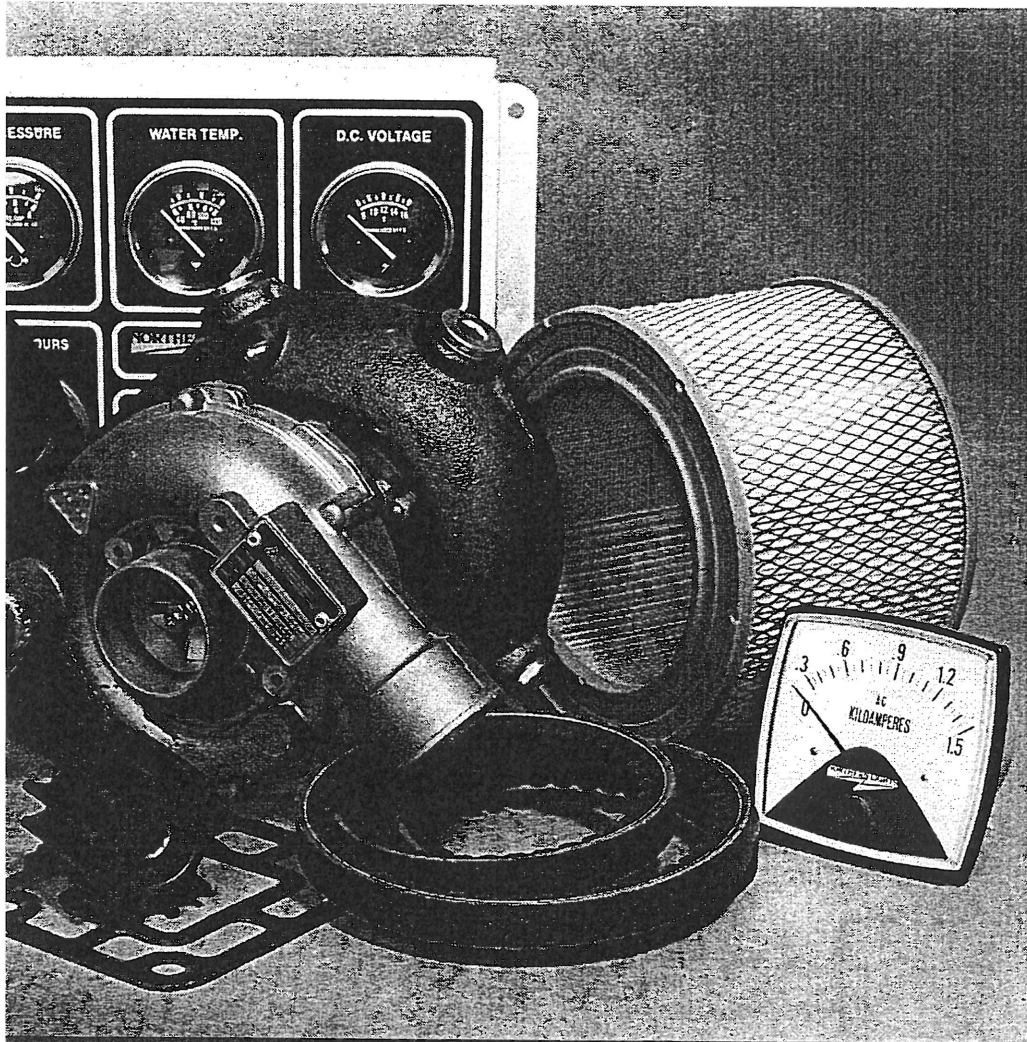


PARTS CATALOG



Model 854 B PARTS MANUAL

TABLE OF CONTENTS

A. INSTRUCTIONS

Please read thoroughly before attempting to use this manual.

Table of Contents and Index Description	1
Model Designation and Serial Numbers	2
Reading a Parts Page	3

B. GROUPING INDEX

GROUP 1 — ENGINE

Cylinder block	0 - 1
Cylinder head	2 - 3
Crankshaft and piston	4 - 5
Camshaft	6
Timing gear	7
Engine oil pump	8

GROUP 2 — INTAKE AND EXHAUST SYSTEM

Exhaust manifold and Exhaust adapter kit	1
Intake manifold, industrial	2
Air cleaner, industrial	3

GROUP 3 — COOLING SYSTEM

Expansion tank and Thermostat housing marine	0 - 1
Standard radiator kit, industrial	2
Radiator kit, high ambient, industrial	3
Heat exchanger and seawater pump	4 - 5
Seawater pump assembly, Early style	6
Seawater pump assembly, Recent style	7
Circulating water pump, marine	8
Circulating water pump, industrial	9
Thermostat,, industrial	10

GROUP 4 — FUEL SYSTEM

Injection Pump	1
Injector assembly	2 - 3
Injection pump assembly	4 - 5
Fuel system kit, marine	6
Fuel system kit, industrial	7
Pull solenoid and linkage	8

GROUP 5 — ELECTRICAL SYSTEM

Starting motor assembly	1
Alternator assembly, built in regulator	2
Alternator assembly	3
Alternator attaching kit	4
Series 3 and 4 electric kit	5

GROUP 6 — GASKET SETS

Gasket set, industrial	0
Gasket set, marine	1

GROUP 8 — FRAME AND MOUNTING

Airmount frame kit, L360, L361, Lima generator, marine	1
Airmount base frame kit, aluminum	2
Frame mount kit, PXG 301/L280/T7-357C, plate form mounts	3
Battery rack assembly, industrial	4
Series 3 control panel mount, industrial	5

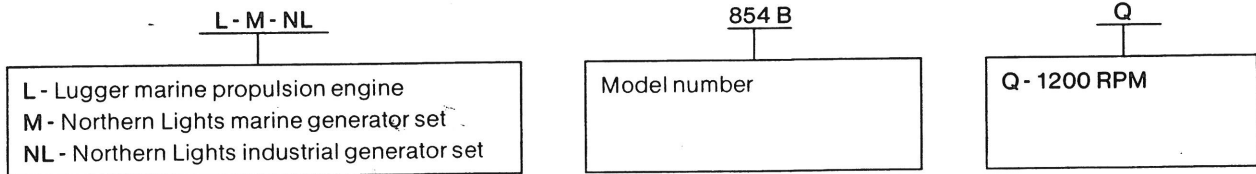
GROUP 9 — ACCESSORIES AND OPTIONAL EQUIPMENT

Series 1 control panel,, Series 1 control panel, recent style,, marine	1
Series 3 control panel, marine and industrial	2
Series 4 control panel, marine and industrial	3
Series 3 flush mount panel kit	4
Crankcase vent filter kit	5
Belt guard kit, marine	6

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MODEL DESIGNATION

Refer to the category designations below to find the correct parts pages for your model.



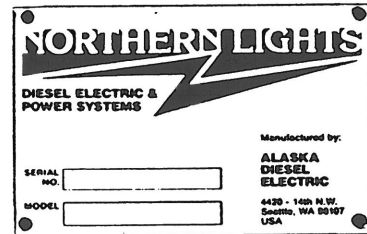
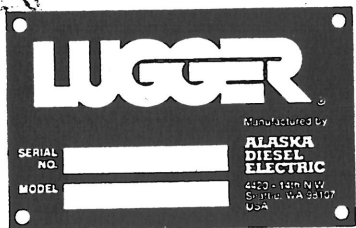
L 854 B	Lugger naturally aspirated marine propulsion engine.
M 854 B	Northern Lights naturally aspirated 1800 RPM marine diesel generator set.
M 854 B, Q	Northern Lights naturally aspirated 1200 RPM marine diesel generator set.
NL 854 B	Northern Lights naturally aspirated 1800 RPM industrial diesel generator set.

SERIAL NUMBERS

To reference Alaska Diesel Electric equipment by serial number, refer only to the Lugger or Northern Lights serial number:

Lugger serial number plates on flywheel housing

Northern Lights plates on flywheel housing or generator.

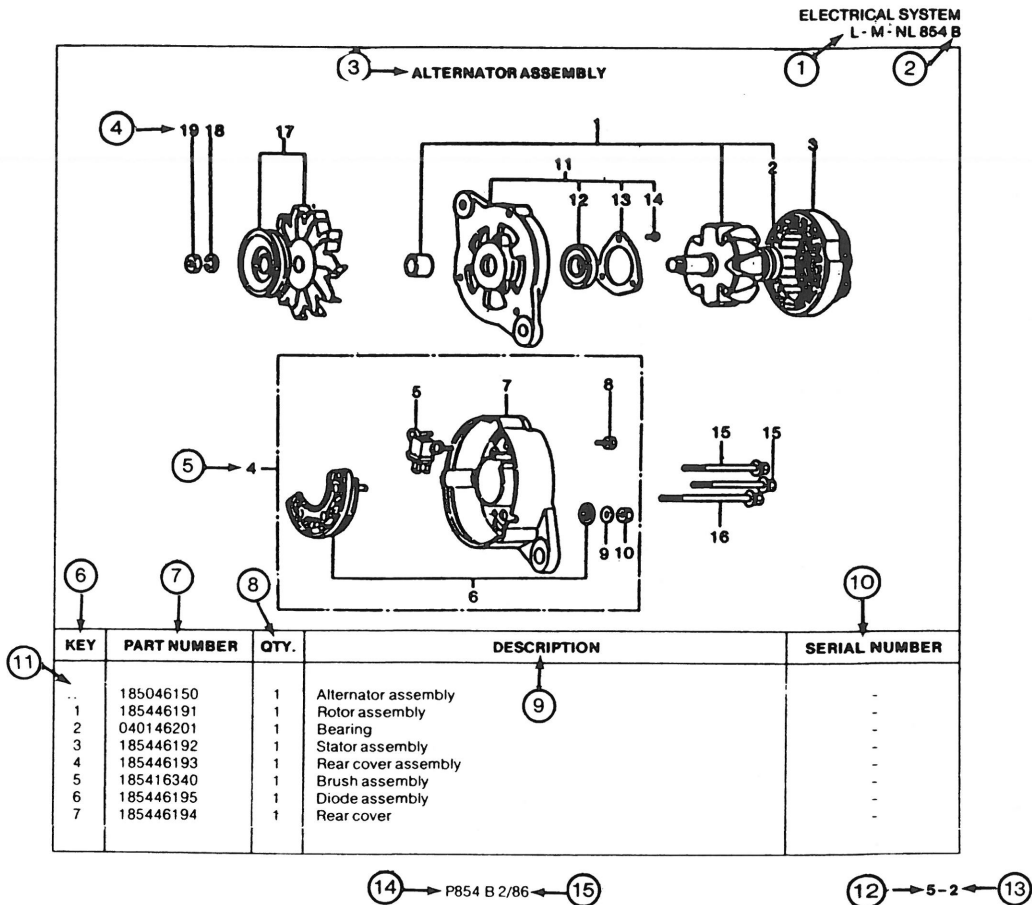


Alaska Diesel Electric includes the serial number of the Lugger and Northern Lights packages (and major components installed) on the Warranty Registration found in the Warranty section of each Operator's Manual supplied with each unit.

