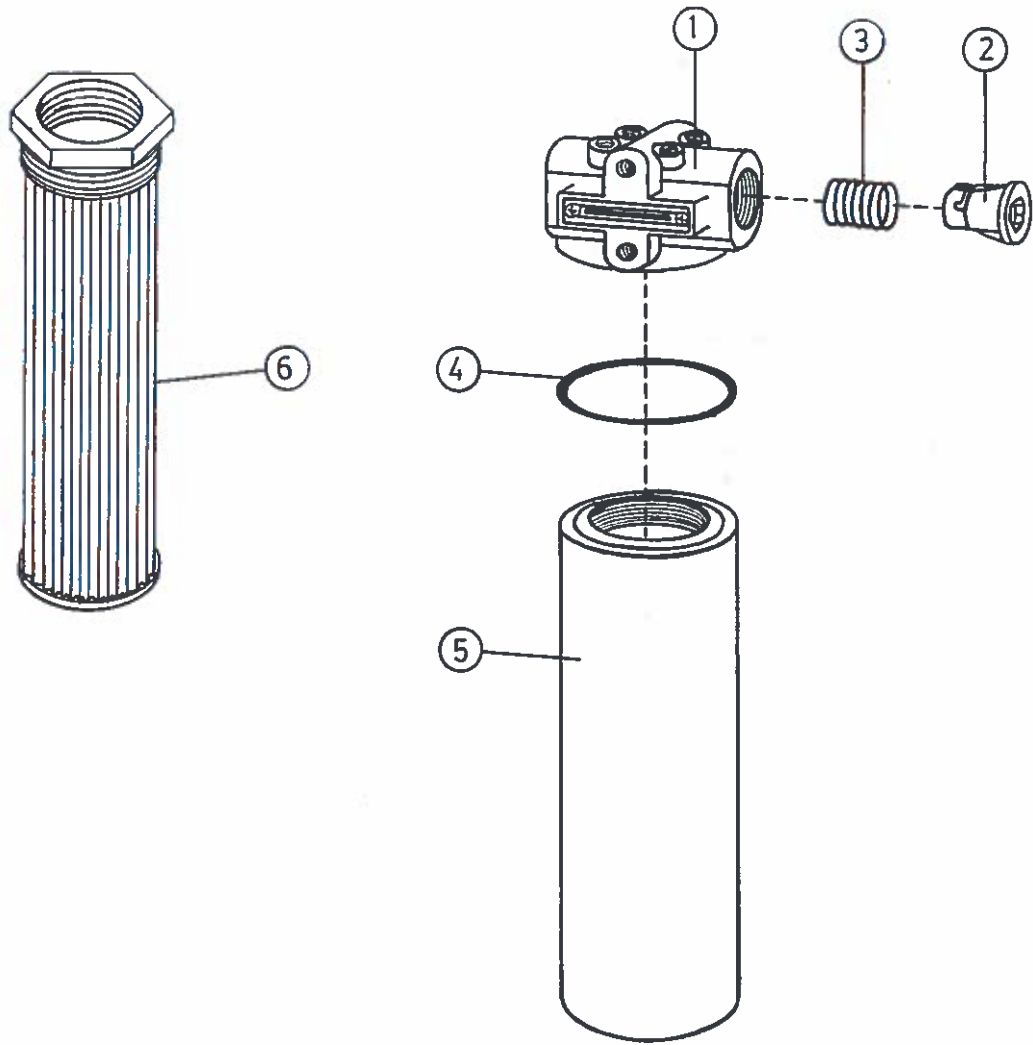
HYDRAULIC CIRCUIT: GEAR PUMP, COOLER AND HOSE ASSEMBLIES 5-2

Item No.	Part No.	Description	Qty.
1	510377	Rear Door	1
2	128253	Control Valve	1
3	127106	Hydraulic Pump	1
4	127102	Cooler, Hydraulic Oil	1
5	127127	Filter Kit Assembly — Return	1
6	127124	Replacement Element — Return	1
9	128060	Hose, Cooler Bypass	1
11	128061	Hose, Filter "Out" to Cooler "In"	1
12	122820	Hose, Cooler "Out" to Tank	1
13	128059	Hose, Return to Tank	1
14	122822	Hose, Pump to Valve "In"	1
15	122819	Hose, Suction	1
16	122821	Hose, Valve "Out" to Filter "In"	1
17	122839	Adaptor, Suction Filter to Hose	1
18	117029	Filter, Suction	1
19	122930	Adaptor, Filter To Tank Port	1
20	122891	Tee, Pipe	3
21	124454	Elbow	1
22	122888	Elbow	1
23	122890	Elbow, Street	3
29	122840	Adaptor, Pump Inlet	3
28	122841	Adaptor, Pump Outlet	1
30	122842	Adaptor	1
33	122947	Adaptor, Oil Filter "In" Port	2
35	122898	Bushing	1
36	122843	Adapter Cooler Ports	2
37	127115	Check Valve Oil Bypass — 65 P.S.I.	1
38	122886	Swivel Adaptor	1
40	NSS	O-Ring	1
47	102001	Bolt, Hex. Head — 3/8" x 1" UNC	2
48	NSS	Bolt, Hex. Head — 3/8" x 1 3/8" UNC	2
49	101955	Bolt, Hex. Head — 5/16" x 2 1/2" UNC	2
50	102520	Hex. Nut — 5/16" UNC	2
51	102530	Hex. Nut — 7/16" UNC	4
52	102591	Lockwasher — 7/16" \emptyset	4
53	NSS	Flatwasher, Special	2
56	102590	Lockwasher — 3/8"	2
57	102589	Lockwasher — 5/16"	2