PARTS PAGE

IMPORTANT:

Before selecting parts be sure you are selecting parts from the correct parts page.

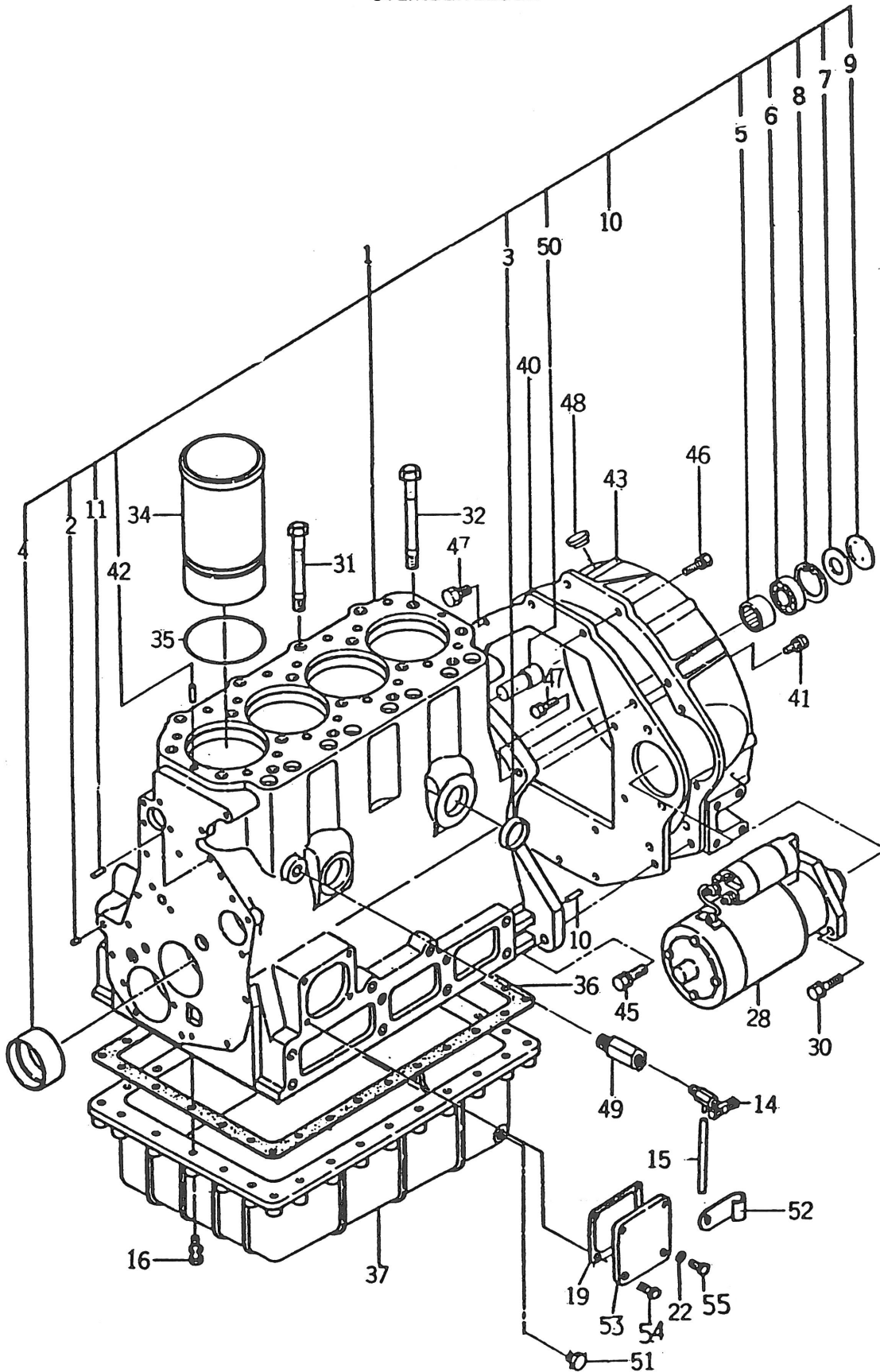


REFERENCES:

- Equipment models using the parts listed on this page. (See Model Designation).
- Equipment and model types that use parts listed on this page.
- Title and description of assembly.
- Drawing numbers that correspond to key column numbers for parts identification.
- Assembly drawing and/or explosion.
- Key column to locate parts from drawing.
- Identifies part number to order.
- Quantity of parts to order.
- Description of each component part.
- Serial number that applies to the part number.
(-) applies to all units up to and including this serial number.
(XXXXXX -) from unknown serial number.
(- XXXXXX) up to unknown serial number.
- Shown as Kit, Complete Kit or Assembly. Includes all keys listed here.
- Grouping index number.
- Page number within the grouping index.
- Model identification number.
- Manual publication date.

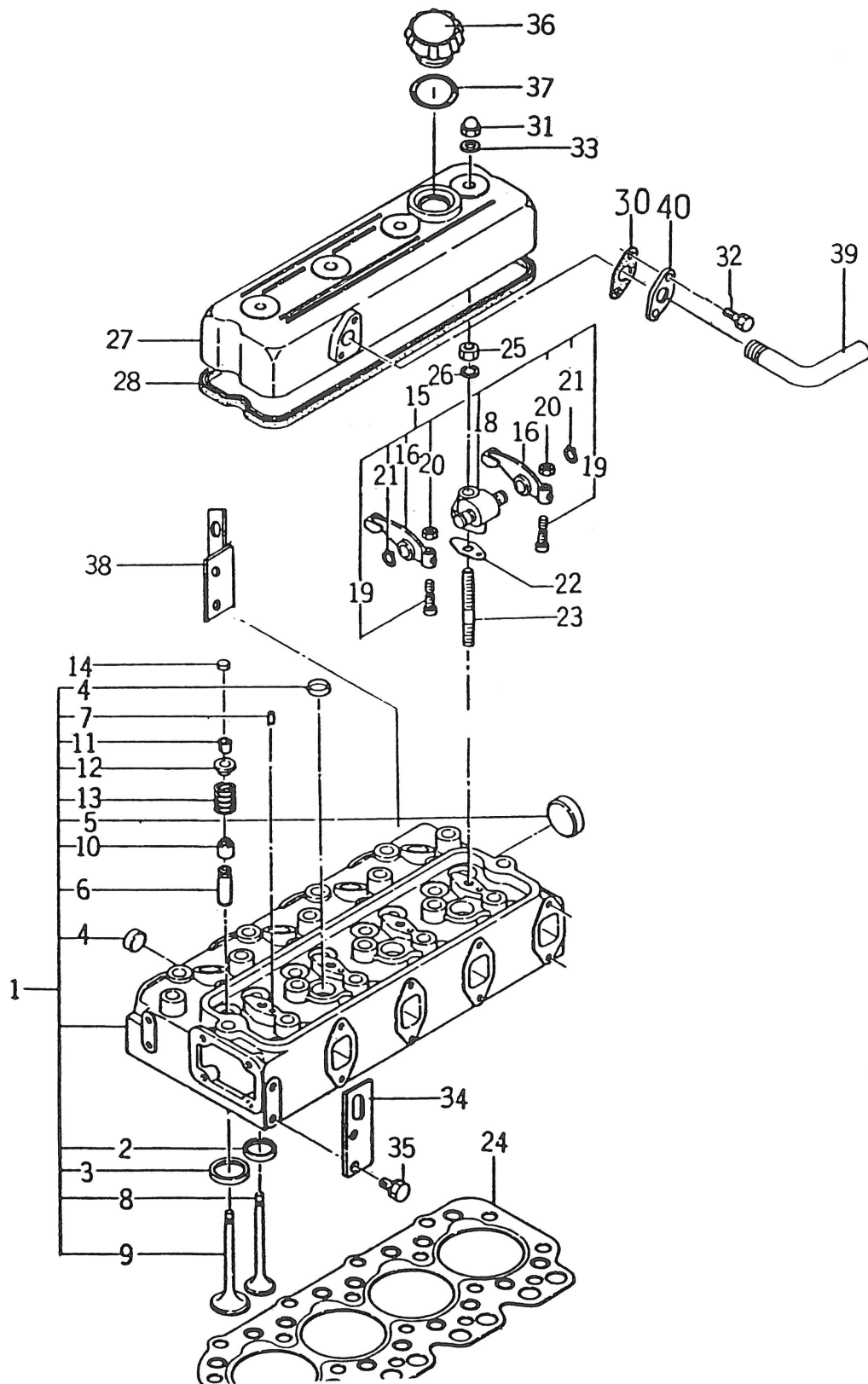
NOTE: ← Arrows always point to the front of the engine.