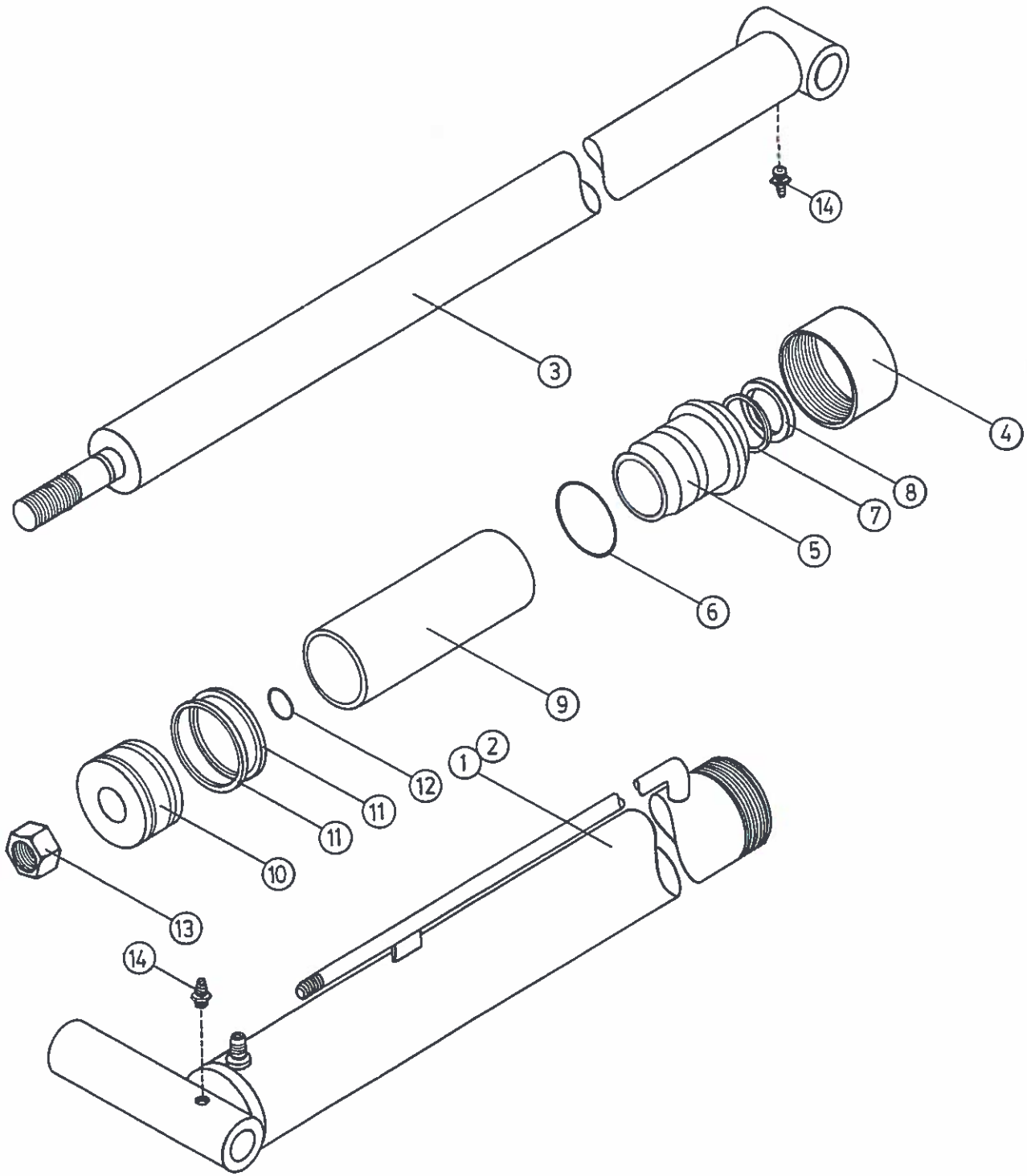
HYDRAULIC GEAR PUMP

Item No.	Part No.	Description	Qty.
1	117009	Hydraulic Gear Pump	1
2		Bolt, Ferry Cap, 12 Point — (5/16" — 18 UNC x 2-1/2" Lg. — Grade 8) — 16119-530	4
3		Bolt, Ferry Cap 12 Point — (5/16" — 18 UNC x 2" Lg. — Grade 8) — 16119-526	4
4		Cover, Rear — 24300-84	1
5	NSS	Bushing, Cover	2
* 6		Seal O-Ring — 16007-513	1
7		Pin, Dowel — 16028-516	2
8		Body, Centre — 24307-250	1
9		Gear and Shaft, Drive — 24307-344	1
10		Gear, Idler — 24307-302	1
* 11		Ball, Steel — 16006-7	2
* 12		Spring, Ball Pressure — 15147-112	2
* 13		Diaphragm — 24300-656	1
* 14		Gasket, Back Up — 24300-660	1
* 15		Protector, Gasket — 24300-637	1
* 16		Seal, Diaphragm — 24300-635	1
17		Cover, Front Mounting — 24300-44	1
18	NSS	Bushing, Cover — (Long)	1
19	NSS	Bushing, Cover — (Short)	1
* 20		Seal, Shaft — 15511-85	1
		Kit — 24300-902	1
		All Items Preceded By An Asterisk (*) Are Part Of Kit No. S 89448	



HYDRAULIC SYSTEM FILTERS

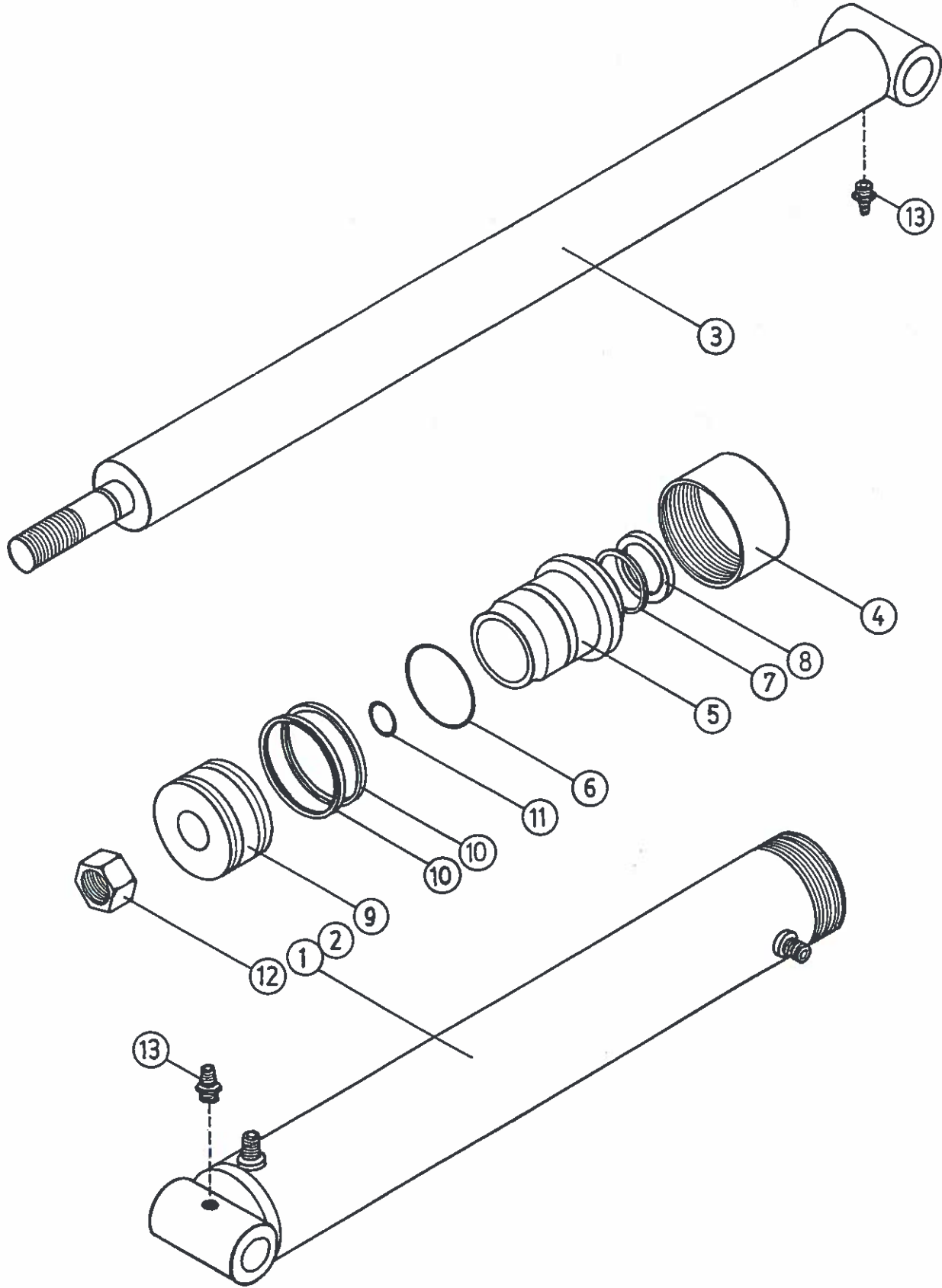
Item No.	Part No.	Description	Qty.
1	127127	Filter Kit Assembly — Return	1
2	NSS	Head Assembly	1
3	NSS	Valve, Relief	1
4	NSS	Spring, Relief — 25 P.S.I.	1
5	NSS	Seal, O-Ring	1
*	127124	Replacement Element	1
*	127126	Filter Kit Assembly	1
6	127129	Replacement Element	1
	117029	Strainer — Suction — (LHA — TMS — 25 — 100)	1
		*Note: Some Machines Are Equipped With A Cannister Type Return Filter Kit.	