CYLINDER BLOCK



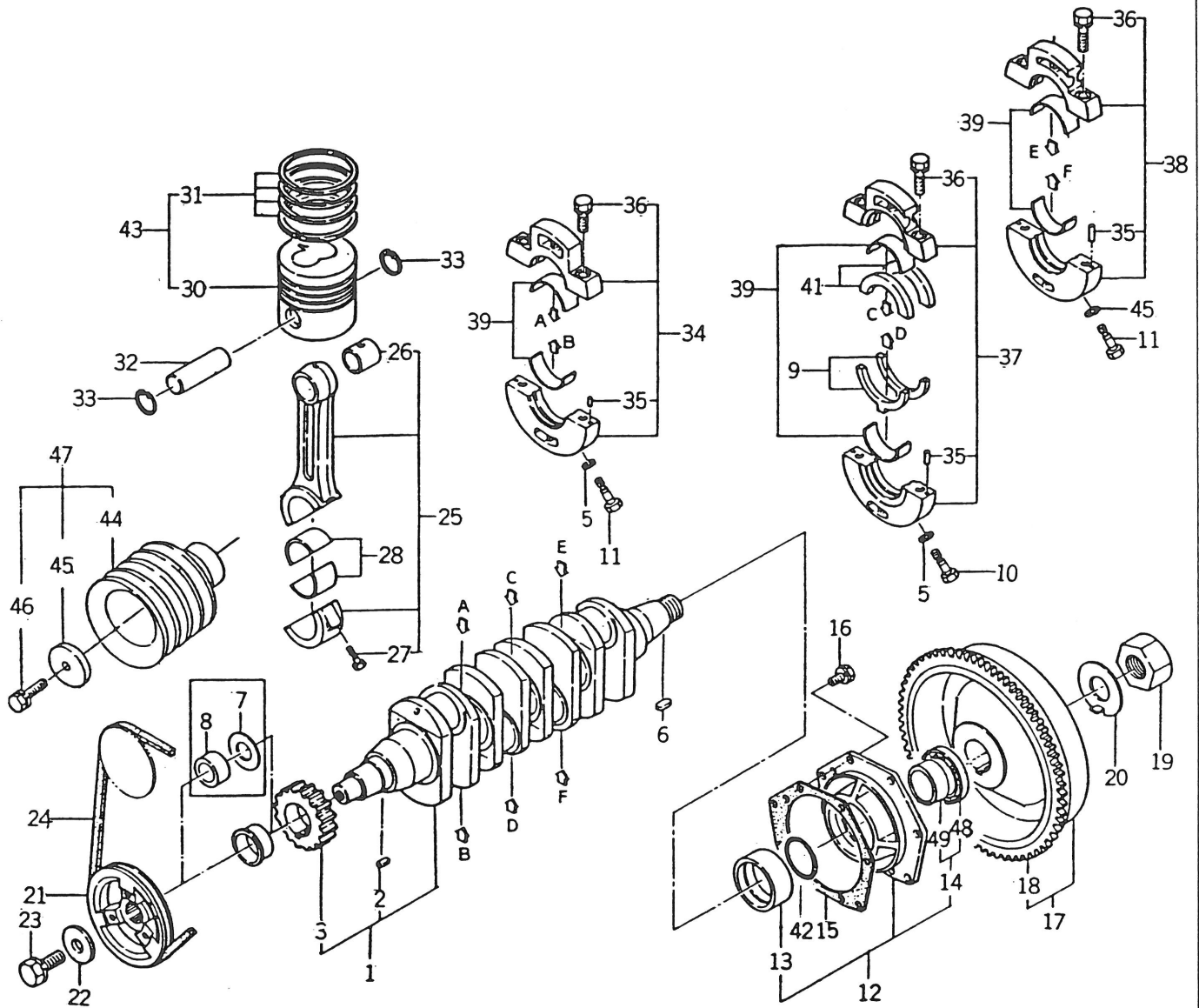
CYLINDER BLOCK				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	110106910	1	Cylinder block, complete (blue)	-
1	110106950	1	Cylinder block, complete (white)	-
2	198466010	7	Blank plug	-
3	064200040	4	Sealing cap	-
4	198516050	1	Bushing, std	-
4	198516460	1	Bushing, undersize 0.25mm	-
4	198516470	1	Bushing, undersize 0.50mm	-
5	042309007	1	Bearing	-
6	040106204	1	Bearing	-
7	199216080	1	Spacer	-
8	036500047	1	Snap ring	-
9	064100047	1	Expansion plug	-
10	030501025	2	Dowel pin	-
11	030500625	2	Dowel pin	-
14	198736050	1	Drain cock	-
15	068115315	1	Vinyl tube	-
16	011300835	30	Bolt	-
19	110996150	1	Gasket	-
22	025100008	1	Seal washer	-
28	185086141	1	Starting motor assembly	-
30	011301235	2	Bolt	-
31	111136270	14	Head bolt	-
32	111136280	4	Head bolt	-
34	110126161	4	Cylinder liner	-
35	052109039	8	O-ring	-
36	110996450	1	Gasket	-
37	110716670	1	Oil pan (blue)	-
37	110716362	1	Oil pan (white)	-
40	110366041	1	Rear plate (blue)	-
40	110366370	1	Rear plate (white)	-
41	011301020	8	Bolt	-
42	030309005	2	Spring pin	-
43	110446071	1	Flywheel cover (blue)	-
43	110446410	1	Flywheel cover (white)	-
45	011311240	2	Bolt	-
46	011311030	2	Bolt	-
47	011311040	2	Bolt	-
48	398460091	1	Cap	-
49	198486900	1	Connector	-
50	165466070	1	Idle shaft	-
51	198436130	3	Plug	-
52	199116050	1	Clamp	-
53	165206270	1	Cover (blue)	-
53	165206160	1	Cover (white)	-
54	011300816	3	Bolt	-
55	010100816	1	Bolt	-

CYLINDER HEAD



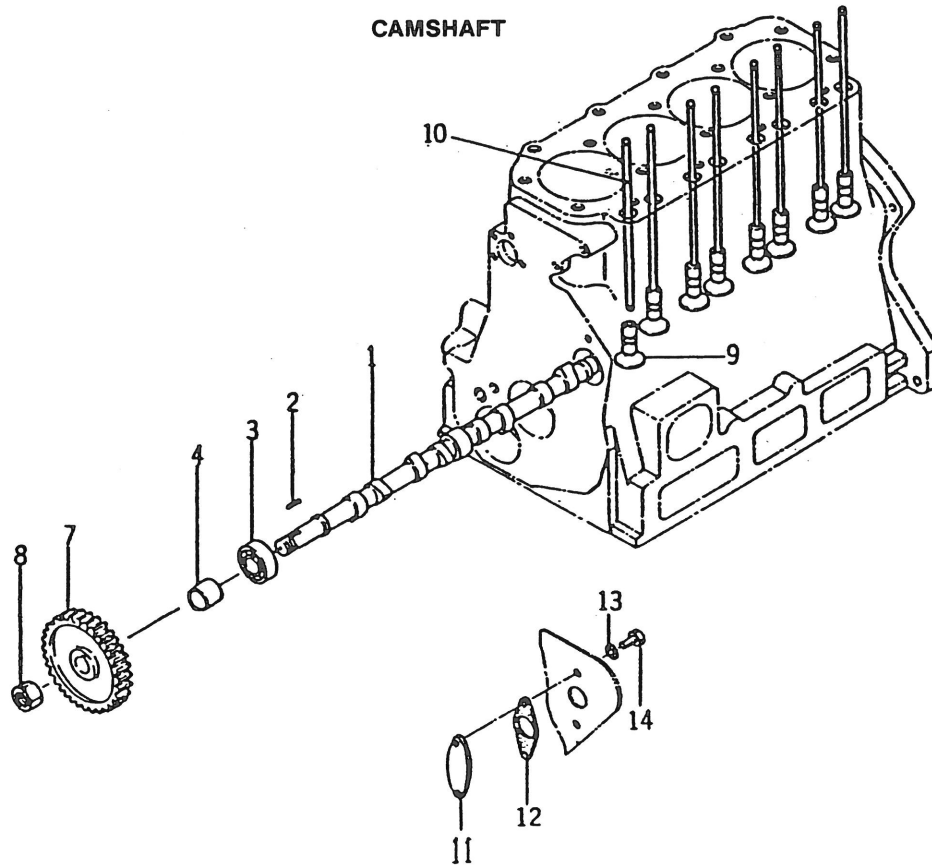
CYLINDER HEAD				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	111016680	1	Cylinder head assembly (blue)	-
1	111016800	1	Cylinder head assembly (white)	-
2	110136082	4	Valve seat; Ex.	-
..	110136087	4	Valve seat; Ex.	-
3	110136072	4	Valve seat; In.	-
..	110136077	4	Valve seat; In.	-
4	064200025	7	Sealing cap	-
5	046200040	1	Sealing cap	-
6	110146062	8	Valve guide	-
7	030300612	4	Spring pin	-
8	120176082	4	Exhaust valve	-
9	120166082	4	Intake valve	-
10	120406040	8	Valve guide seal	-
11	120226010	16	Cotter pin	-
12	120186010	8	Retainer	-
13	198216440	8	Spring	-
14	120216060	8	Cap	-
15	120036260	4	Rocker arm assembly	-
16	120356090	8	Rocker arm complete	-
18	120306011	4	Shaft complete	-
19	199486010	8	Adjust screw	-
20	020100008	8	Nut	-
21	036100014	8	Snap ring	-
22	199286200	a/r	Shim	-
23	012109044	4	Stud bolt	-
24	111146733	1	Head gasket, thickness equals 1.5mm	-
24	111146783	1	Head gasket, thickness equals 1.7mm	-
25	020200010	4	Nut	-
26	027100010	4	Spring washer	-
27	111216370	1	Head cover, rocker arm cover	-
28	111996230	1	Gasket	-
30	110996460	1	Gasket	-
31	024500010	4	Cap nut	-
32	011300825	2	Bolt	-
33	198996070	4	Gasket	-
..	198996071	4	Gasket	-
34	195816100	1	Hanger (blue)	-
34	195816350	1	Hanger (white)	-
35	011311020	4	Bolt	-
36	198436010	1	Cap	-
37	052100400	1	O-ring	-
38	195816380	1	Hanger (NL 854 B)	-
38	195816320	1	Hanger (M 854 B)	-
39	110986470	1	Pipe (blue)	-
39	110986400	1	Pipe (white)	-
40	199666140	1	Flange (blue)	-
40	199666110	1	Flange (white)	-