LIFT HYDRAULIC CYLINDERS

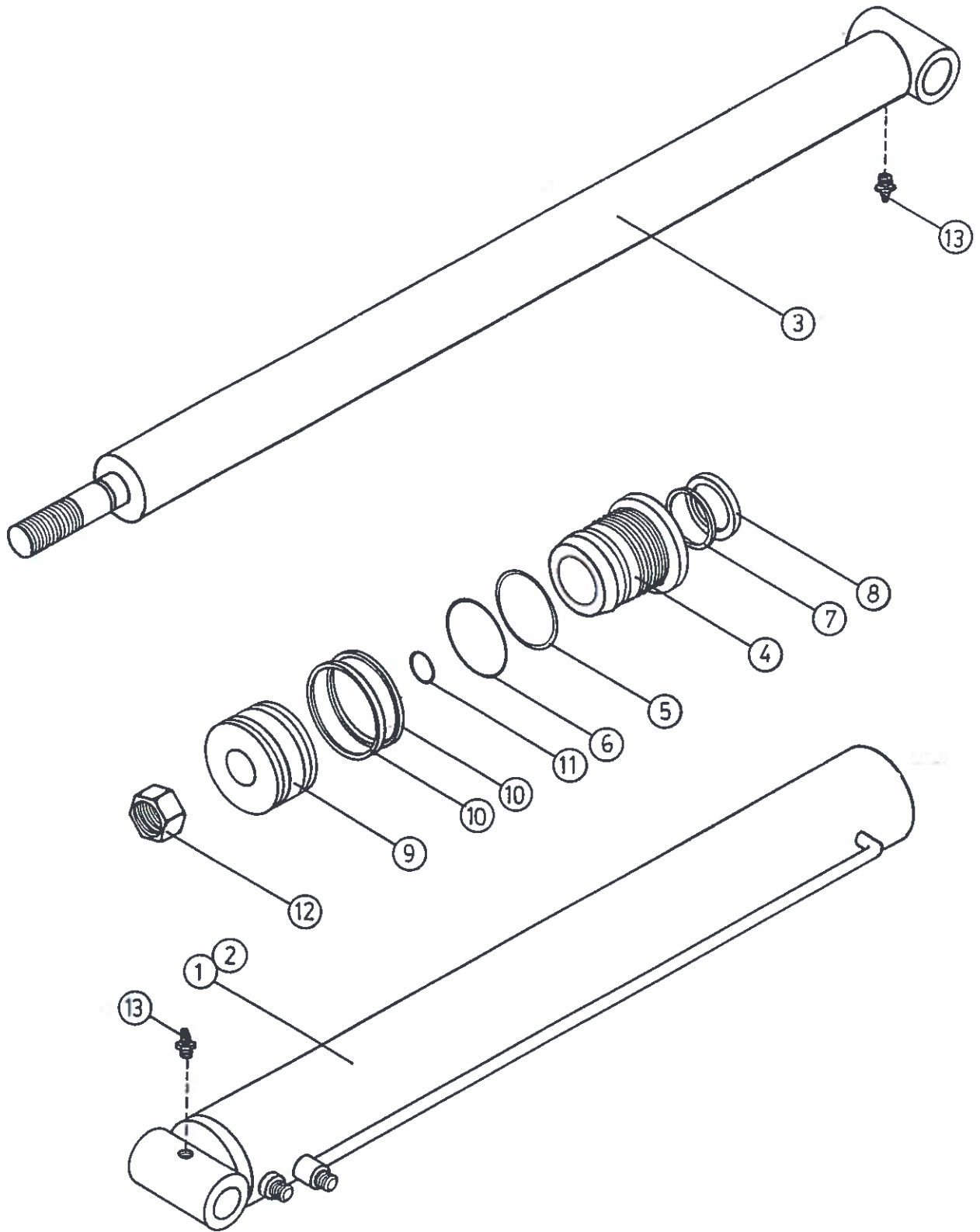
5-5

Item No.	Part No.	Description	Qty.
	126375	Lift Cylinder, Right – (R2 – 25 RS – 29.13 R)	1
	126374	Lift Cylinder, Left – (R2 – 25 RS – 29.13 L)	1
1	128202	Barrel, Cylinder – Right Side – (R-1451)	1
2	128203	Barrel, Cylinder – Left Side – (R-1452)	1
		Shaft Assembly	2
3	128211	Shaft – (R-1841)	1
4	126425	Retaining Nut – (R-3004)	1
5	128215	Gland – (R-2017)	1
* 6	126815	Seal, Gland – (No. 330 BUNA N DURO 90)	1
* 7	126569	Seal, Shaft – (1-1/2" x 1-7/8" x 5/16")	1
* 8	126436	Seal, Wiper – (1-1/2" x 1-7/8" x 3/16" – Cased)	1
9	128228	Spacer – (2-1/4" x 3/8" W, 3.3 Lg. CDSM) (R-6209)	1
10	128220	Piston – (2-9/16" Dia. x 1-3/4" Lg. DUROBAR) (R-3622)	1
* 11	128227	Seal, Piston – (D – 2-1/8" x 2-1/2" x 5/16" U-Cups)	2
* 12	126356	Seal, Piston – (S – No. 018 BUNA N DURO 70)	1
13	126426	Rod Nut – (7/8" – 14 UNF Locknut)	1
14	122787	Grease Zerk – (1/4" – 28 UNF)	2
	128234	Seal Kit – (R2 – 25 RS – 29.13)	
All Items Preceded By An Asterisk (*) Are Part Of The Seal Kit			



TILT HYDRAULIC CYLINDERS - SELF LEVELING

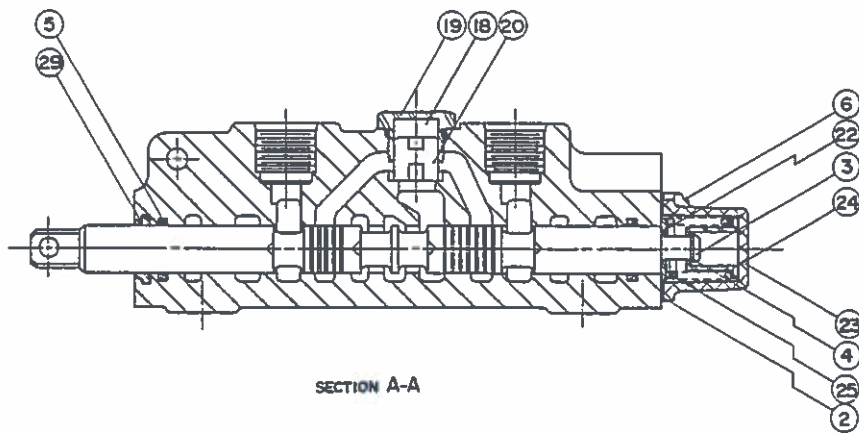
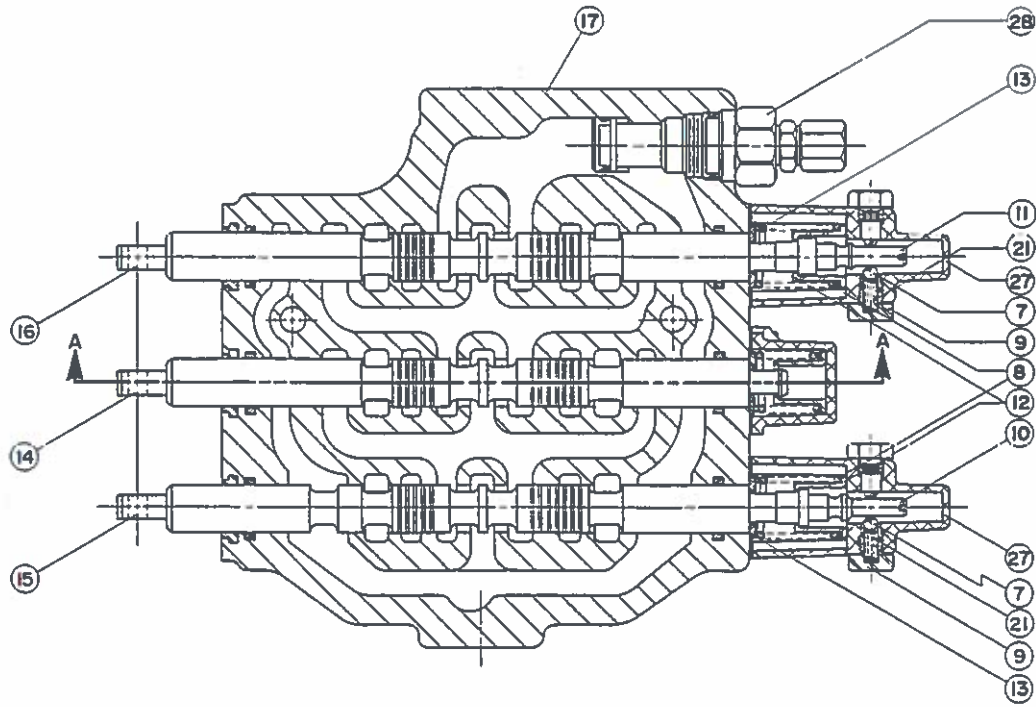
Item No.	Part No.	Description	Qty.
	126376	Tilt Cylinder, Left - (R2 - 25 RS - 14.75 L)	1
	126377	Tilt Cylinder, Right - (R2 - 25 RS - 14.75 R)	1
1	128201	Barrel, Cylinder - Left Side (R-1450)	1
2	128200	Barrel, Cylinder - Right Side (R-1449)	1
		Shaft Assembly	2
3	128210	Shaft - (R-1840)	1
4	126425	Retaining Nut - (R-3004)	1
5	126619	Gland - (R-2012)	1
* 6	126815	Seal, Gland - (No. 330 BUNA N DURO 90)	1
* 7	126358	Seal, Shaft - (1-1/4" x 1-5/8" x 5/16")	1
* 8	126357	Seal, Wiper - (1-1/4" x 1-5/8" x 3/16" Snap In)	1
9	128220	Piston - (R-3622)	1
* 10	128227	Seal, Piston - (D - 2-1/2" x 2-1/8" x 5/16" U-Cups)	2
* 11	126356	Seal, Piston - (S - No. 018 BUNA N DURO 70)	1
12	126426	Rod Nut - (7/8" - 14 UNF Locknut)	1
13	122787	Grease Zerk - (1/4" - 28 UNF)	2
	128235	Seal Kit - R2 - 25 RS - 14.75.	
		All Items Preceded By An Asterisk (*) Are Part Of The Seal Kit	