CRANKSHAFT AND PISTON

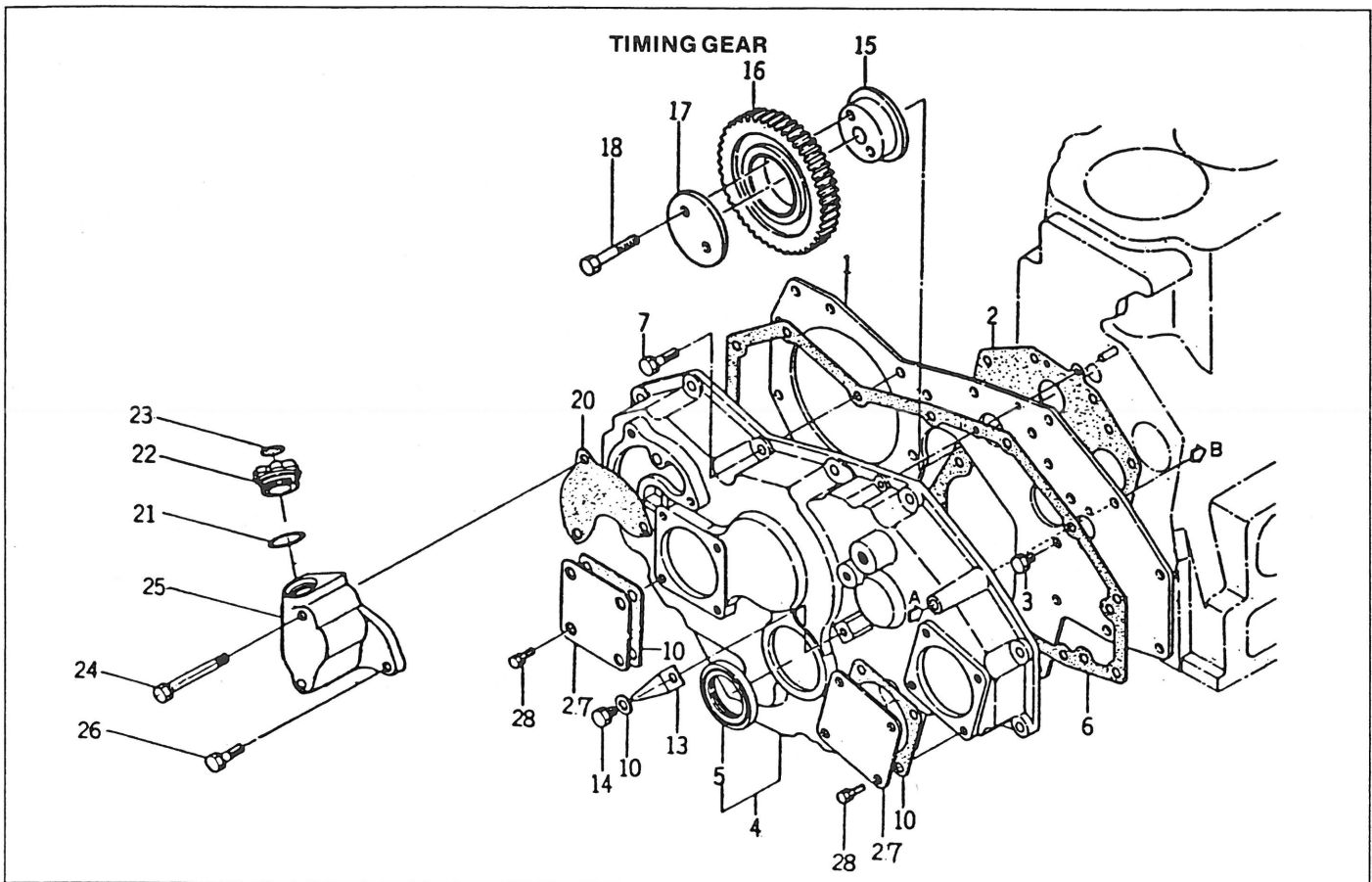


CRANKSHAFT AND PISTON				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	115256520	1	Crankshaft, complete	-
..	115256521	1	Crankshaft, complete	-
2	034109004	1	Woodruff key	-
3	115276090	1	Crankshaft gear	-
5	027100012	3	Spring washer	-
6	034109026	1	Woodruff key	-
7	115416130	1	Oil slinger	-
8	199236410	1	Collar	-
9	199266070	2	Thrust washer	-
10	199436120	1	Bolt	-
11	010111260	2	Bolt	-
12	110406240	1	Bearing cover, complete	-
13	198516050	1	Bushing, standard	-
13	198516460	1	Bushing, undersize 0.25mm	-
13	198516470	1	Bushing, undersize 0.50mm	-
14	198636110	1	Oil seal assembly	-
15	110996421	1	Gasket	-
..	110996422	1	Gasket	-
16	011311025	7	Bolt	-
17	115356312	1	Flywheel, complete	- 13500
..	115356313	1	Flywheel, complete	13545-
18	115376020	1	Ring gear	-
19	199376031	1	Nut	-
20	199316021	1	Lock washer	-
21	115396390	1	Crankshaft pulley (blue)	-
..	115396670	1	Crankshaft pulley (white)	-
22	026109032	1	Washer	-
23	011311225	1	Bolt	-
24	080109023	1	V-belt (NL 854 B)	-
24	080109027	1	V-belt (M 854 B)	-
25	115026021	4	Connecting rod assembly	-
26	198516020	4	Bushing	-
27	115176032	8	Connecting rod bolt	-
28	198516091	8	Bearing, standard	-
..	198516480	8	Bearing, undersize, 0.25mm	-
28	198516490	8	Bearing, undersize 0.50mm	-
30	115317390	4	Piston, standard	-
31	115106821	4	Ring kit, standard	-
32	115326071	4	Piston pin	-
33	036500032	8	Snap ring	-
34	110156040	1	Holder assembly	-
..	110156041	1	Holder assembly	-
35	030500612	6	Dowel pin	-
36	011311245	6	Bolt	-
37	110156020	1	Holder assembly	-
..	110156021	1	Holder assembly	-
38	110156010	1	Holder assembly	-
..	110156011	1	Holder assembly	-
39	198516770	3	Bearing, standard	-
39	198516780	3	Bearing, undersize 0.25mm	-
39	198516790	3	Bearing, undersize 0.50mm	-
41	199266060	2	Thrust washer	-
42	052100501	1	O-ring	-
43	115016580	1	Piston assembly	-
44	115396340	1	4 groove pulley	-
45	026109044	1	Washer	-
46	011311225	1	Bolt	-
47	115796020	1	4 groove pulley kit	-
48	050209062	1	Oil seal	-
49	140436040	1	Sleeve	-

CAMSHAFT

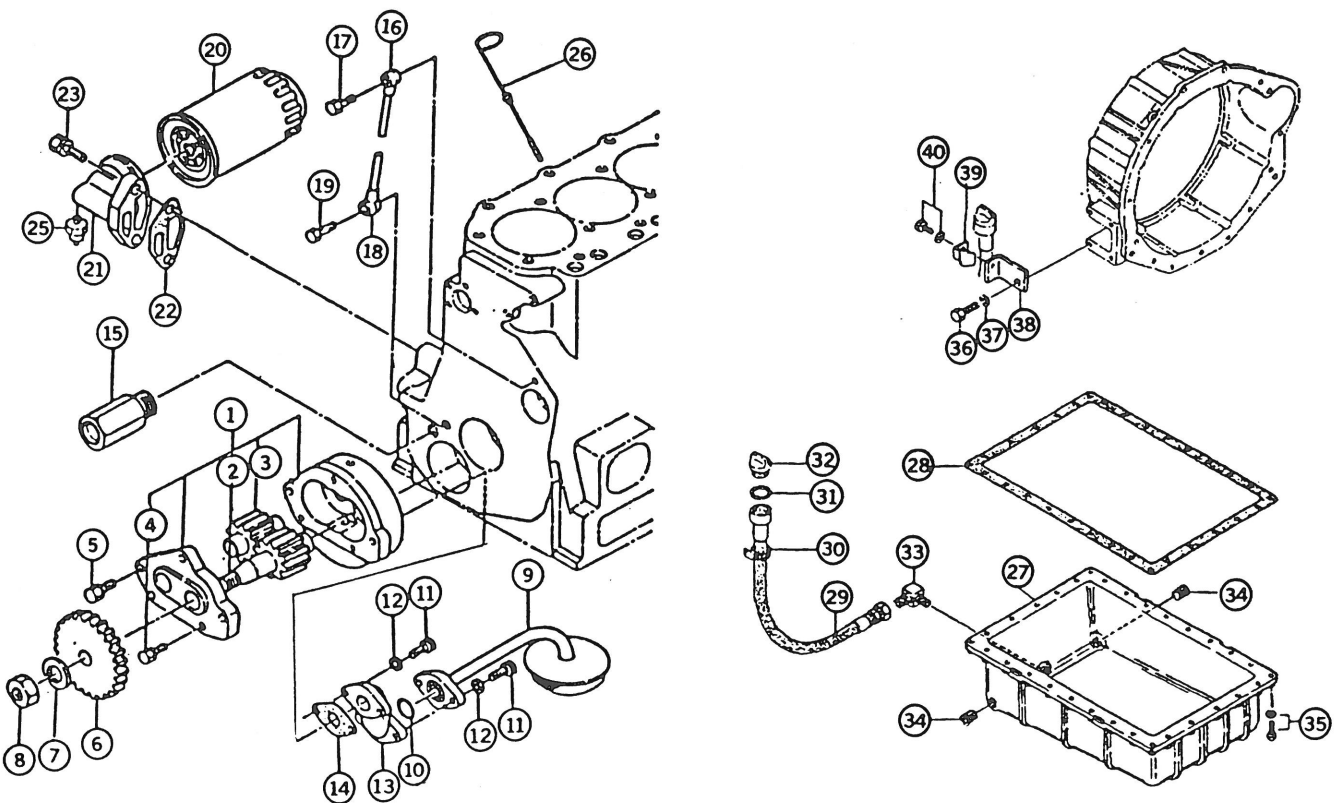


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	120266280	1	Camshaft	-
2	034109005	1	Woodruff key	-
3	040106204	1	Bearing	-
4	199236020	1	Collar	-
7	120276020	1	Camshaft gear	-
8	020400020	1	Nut	-
9	120116070	8	Tappet	-
10	120456020	8	Push rod, complete	-
11	165206230	1	Cover (blue)	-
11	165206310	1	Cover (white)	-
12	120996010	1	Gasket	-
13	198996020	2	Gasket	-
14	010100612	2	Bolt	-



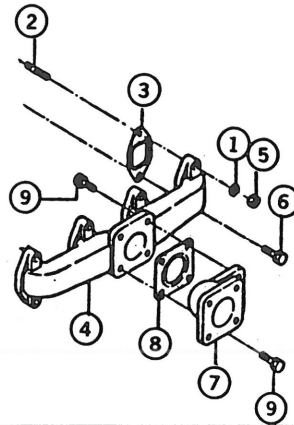
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	165156140	1	Front plate, complete (blue)	-
1	165156210	1	Front plate, complete (white)	-
2	165996032	1	Gasket	-
4	165016240	1	Gear case assembly (blue)	-
..	165016380	1	Gear case assembly (white)	-
5	198636040	1	Oil seal	-
6	165996290	1	Gasket	-
7	011300828	14	Bolt	-
10	165996050	1	Gasket	-
13	131806010	1	Top mark	-
14	011300812	1	Bolt	-
15	165296021	1	Idler gear shaft	-
16	165266021	1	Idler gear	-
17	199566010	1	Plate	-
18	010110865	2	Bolt	-
20	165996370	1	Gasket	-
21	052100400	1	O-ring	-
22	198436010	1	Cap	-
23	190196610	1	Caution plate	-
24	011300870	2	Bolt	-
25	110766150	1	Holder	-
26	011300825	1	Bolt	-
27	165206150	2	Cover (blue)	-
..	165206320	2	Cover (white)	-
28	011300816	8	Bolt	-

ENGINE OIL PUMP



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	140016090	1	Oil pump assembly	-
2	140126170	1	Oil pump gear	-
3	140126160	1	Oil pump gear	-
4	011140616	3	Bolt	-
5	011300828	2	Bolt	-
6	140126062	1	Oil pump gear	-
7	027100010	1	Spring washer	-
8	020200010	1	Nut	-
9	140406240	1	Suction filter, complete	-
10	052100180	1	O-ring	-
11	010700620	4	Bolt	-
12	027100006	4	Spring washer	-
13	140426041	1	Filter holder	-
14	140996040	1	Gasket	-
15	140036100	1	Relief valve assembly	-
16	140606030	1	Oil pipe, complete	-
17	198486070	1	Eye bolt	-
18	140606020	1	Oil pipe, complete	-
19	198486080	1	Eye bolt	-
20	140516090	1	Oil filter, complete	-
21	140526080	1	Holder, complete	-
22	140996090	1	Gasket	-
23	011301035	2	Bolt	-
25	185246011	1	Oil pressure unit	-
26	198416250	1	Oil dipstick	-
27	110716362	1	Oil pan	-
28	110996450	1	Gasket	-
29	120606740	1	Drain hose	-
30	198156200	1	Band	-
31	054109013	1	Gasket	-
32	378430080	1	Cap	-
33	135806060	1	Elbow	-
34	198436130	1	Plug	-
35	011300835	30	Bolt	-
36	119436350	1	Bolt	-
37	027100010	1	Spring washer	-
38	130976310	1	Stay	-
39	140976040	1	Stay	-
40	011300812	1	Bolt	-

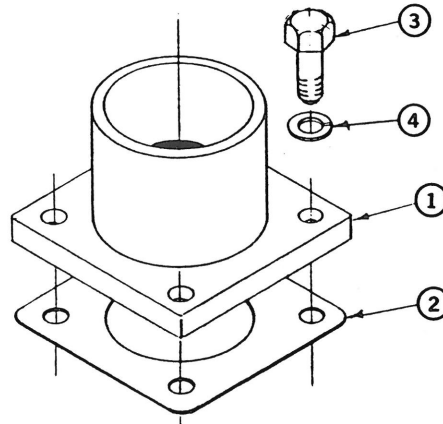
EXHAUST MANIFOLD



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	027100008	4	Spring washer	-
2	012110830	4	Stud bolt	-
3	135996280	4	Gasket	-
4	135616390	4	Exhaust manifold	-
5	020110008	4	Nut	-
6	011310830	4	Bolt	-
8	314990012	1	Gasket	-
9	011310825	4	Bolt	-