TILT HYDRAULIC CYLINDERS - NON SELF LEVELING

5-7

Item No.	Part No.	Description	Qty.
	126360	Tilt Cylinder, Left – (R2 – 25 RS – 18.7 L)	1
	126361	Tilt Cylinder, Right – (R2 – 25 RS – 18.7 R)	1
1	128204	Barrel, Cylinder – Left Side – (R 10267)	1
2	128205	Barrel, Cylinder – Right Side – (R 10268)	1
		Shaft Assembly	2
3	128212	Shaft – (R 15125)	1
4	128216	Gland – (R 2210)	1
* 5	128225	Backup Washer – (No. 228)	1
* 6	128230	Seal, Gland – (No. 228 BUNA N DURO 90)	1
* 7	126358	Seal, Shaft – (1-1/4" x 1-5/8" x 5/16")	1
* 8	128226	Seal, Wiper – (1-1/4" x 1-5/8" x 3/16" Cased)	1
9	126320	Piston – (R-3545)	1
* 10	128227	Seal, Piston – (D – 2-1/2" x 2-1/8" x 5/16" – U Cup)	2
* 11	126356	Seal, Piston – (S – No. 018 BUNA N DURO 70)	1
12	126426	Rod Nut – (7/8" – 14 UNF Locknut)	1
13	122787	Grease Zerk – (1/4" – 28 UNF)	2
	128233	Seal Kit – R2 – 25 RS – 18.7	
		All Items Preceeded By An Asterisk (*) Are Part Of The Seal Kit	

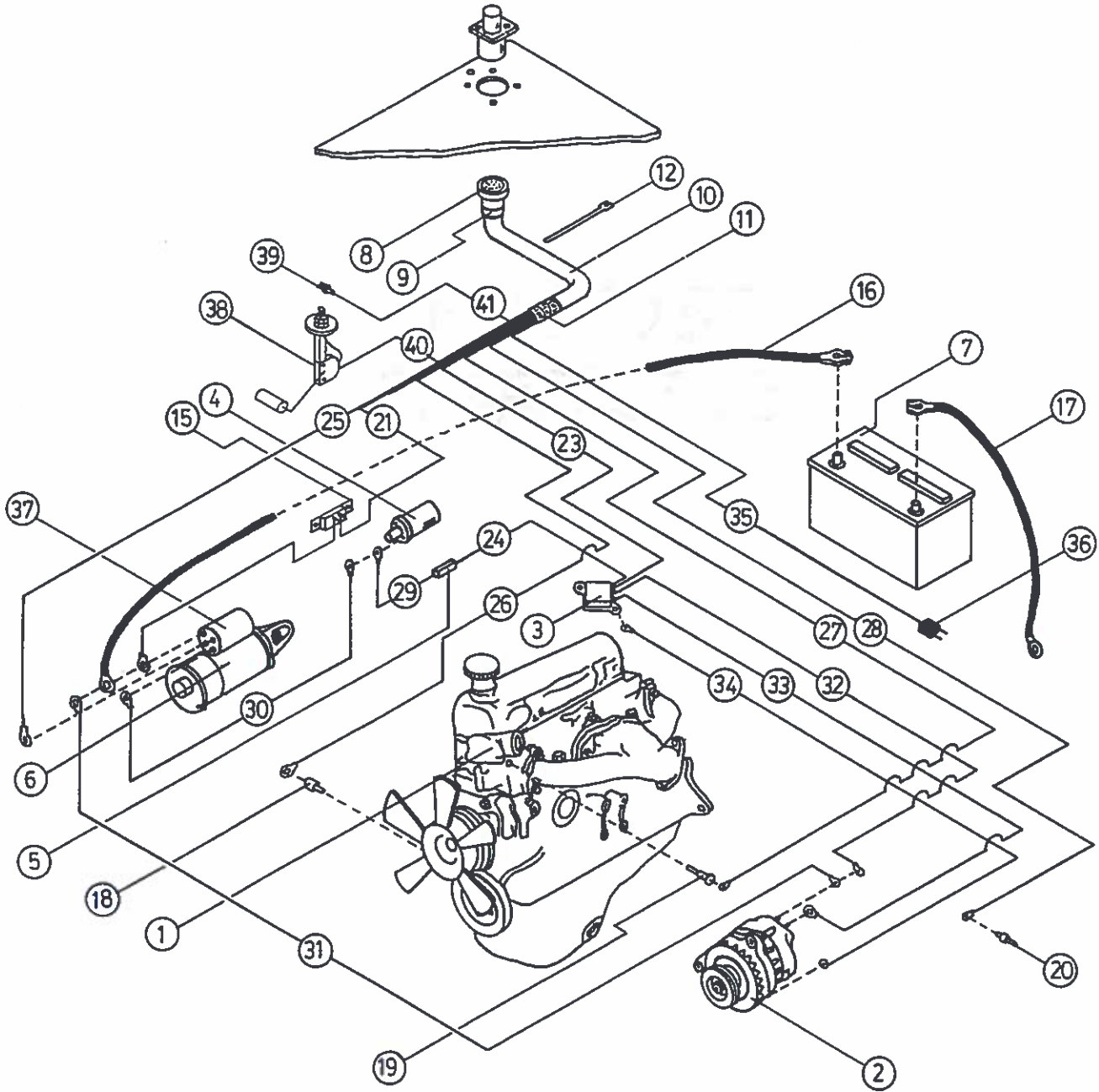


HYDRAULIC CONTROL VALVE

5-9

Item No.	Part No.	Description	Qty.
1	127121	Valve 3 Spool, Dukes 1632 AH	1
2	10589	Gasket - End Cap	3
3	30034-8308	Screw	1
4	30027-049	Washer	1
5	10815-114	"O" Ring	6
6	30028-8208P	Screw w/Lockwasher	6
7	30025-6	Ball, Steel	4
8	1335-8	Spring, Return	2
9	1335-7	Plug, Detent	4
10	1604-5	Spool, Detent (Lt. Green)	1
11	1335-5	Spool, Detent (Lt. Blue)	1
12	1335-4	Spacer	2
13	1335-3	Washer	2
14	1602-38	Spool	1
15	1602-34	Spool	1
16	1335-13	Spool	1
17	1632-1-3A	Body, Mach	1
18	1325-84	Spring, Load Check	3
19	1602-5A	Load Check Plug Ass'y	3
20	1602-4	Poppet, Load Check	3
21	1260-25	Spring, Detent	4
22	1225-6	Washer	1
23	1225-55	Cap, End	1
24	1225-4	Spacer	1
25	1225-18	Spring, Return	1
26	1225-16	Name Plate	1
27	1225-155	Cap Detent End	2
28	10782	Valve Ass'y, Relief	1
29	10628	Ring, Wiper	3

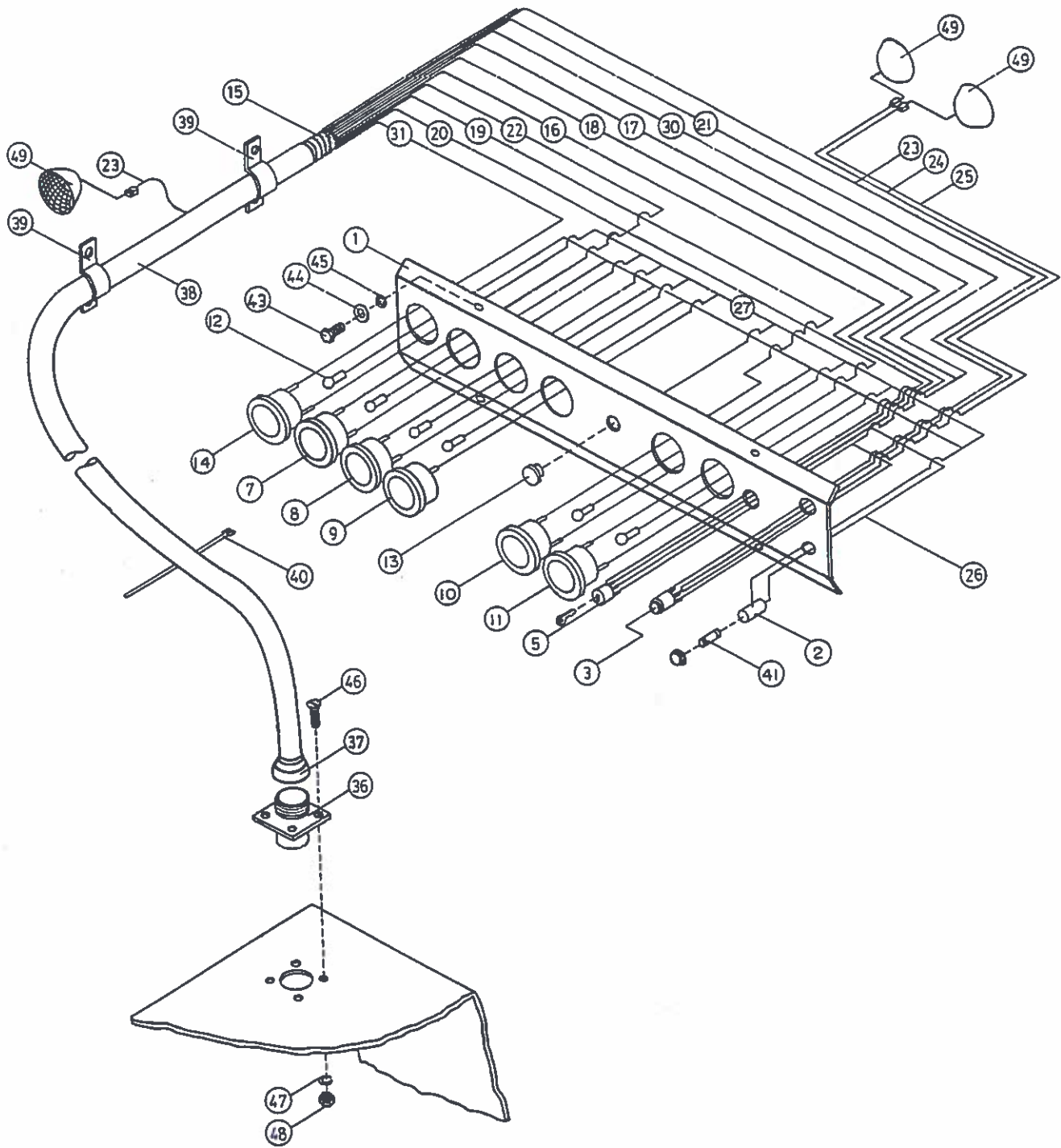
**SECTION 6
ELECTRICAL**



GAS ENGINE ELECTRICAL CIRCUIT

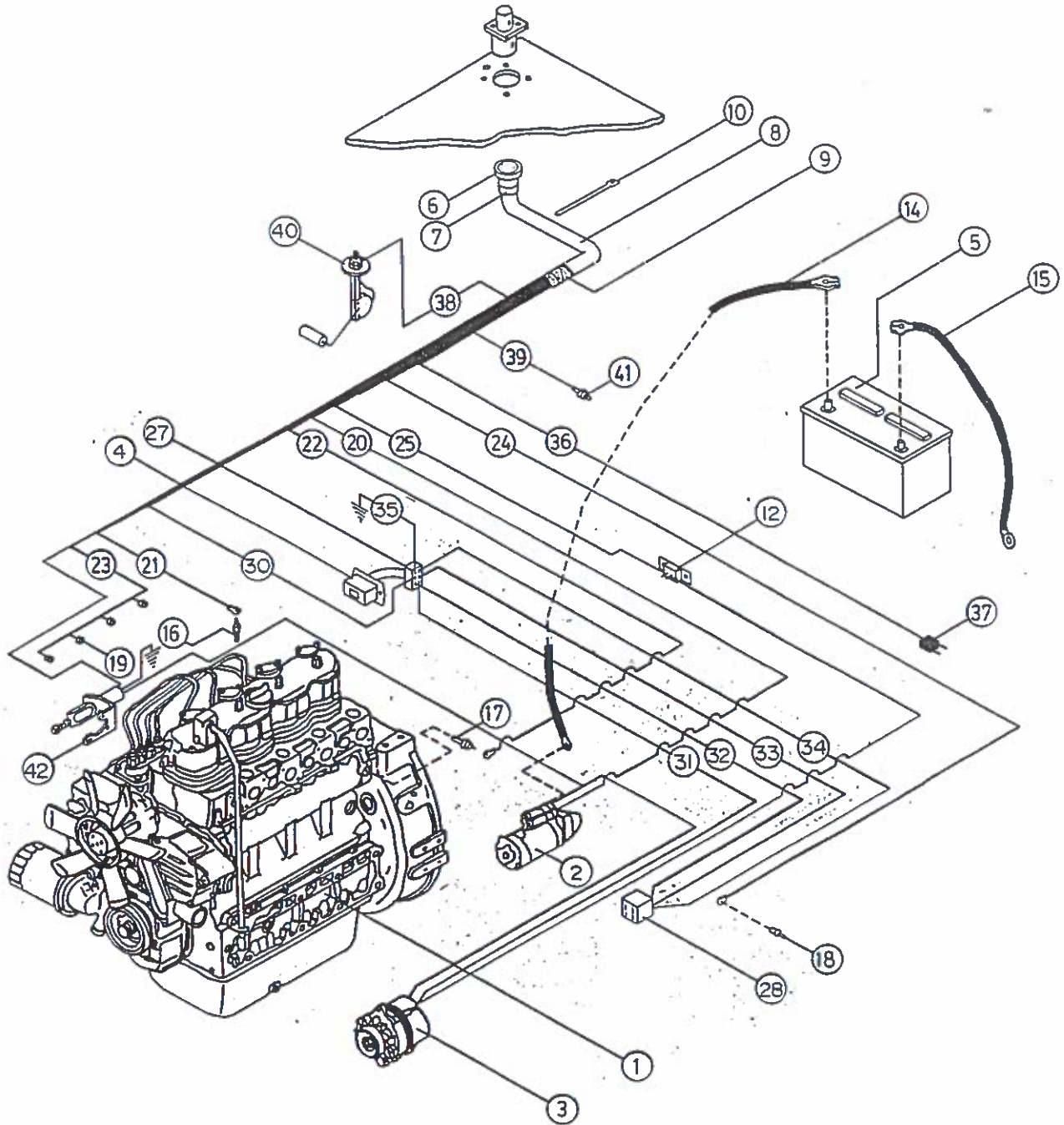
6-1

Item No.	Part No.	Description	Qty.
1	117001	Engine	1
2	115942	Alternator	1
3	117023	Regulator, Voltage	1
4	117026	Coil	1
5	117025	Ballast Resistor	1
6	117005	Starter	1
7	179005	Battery, 12 Volt (450 Amp.)	1
8	179136	Plug, Multi-Connector	1
9	179137	Cable Clamp	1
10	511116	Cable Wrap, Corrugated Plastic	1
11	511101	Harness, Wiring, Engine Frame	1
12	179007	Cable Tie	3
13		1
14		1
15	117105	Fuse, 40 Amp. Circuit Breaker	1
16	179077	Cable, Battery Positive (+)	1
17	179024	Cable, Battery Negative (-)	1
18	179033	Sender, Engine Oil Pressure	1
19	179031	Sender, Engine Water Temp.	1
20	179039	Sender, Hydraulic Oil Temperature	1
21	511102	Wire, Fuse to " + " Switch	1
23	511106	Wire, Regulator "S" To Switch "Ign."	1
24	511108	Wire, Regulator "S" To Ballast Resistor	1
25	511110	Wire, Solenoid "S" To Switch "S"	1
26	511112	Wire, Oil Pressure Sender	1
27	511114	Wire, Water Temperature Sender	1
28	511172	Wire, Hydraulic Oil Temperature Sender	1
29	511117	Wire, Ballast Resistor To Coil	1
30	511119	Wire, Solenoid "Ign." To Coil	1
31	511121	Wire, Alternator "Bat." To Starter "Bat."	1
32	511123	Wire, Alternator "Bat." To Regulator "A"	1
33	511125	Wire, Alternator "F" To Regulator "F"	1
34	511127	Wire, Alternator To Regulator (Ground)	1
35	514082	Wire, Back-Up Alarm (Optional)	1
36	179128	Back-Up Alarm (Optional)	2
37	115946	Solenoid, Starter	1
38	179036	Sender, Fuel Level	1
39	117078	Sender, Low Hydraulic Oil Level (Optional)	1
40	514081	Wire, Fuel Level	1
41	514020	Wire, Low Hydraulic Oil Level (Optional)	1