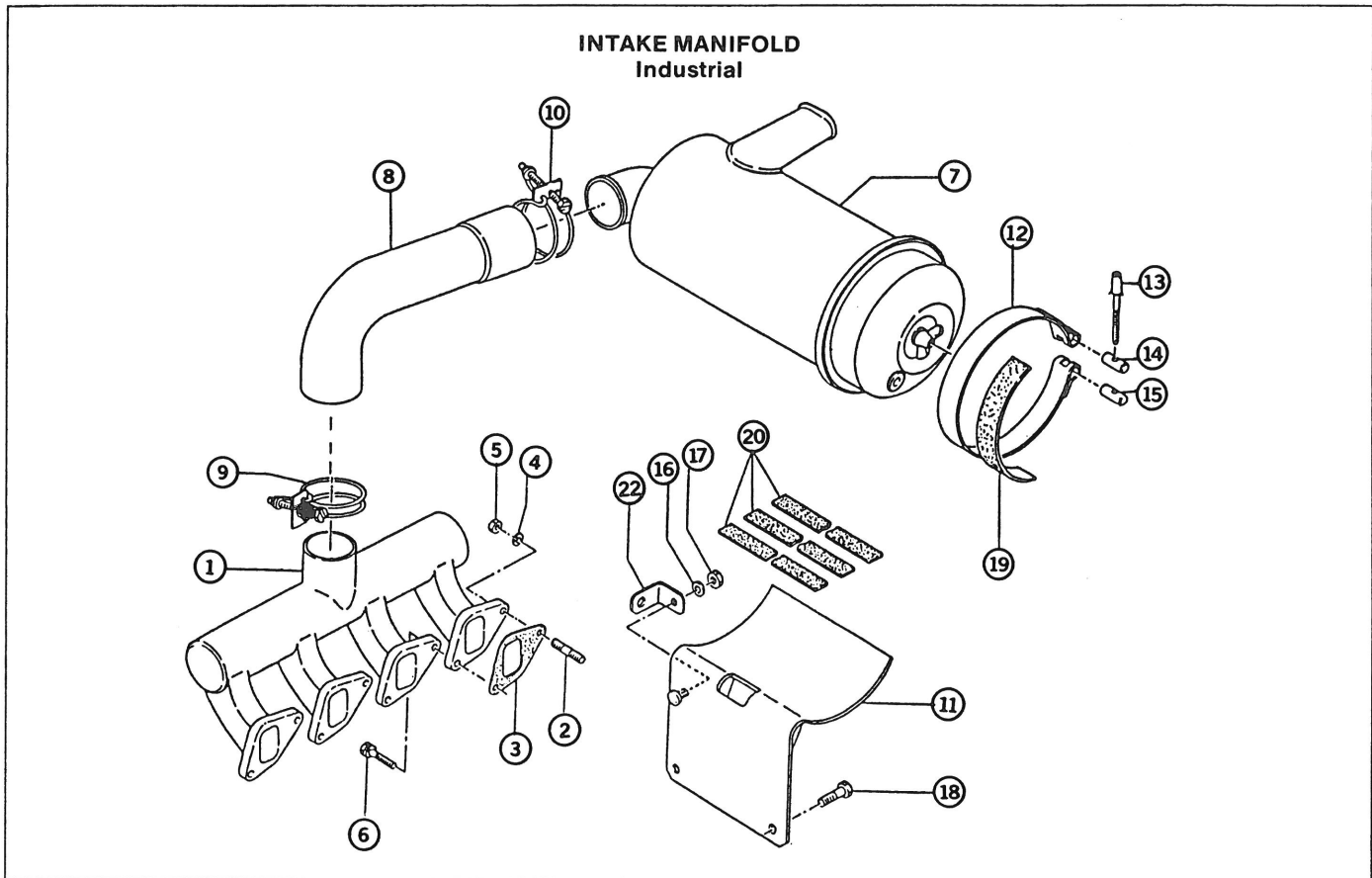
NL 854 B

EXHAUST ADAPTER KIT

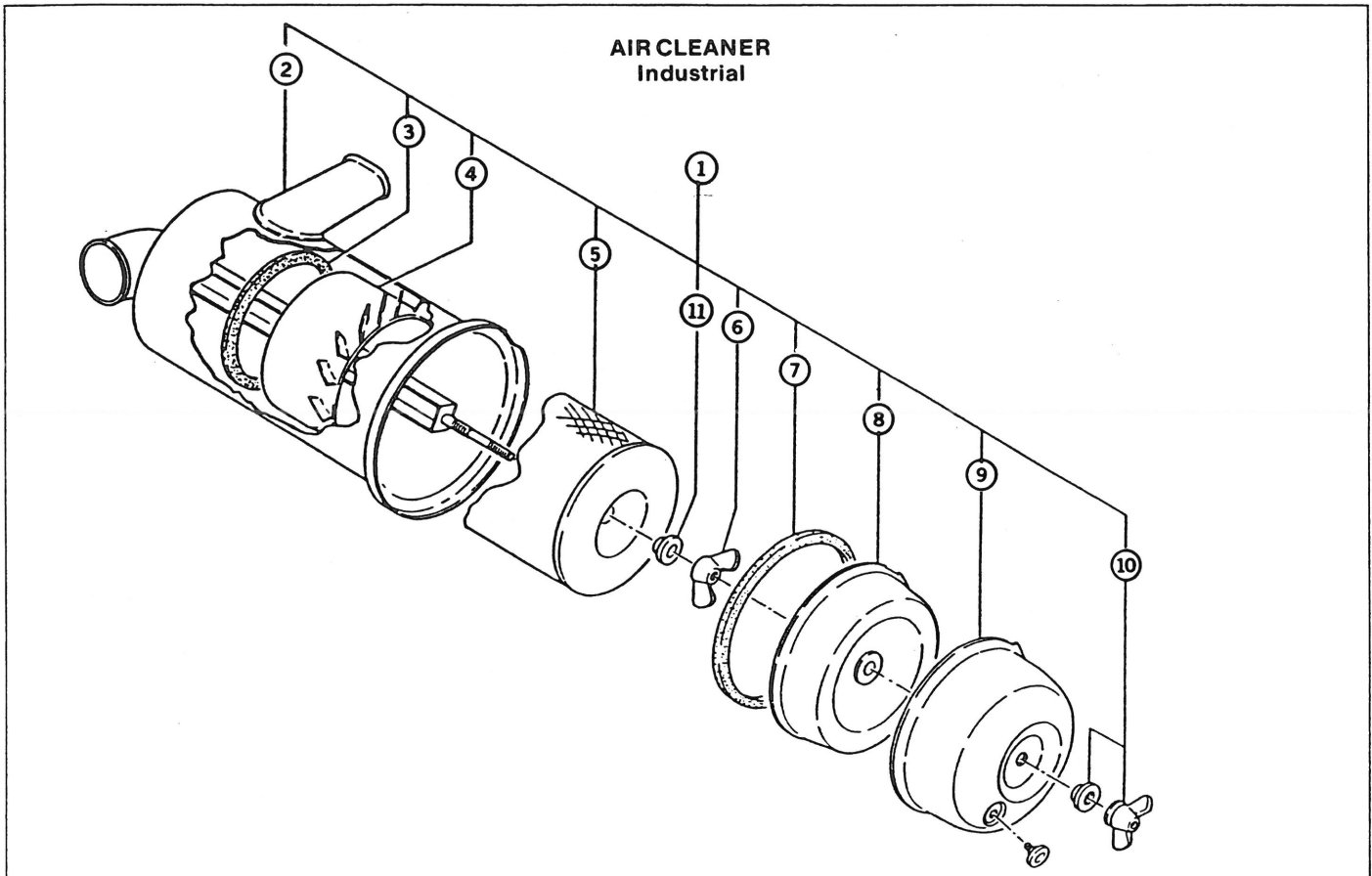


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	31-32200	1	Exhaust adapter	-
2	11-32202	1	Exhaust gasket	-
3	12-00712	4	Cap screw hx. hd. 8mm x 25mm	-
4	15-00702	4	Lock washer 8mm	-

INTAKE AND EXHAUST SYSTEM
NL 854 B

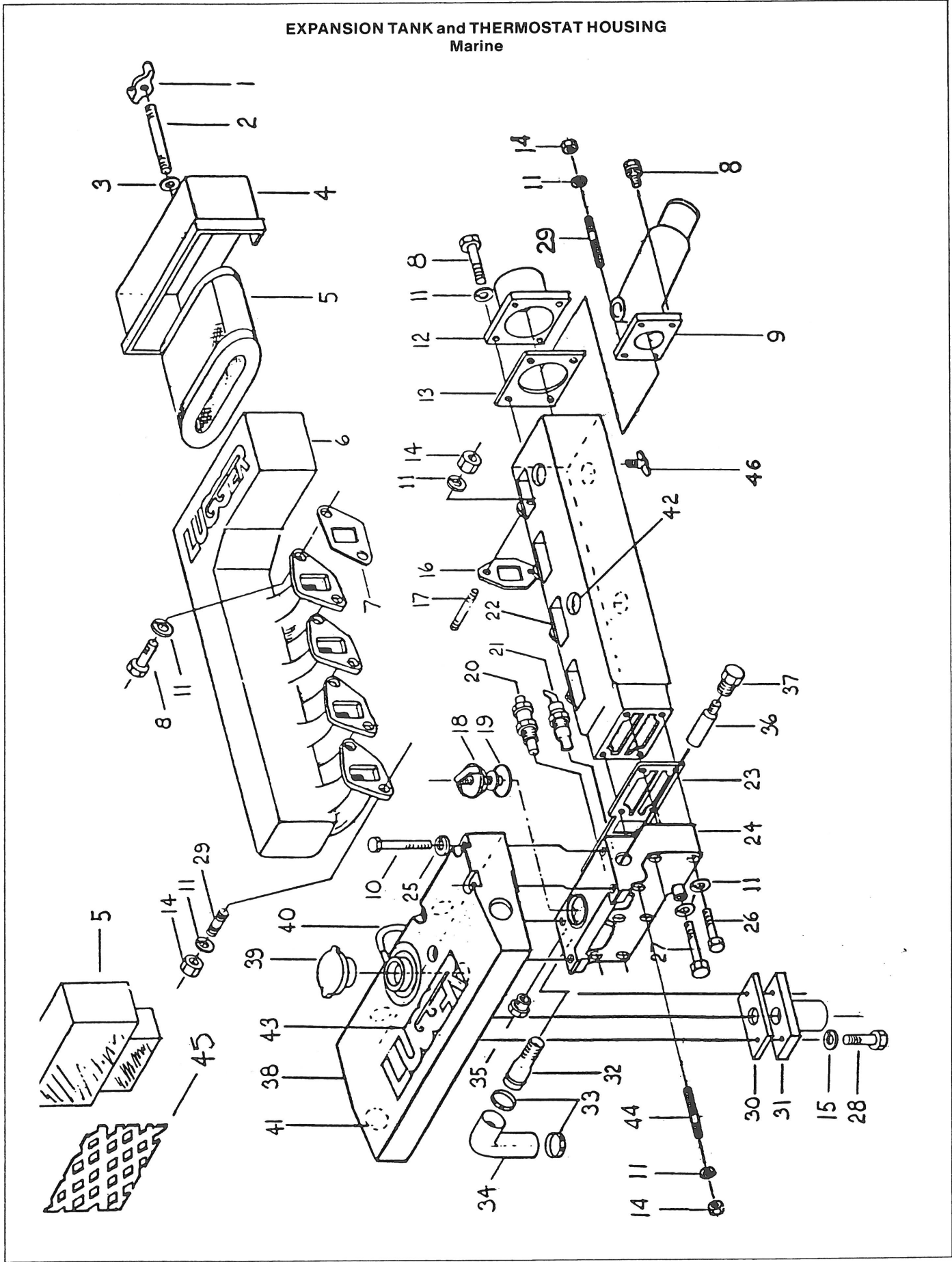


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	135596240	1	Intake manifold	-
2	012110830	8	Stud bolt	-
3	135996270	4	Gasket	-
4	027100008	4	Spring washer	-
5	020100008	4	Nut	-
6	011300825	4	Bolt	-
7	135016170	1	Air cleaner assembly	-
8	135596591	1	Air cleaner hose	-
9	067100075	1	Band	-
10	067100070	1	Band	-
11	135976192	1	Holder	-
12	135866021	1	Band	-
13	399480070	1	Screw	-
14	399610110	1	Pin	-
15	399610100	1	Pin	-
16	026100008	1	Washer	-
17	020100008	1	Nut	-
18	010100825	2	Bolt	-
19	398111740	1	Rubber	-
20	398111040	3	Rubber	-
22	130976190	1	Plate	-



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	135016170	1	Air cleaner assembly	-
2	135326120	1	Cap assembly	-
3	314531023	1	Gasket	-
4	314531024	1	Wing	-
5	314531022	1	Element	-
6	024100008	1	Wing nut	-
7	314531027	1	Gasket	-
8	314531028	1	Cup	-
9	314531029	1	Case assembly	-
10	014531109	1	Wing nut	-
11	314531041	1	Seal washer	-