INSTRUMENT PANEL - GAS ENGINE

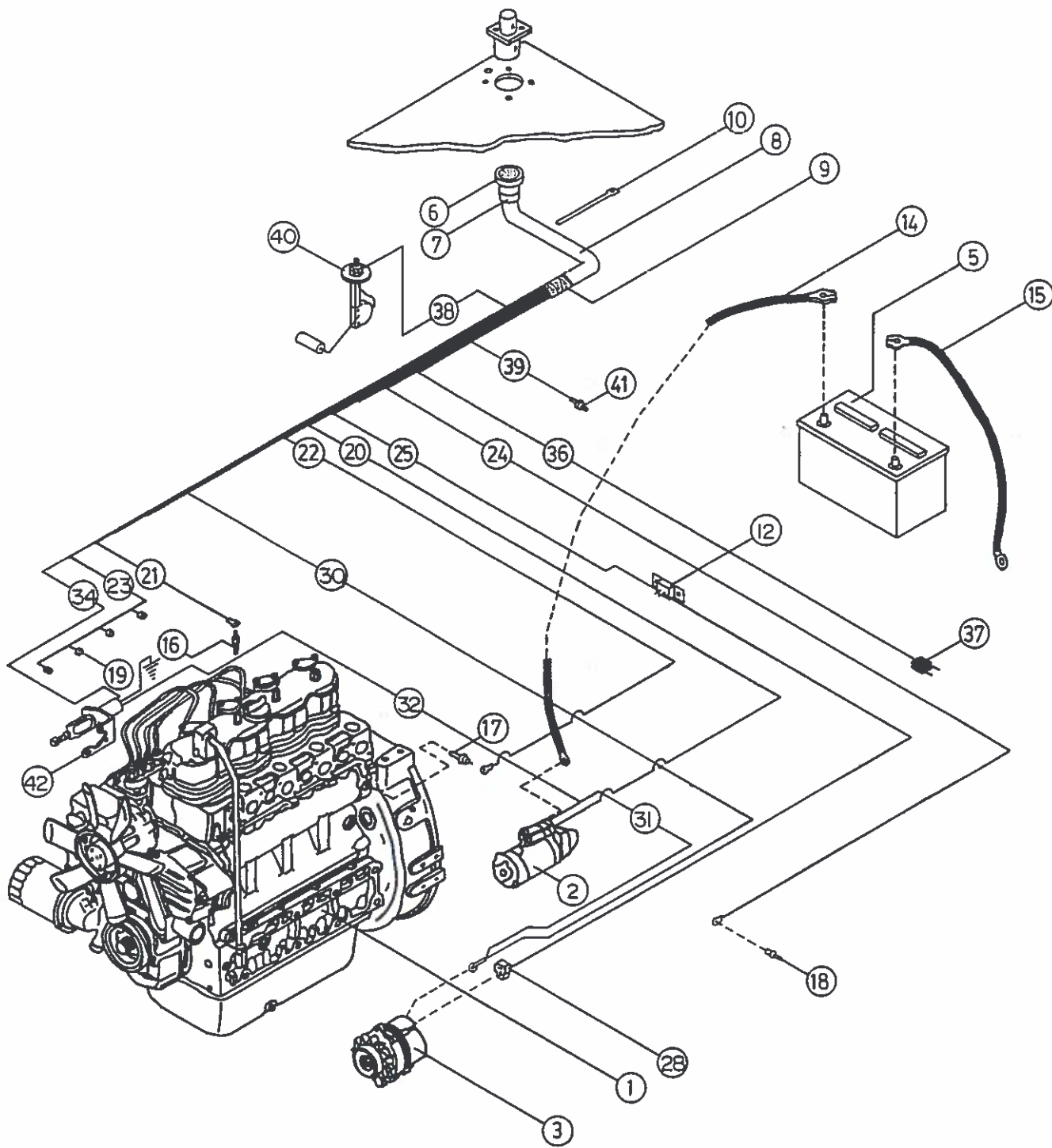
Item No.	Part No.	Description	Qty.
1	510485	Instrument Panel	1
2	179026	Fuse Holder, Panel Mount	1
3	179027	Light Switch	1
5	179029	Ignition Switch	1
7	179030	Gauge, Hydraulic Oil Temperature	1
8	179032	Gauge, Hour Meter	1
9	179034	Gauge, Volt Meter	1
10	179037	Gauge, Engine Oil Pressure	1
11	179038	Gauge, Engine Water Temperature	1
12	179041	Light Kit	6
13	151110	Plug Button, Nylon	1
14	179035	Gauge, Fuel	1
15	511133	Wiring Harness, Instrument Panel	1
16	511134	Wire, Switch "+"	1
17	511135	Wire, Switch "Ign." - (Blue)	1
18	511137	Wire, Switch "Start" - (Yellow)	1
19	511139	Wire, Oil Pressure - (Brown)	1
20	511141	Wire, Engine Water Temperature - (Green)	1
22	511145	Wire, Hydraulic Oil Temperature - (Black)	1
23	511147	Wire, Light Switch To Rear Light	1
24	511151	Wire, Light Switch To Front Lights - (Black)	2
26	511155	Wire, Switch "Ign." To Fuse	1
27	511157	Wire, Fuse To Gauges "+"	1
30	514145	Wire, Switch "Acc." To Back-Up Alarm (Optional)	1
31	514146	Wire, Fuel Gauge	1
36	179135	Receptacle, Multi-Connector	1
37	179137	Cable Clamp	1
38	511150	Cable Wrap, Corrugated Plastic	1
39	179045	Cable Clamp - (Ductile)	2
40	179007	Cable Tie	1
41	179047	Fuse, 5 Amp. - (Lights and Instruments)	1
43	101923	Bolt, Hex Head - 1/4" x 3/4" - UNC	4
44	102607	Flatwasher - 1/4"	4
45	102588	Lockwasher - 1/4"	4
46	102486	Capscrew, Slotted - No. 4 - UNC	4
47	102605	Lockwasher - No. 4	4
48	102586	Hex Nut - No. 4 - UNC	4
49	179086	Seal Beam, Replacement - (12 Volt)	3



DIESEL ENGINE ELECTRICAL CIRCUIT

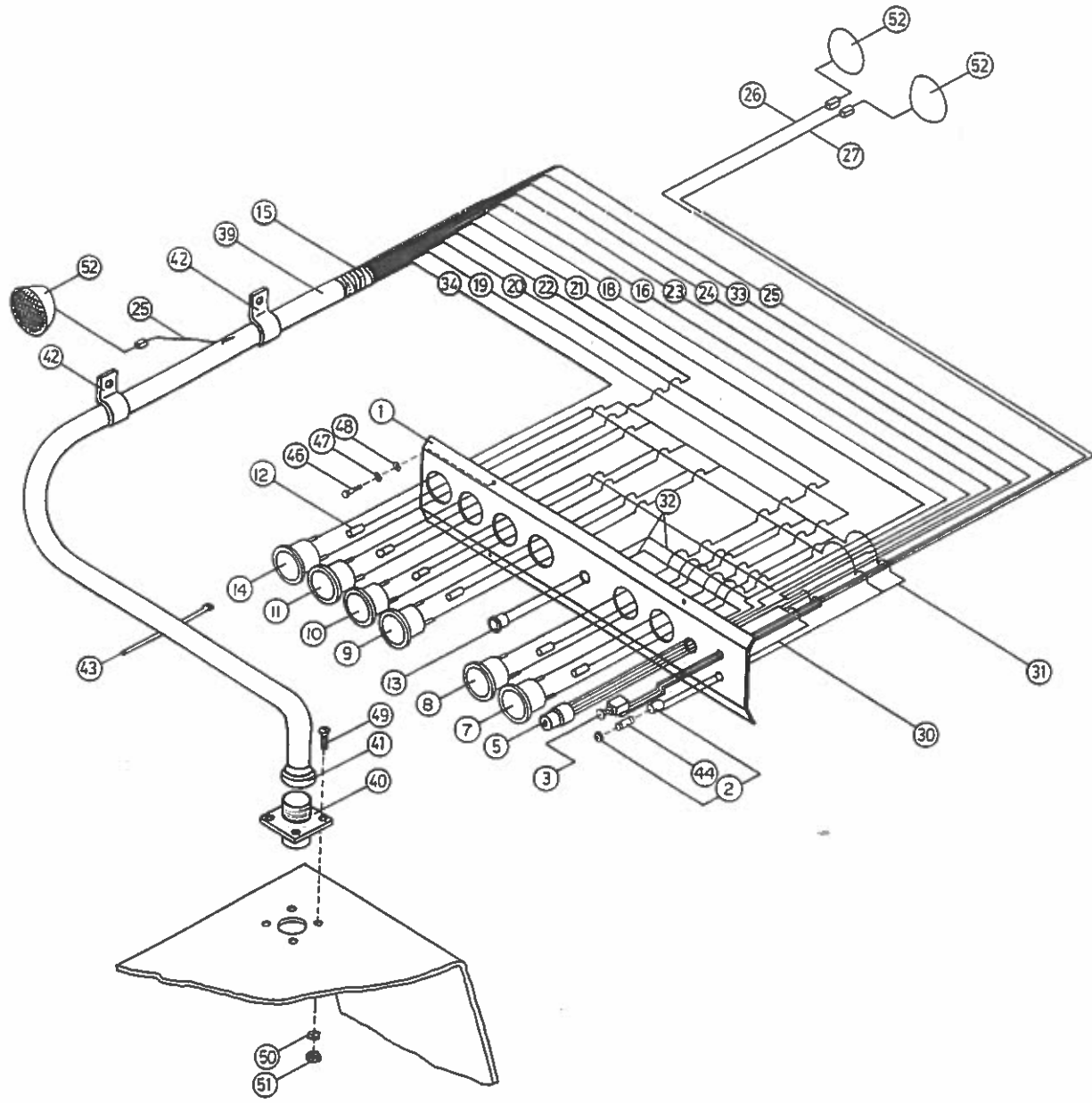
Item No.	Part No.	Description	Qty.
1	117030	Engine	1
2	117044	Starter	1
3	117063	Alternator	1
4	117038	Voltage Regulator	1
5	179005	Battery, 12 Volt (SSD)	1
6	179080	Plug, Multi-Connector	1
7	179082	Cable Clamp	1
8	514076	Cable Wrap, Corrugated Plastic	1
9	514057	Wiring Harness, Engine Frame	1
10	179007	Cable Tie	3
12	117105	40 Amp. Circuit Breaker	1
14	179072	Cable, Battery Positive (+)	1
15	179024	Cable, Battery Negative (-)	1
16	179031	Sender, Engine Water Temperature	1
17	179033	Sender, Engine Oil Pressure	1
18	179039	Sender, Hydraulic Oil Temperature	1
19	117107	Glow Plug	4
20	514060	Wire, "No. 50" Starter to "No. 50" Switch	1
21	514062	Wire, Water Temperature Sender	1
22	514064	Wire, Oil Pressure Sender	1
23	514066	Wire, Glow Plugs to "No. 17" Switch	1
24	514068	Wire, Hydraulic Oil Temperature Sender	1
25	514058	Wire, Fuse to "No. 30" Switch	1
27	179075	Plug, Voltage Regulator	1
28	179076	Plug, Alternator	1
29	514071	Wire, Regulator "W" to "No. 30" Switch	1
30	514072	Wire, Regulator "B/W" to "Acc." Switch	1
31	514075	Wire, Regulator "W" to Alternator "B"	1
32	514073	Wire, Regulator "W/G" to Alternator "F"	1
33	514074	Wire, Regulator "W/B" to Alternator "N"	1
34	514121	Wire, Regulator "B" to Alternator "A"	1
35	514122	Wire, Regulator "B" to Ground	1
36	514082	Wire, Back-Up Alarm (Optional)	1
37	179128	Back-Up Alarm (Optional)	2
38	514081	Wire, Fuel Level Sender To Fuel Gauge	1
39	514120	Wire, Low Hydraulic Oil Level Sender (Optional)	1
40	179036	Sender, Fuel Level	1
41	117078	Sender, Low Hydraulic Oil Level	1
42	117104	Elec. Fuel Shut-Off	1

DIESEL ENGINE ELECTRICAL CIRCUIT WITH ALTERNATOR (INTERNAL REGULATOR)



DIESEL ENGINE ELECTRICAL CIRCUIT WITH ALTERNATOR (INTERNAL REGULATOR)

Item No.	Part No.	Description	Qty.
1	117030	Engine	1
2	117044	Starter	1
3	117108	Alternator (I.C. Reg.)	1
5	179005	Battery 12 Volt - (550)	1
6	179136	Plug, Multi-Connector	1
7	179137	Cable Clamp	1
8	514076	Cable Wrap, Corrugated Plastic	1
9	514057	Wiring Harness, Engine Frame	1
10	179007	Cable Tie	3
12	117105	40 Amp. Circuit Breaker	1
14	179077	Cable, Battery Positive (+)	1
15	179024	Cable, Battery Negative (-)	1
16	179031	Sender, Engine Water Temperature	1
17	179033	Sender, Engine Oil Pressure	1
18	179039	Sender, Hydraulic Oil Temperature	1
19	117107	Glow Plug	4
20	514060	Wire, "No. 50" Starter to "No. 50" Switch	1
21	514062	Wire, Water Temperature Sender	1
22	514064	Wire, Oil Pressure Sender	1
23	514066	Wire, Glow Plugs to "No. 17" Switch	1
24	514068	Wire, Hydraulic Oil Temperature Sender	1
25	514058	Wire, Fuse to "No. 30" Switch	1
27	179075	Plug, Voltage Regulator	1
28	179139	Plug, Alternator	1
30	514072	Wire, Alternator To "Acc." Switch	1
31	514061	Wire, Starter To Alternator	1
32	514063	Wire, Battery To Fuel Solenoid	1
34	514067	Wire, Fuel Solenoid To "Acc." On Ignition Switch	1
36	514082	Wire, Back-Up Alarm (Optional)	1
37	179128	Back-Up Alarm (Optional)	2
38	514081	Wire, Fuel Level Sender To Fuel Gauge	1
39	514120	Wire, Low Hydraulic Oil Level Sender (Optional)	1
40	179036	Sender, Fuel Level	1
41	117078	Sender, Low Hydraulic	1
42	117104	Electric Fuel Shut-Off	1