EXPANSION TANK and THERMOSTAT HOUSING
Marine

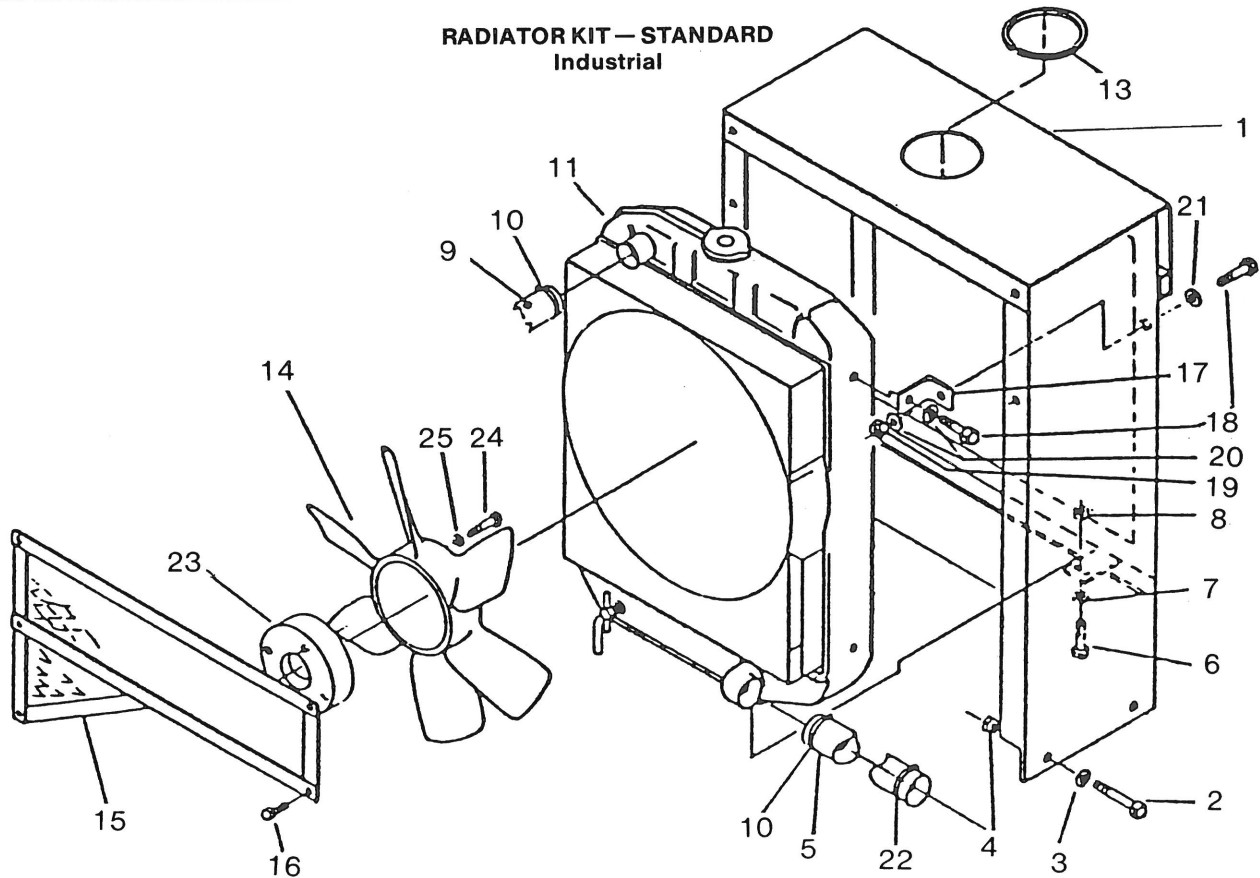


EXPANSION TANK and THERMOSTAT HOUSING — Marine

KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	14-22000	1	Wing nut 1/4"-20 nylock (L- M - NL)	-
2	13-22055	1	Stud 1/4-20 x 7"	-
3	15-00111	1	Flat washer 1/4"	-
4	165366110	1	Intake manifold cover	-
5	24-22006	1	Air filter	-
..	24-22007	1	Air filter with screen	-
6	135596580	1	Intake manifold	-
7	135996270	4	Intake gasket	-
8	011300825	8	Cap screw 8mm x 25mm	-
9	135616232	1	Wet elbow	-
10	010111075	4	Cap screw 10mm x 75mm	-
11	027100008	22	Lock washer 8mm	-
12	27-31921	1	Exhaust adapter	-
13	314990030	1	Exhaust adapter gasket	-
14	020100008	12	Nut 8mm	-
15	15-00202	2	Lock washer 5/16"	-
16	135996280	4	Exhaust gasket	-
17	012110830	8	Stud 8mm x 30mm	-
18	145206050	1	Thermostat 180°F	-
19	145996260	1	Gasket	-
20	385720110	1	Thermo switch	xxxx - 2808 —
..	22-40176	1	Water temperature sender	xxxx - 2809 —
21	22-42225	1	Water temperature switch	-
..	385720070	1	Water temperature switch	-
22	135606081	1	Exhaust manifold	-
23	135996300	1	Gasket, expansion tank to thermostat housing	-
24	145216070	1	Thermostat housing	-
25	027100010	4	Lock washer 10mm	-
26	011300860	7	Cap screw 8mm x 60mm 70mm <i>70mm</i>	-
27	011300885	1	Cap screw 8mm x 78mm 70mm <i>70mm</i>	-
28	12-00211	2	Cap screw 5/16" x 3/4"	-
29	012100825	6	Stud 8mm x 25mm	-
30	11-12203	1	Keel cooler adapter gasket	-
31	10-12006	1	Keel cool adapter	-
32	145986120	1	Fitting 3/8" npt x 1" hose barb	-
33	398750210	2	Hose clamp #6	-
34	145536120	1	Bypass hose 1/2" ID x 4"	-
35	21-00530	1	Brass plug 1/2" npt	-
36	21-10010	1	Zinc	-
37	21-10000	1	Brass plug for zinc 12" npt	-
38	145706020	1	Expansion tank	-
39	310110060	1	Filter cap 7 lb.	-
40	068115700	1	Overflow line 1/4" ID x 30"	-
41	064200035	5	Brass expansion plug 35mm	-
42	064200030	4	Brass expansion plug 30mm	-
43	00-71000	1	Brass plaque "Lugger"	-
..	00-71001	1	Northern Lights decal	-
44	012100865	2	Stud bolt	-
45	24-22002	1	Screen	-
46	310130010	1	Drain cock	-

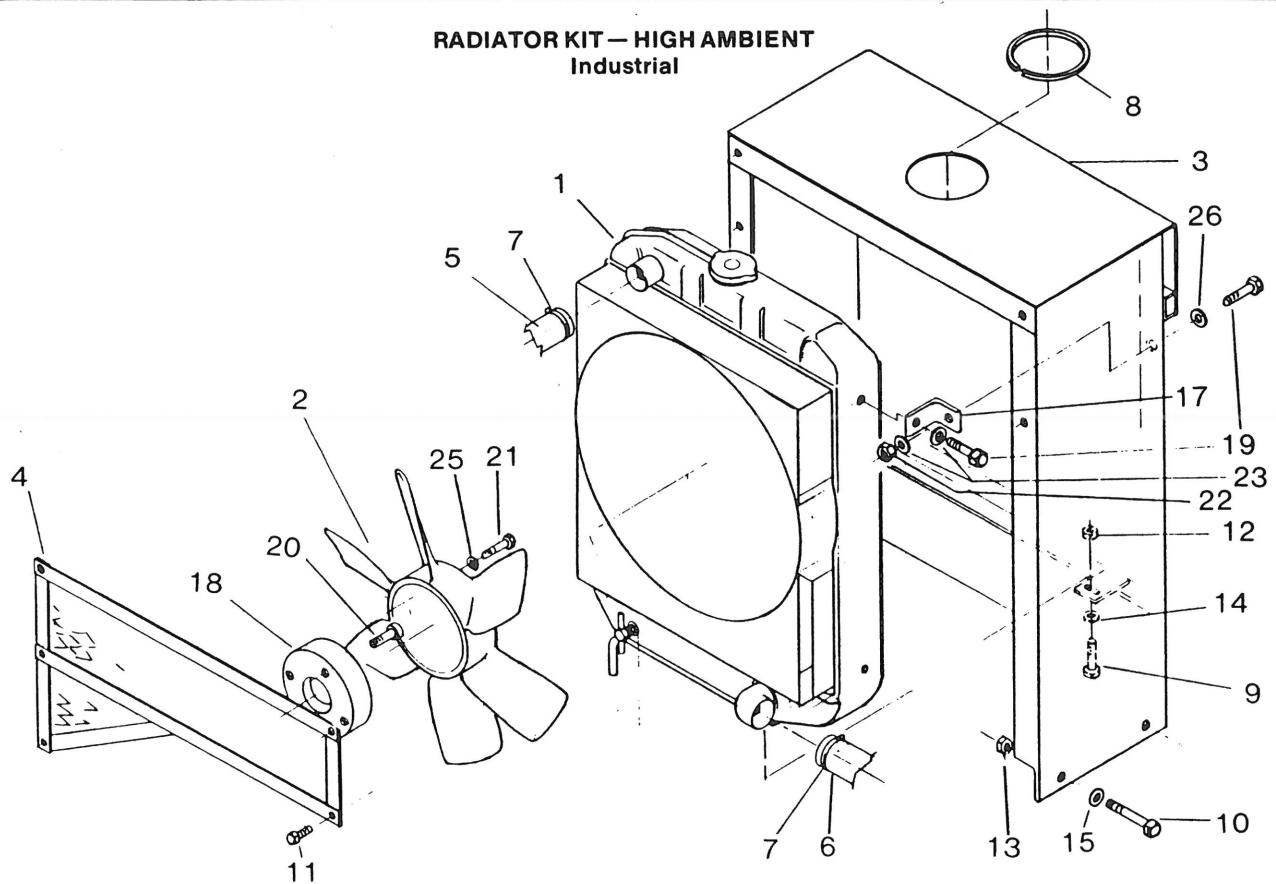
COOLING SYSTEM
L - M - NL 854 B

RADIATOR KIT — STANDARD
Industrial



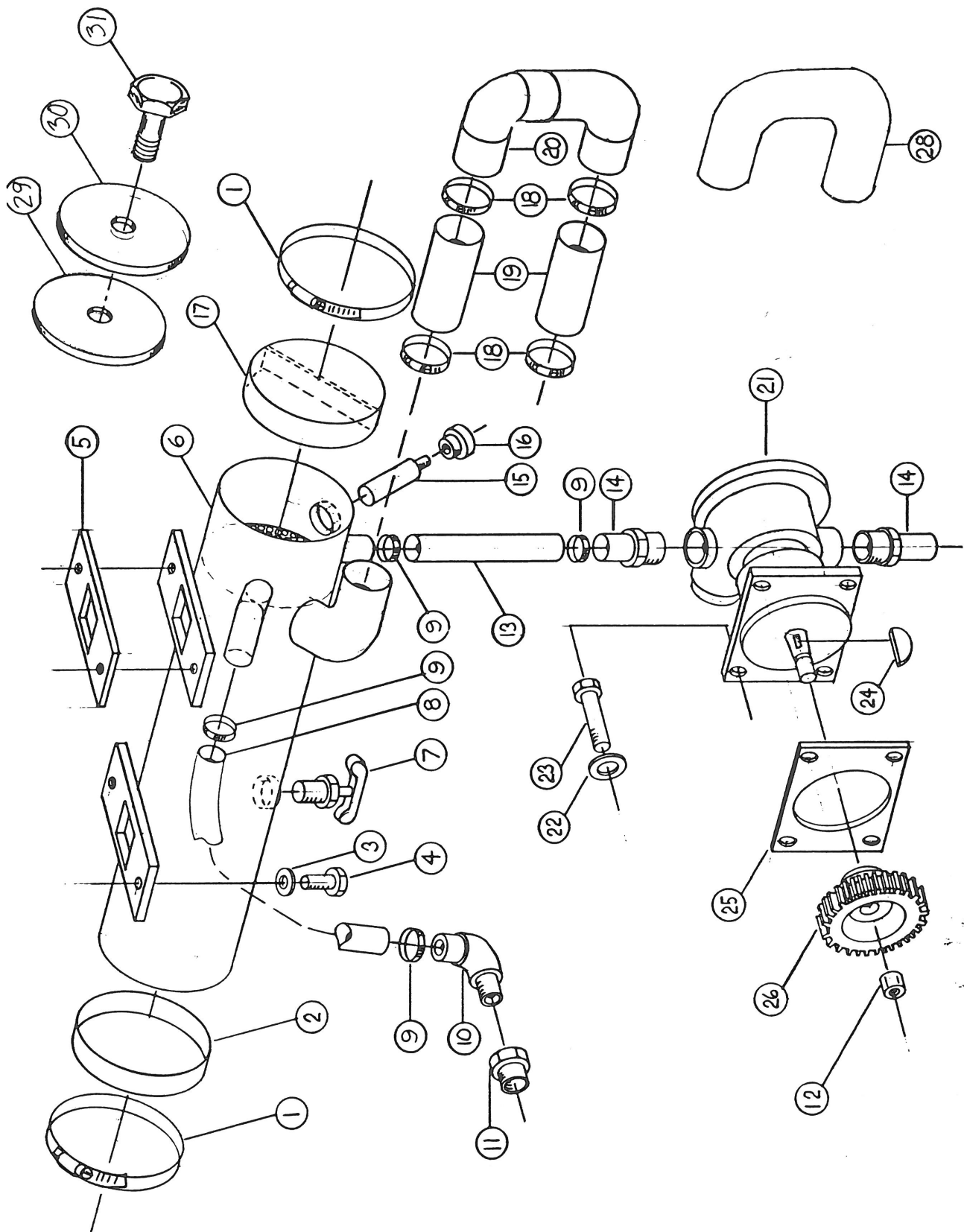
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-12200	1	Radiator guard	-
2	12-00319	4	Cap screw hx. hd. 3/8" - 16 x 2 3/4"	-
3	15-00302	4	Lock washer 3/8"	-
4	14-00311	4	Nut 3/8"	-
5	145536210	1	Hose, lower radiator	-
6	12-00213	2	Cap screw hx. hd. 5/16" - 18 x 1 1/4"	-
7	15-00202	2	Lock washer 5/16"	-
8	14-00213	2	Nut 5/16"	-
9	145536220	1	Hose, upper radiator	-
10	067100043	3	Hose clamps, #122	-
11	310100500	1	Radiator, corrugated fin	-
13	00-41077	1	Continuous grommet	-
14	145306530	1	Cooler fan, pusher, 6 blades	-
15	39-12201	1	Fan guard	-
16	12-00140	16	Cap screw, self tapping 1/4" x 1/2"	-
17	23-12201	2	Radiator bracket	-
18	12-00711	4	Cap screw hx. hd. 8mm x 20mm	-
19	14-00711	4	Nut hx. 8mm	-
20	15-00702	4	Lock washer 8mm	-
21	15-00701	2	Flat washer 8mm	-
22	067100052	1	Hose clamp, #24	-
23	145386360	1	Radiator fan adapter	-
24	011300835	4	Cap screw hx. hd. 6mm x 15mm	-
25	15-00610	4	Lock washer 6mm	-
26	12-10711	4	Cap screw socket head 8mm x 16mm	-