INSTRUMENT PANEL - DIESEL ENGINE

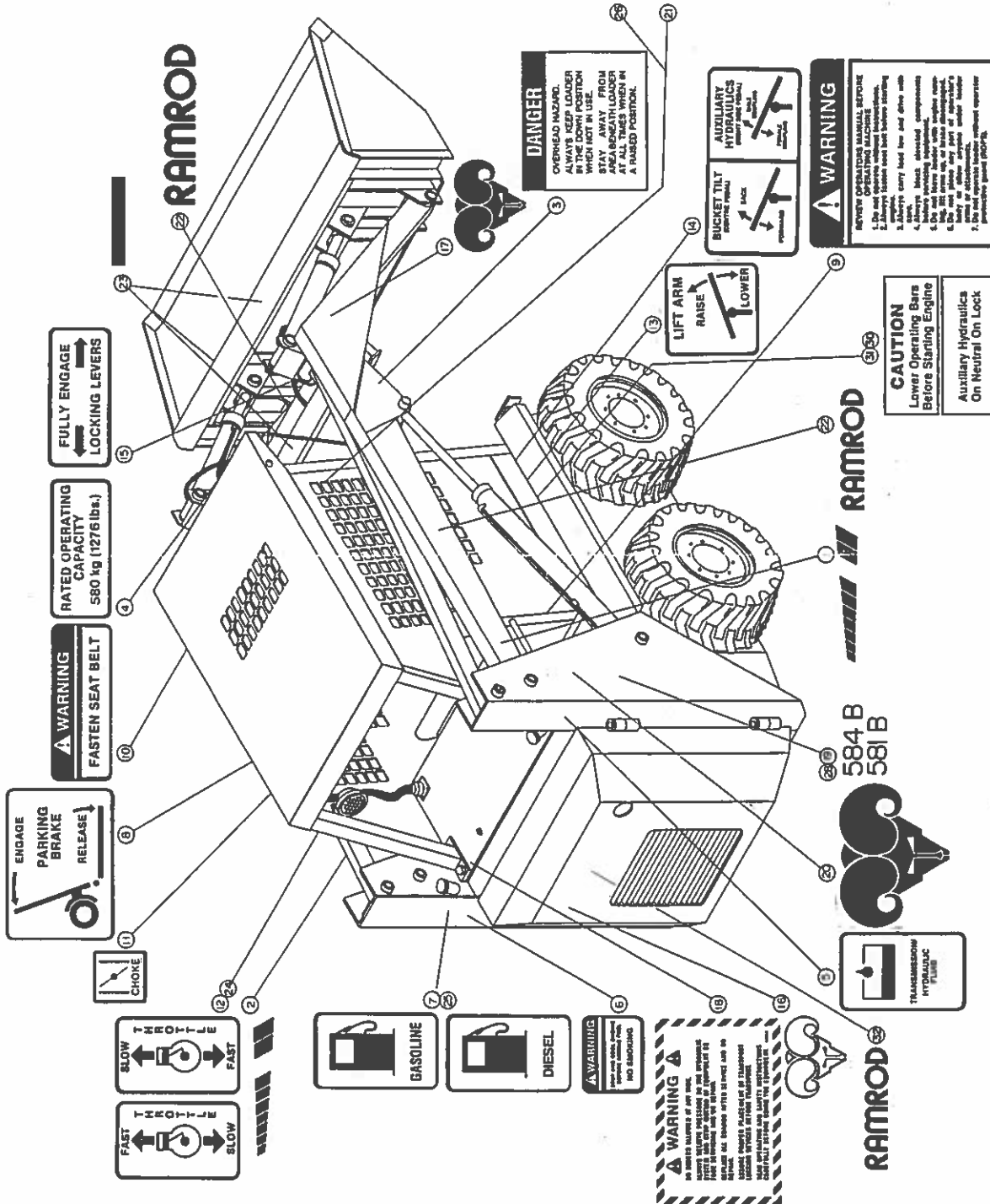
6-5

Item No.	Part No.	Description	Qty.
1	510485	Instrument Panel	1
2	179026	Fuse Holder, Panel Mount	1
3	179027	Light Switch	1
5	179078	Ignition Switch	1
7	179030	Gauge, Engine Water Temperature	1
8	179032	Gauge, Engine Oil Pressure	1
9	179034	Gauge, Volt Meter	1
10	179037	Gauge, Hour Meter	1
11	179038	Gauge, Hydraulic Oil Temperature	1
12	179041	Light Kit	4
13	179079	Glow Lamp	1
14	179035	Gauge, Fuel	2
15	514079	Wiring Harness, Instrument Panel	1
16	514083	Wire, "No. 30" Switch - (Red)	1
18	514087	Wire, "No. 50" Switch - (Yellow)	1
19	514089	Wire, Water Temperature Gauge - (Green)	1
20	514091	Wire, Oil Pressure Gauge - (Brown)	1
21	514093	Wire, "No. 17" Switch - (Brown)	1
22	514095	Wire, Hydraulic Temperature Gauge - (Red)	1
23	514097	Wire, "No. 30" Switch - (White)	1
24	514099	Wire, "Acc." Switch - (Black)	1
25	514101	Wire, Light Switch to Rear Light - (Black)	1
26	514105	Wire, Light Switch to Front Left Light - (Black)	1
27	514107	Wire, Light Switch to Front Right Light - (Black)	1
30	514113	Wire, "Acc." Switch to Fuse - (Black)	1
31	514115	Wire, Center Fuse to Gauges "+ " - (Black)	1
32	514119	Wire, Glow Plug Lamp to "No. 17", "No. 19" Switch - (Black)	2
33	514145	Wire, Switch "Acc." to Back-Up Alarm (Optional)	1
34	514146	Wire, Fuel Gauge	1
39	514103	Cable Wrap, Corrugated Plastic	1
40	179135	Receptacle, Multi-Connector	1
41	179137	Cable Clamp	1
42	179045	Cable Clamp	4
43	179007	Cable Tie	1
44	179047	Fuse, 5 Amp. - (Lights and Instruments)	1
46	101923	Bolt, Hex. Head - 1/4" x 3/4" - UNC	4
47	102607	Flatwasher - 1/4"	4
48	102588	Lockwasher - 1/4"	4
49	102486	Capscrew, Slotted - No. 4 - UNC	4
50	102605	Lockwasher - No. 4	4
51	102586	Hex. Nut - No. 4	4
52	179086	Seal Beam, Replacement	3

SECTION 7 DECALS

DECAL LOCATIONS

Item No.	Part No.	Description	Qty.
1	174063	Decal, Long Black Stripe R.H.	1
2	174064	Decal, Long Black Stripe L.H.	1
3	174106	Decal, Danger — Overhead Hazard	2
4	179049	Decal, Operating Capacity — 580 Kg.	1
5	179050	Decal, Transmission/Hydraulic Fluid	1
6	179051	Decal, Warning — No Smoking	1
7	179052	Decal, Gasoline (Gas Only)	1
8	179053	Decal, Park Brake	1
9	179054	Decal, Warning — Operation of Machine	1
10	179055	Decal, Warning — Seat Belt	1
11	179056	Decal, Choke — (Gas Only)	1
12	179057	Decal, Throttle — (Gas Only)	1
13	179059	Decal, Lift Arm	1
14	179060	Decal, Tilt & Auxiliary	1
15	179061	Decal, Lock Levers	1
16	179062	Decal, Ram Head (White)	1
17	179067	Decal, Ram Head (Small, Black)	2
18	179064	Decal, Warning — No Riders	2
19	179065	Decal, 581B (Gas Only)	1
20	179063	Decal, Ram Head (Large, Black)	2
21	179068	Decal, Starting Procedure — Diesel	1
22	179069	Decal, Ramrod — (3 1/2" High)	3
23	179071	Decal, Pad Non Slip	3
24	179072	Decal, Throttle (Diesel Only)	1
25	179073	Decal, Diesel (Diesel Only)	1
26	179083	Decal, Starting Procedure (Gas Only)	1
28	179150	Decal, 584B	2
30	179117	Decal, Auxiliary Hydraulics	1
31	179118	Decal, Caution (Operating Bars)	1
32	179140	Decal, Ramrod — (2" High, White)	1



STARTING PROCEDURE (GAS ENGINES)

1. Move throttle control (A) to 1/2 way up.
2. Pull out choke (B) to start position.
3. Turn ignition key to start position.
4. Allow engine to start, revolve flywheel for 10 seconds to give enough cranking.
5. Release throttle for proper functioning of engine (revolve during warmup).

SHUT-OFF PROCEDURE

1. Park loader on level ground, and lower bucket.
2. Return throttle control to idle position.
3. Turn ignition key off.

NOTE: Refer to Owner's/Operator's Manual for:

1. Comprehensive Starting and Shut-off Procedure.
2. Periodic Maintenance and Service Schedule.
3. Safe Operation of Loader.

STARTING PROCEDURE (DIESEL ENGINES)

1. Move throttle control slightly down.
2. Turn ignition key CCW to "Pre-Heat" and hold until Pre-Heat indicator turns red.
3. Turn ignition key to start position.
4. Allow engine start, revolve flywheel for 10 seconds to give enough cranking.
5. Release throttle for proper functioning of engine (revolve during warmup).

SHUT-OFF PROCEDURE

1. Park loader on level ground, and lower bucket.
2. Return throttle control to idle position.
3. Turn ignition key off.

NOTE: Refer to Owner's/Operator's Manual for:

1. Comprehensive Starting and Shut-off Procedure.
2. Periodic Maintenance and Service Schedule.
3. Safe Operation of Loader.

FULLY ENGAGE LOCKING LEVERS

RATED OPERATING CAPACITY 580 kg (1276 lbs.)

WARNING FASTEN SEAT BELT

ENGAGE PARKING BRAKE RELEASE

CHOKER

FAST THROTTLE SLOW

SLOW THROTTLE FAST

GASOLINE

DIESEL

WARNING NO SMOKING

WARNING

DO NOT OPERATE THIS MACHINE ON ANY SLOPE EXCEPT THE ONE SPECIFIED IN THE OPERATOR'S MANUAL. EXCESSIVE SLOPING CAN CAUSE THE MACHINE TO TILT BACKWARD OR FORWARD, WHICH MAY CAUSE THE OPERATOR TO BE EJECTED FROM THE MACHINE.

DANGER OVERHEAD HAZARD ALWAYS KEEP LOADER IN THE DOWN POSITION WHEN NOT IN USE. STAY AWAY FROM THE OPERATING AREA AT ALL TIMES WHEN IN A RAISED POSITION.

AUXILIARY HYDRAULICS

RAISE LOWER

WARNING

REVERSE OPERATOR MANUAL BEFORE:

1. Do not operate without instructions.
2. Always lock seat belt before starting.
3. Always carry load low and drive with bucket back.
4. Always block skid-steer components before leaving equipment.
5. Do not drink alcohol or use drugs before operating.
6. Do not use any part of the machine as a work surface.
7. Do not use any part of the machine as a work surface.
8. Do not use any part of the machine as a work surface.

CAUTION Lower Operating Bars Before Starting Engine

Auxiliary Hydraulics On Neutral On Lock

RAMROD

584 B 581 B



TRANSMISSION HYDRAULIC FLUID

RAMROD