**RADIATOR KIT — HIGH AMBIENT
Industrial**



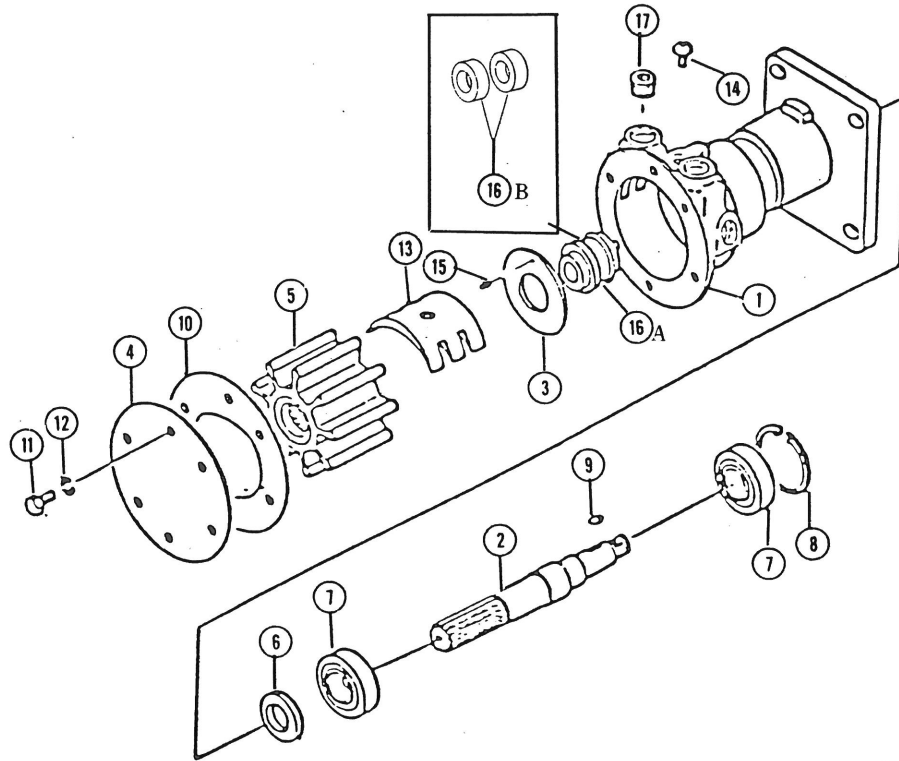
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	20-12205	1	Radiator, high ambient	-
2	20-12206	1	Fan, high ambient pusher	-
3	39-12202	1	Radiator guard, NL 854 high ambient	-
4	39-12203	1	Fan guard, NL 854 high ambient	-
5	17-12200	1	Hose, upper radiator	-
6	18-12201	1	Hose, lower radiator	-
7	19-12200	4	Hose clamp, #122	-
8	00-41077	1	Continuous grommet	-
9	12-00213	2	Cap screw hx. hd. 5/16" x 1 1/4"	-
10	12-00318	4	Cap screw hx. hd. 3/8" x 2 1/2"	-
11	12-00140	5	Cap screw hx. hd. 1/4" x 1/2" self tapping	-
12	14-00213	2	Nut hx. 5/16"	-
13	14-00311	4	Nut hx. 3/8"	-
14	15-00202	2	Lock washer 5/16"	-
15	15-00302	4	Lock washer 3/8"	-
17	23-12202	2	Radiator support bracket	-
18	31-12202	1	Radiator fan adapter	-
19	12-00711	4	Cap screw hx. hd. 8mm x 20mm	-
20	12-10711	4	Cap screw socket head 8mm x 16mm	-
21	12-00031	4	Cap screw hx. hd. 6mm x 15mm	-
22	14-00711	2	Nut hx. 8mm	-
23	15-00702	4	Lock washer 8mm	-
25	15-00610	4	Lock washer 6mm	-
26	15-00701	2	Flat washer 8mm	-

HEAT EXCHANGER and SEAWATER PUMP



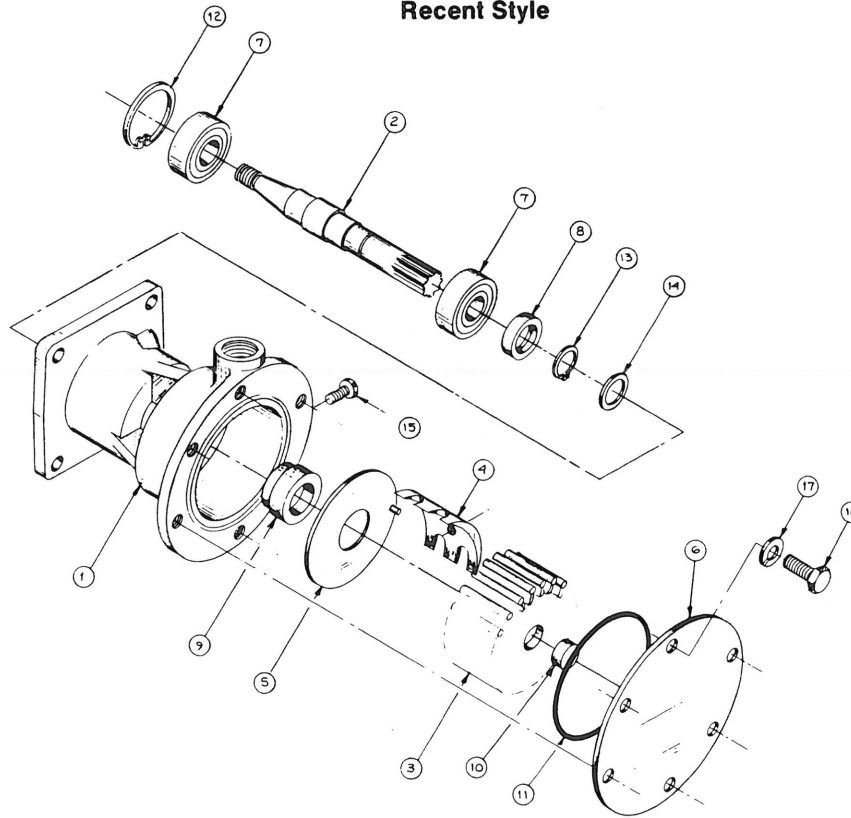
HEAT EXCHANGER and SEAWATER PUMP				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	19-00052	2	Hose clamp #52	-
2	20-12009	1	Upper end cap, heat exchanger	-
3	15-00202	4	Lock washer 5/16"	-
4	12-00211	4	Cap screw 5/16 x 3/4"	-
5	11-12203	2	Gasket, heat exchanger	-
6	20-12008	1	Copper heat exchanger, Lugger application	-
...	20-12011	1	Cupro-nickle heat exchanger, marine application	-
7	21-10002	1	Drain cock 1/4" npt	-
8	18-12255	1	Hose 5/8" ID x 37 1/3"	-
9	19-00008	4	Hose clamp #8	-
10	21-12054	1	Elbow 1/2" npt x 5/8" hose barb	-
11	21-00755	1	Bushing 1/2" npt x 3/4" npt	-
12	020100010	1	Nut	-
13	18-12054	1	Hose 5/8" ID x 8"	-
14	21-12055	1	Fitting 1/2" npt x 5/8" hose barb	-
15	21-12010	1	Zinc	-
16	21-12000	1	Brass plug, threaded	-
17	20-12010	1	Lower end cap, heat exchanger	-
18	19-00024	4	Hose clamp #24	-
19	18-12254	2	Hose 1 1/2" ID x 2 1/2"	-
20	27-12255	1	Pipe 1" freshwater pump to heat exchanger	-
21	25-12057	1	Seawater pump	-
22	027100008	4	Lock washer 1/4"	-
23	12-00111	4	Cap screw 1/4" x 3/4"	-
24	034309035	1	Woodruff key, 3mm x 5mm	-
25	340990010	1	Gasket, seawater pump	-
26	340460020	1	Gear, pump drive	-
27	027100010	1	Fitting 1/2" npt x 3/4" hose barb	-
28	83035-0510	1	Freshwater pump to heat exchanger hose	-
29	20-12012	2	Rubber gasket	-
30	28-12201	2	End plate	-
31	12-11002	2	Cap screw hx. hd. 3/8 - 16 x 3/4" stainless steel	-

SEAWATER PUMP ASSEMBLY
Early Style — Lip & Ceramic Seals



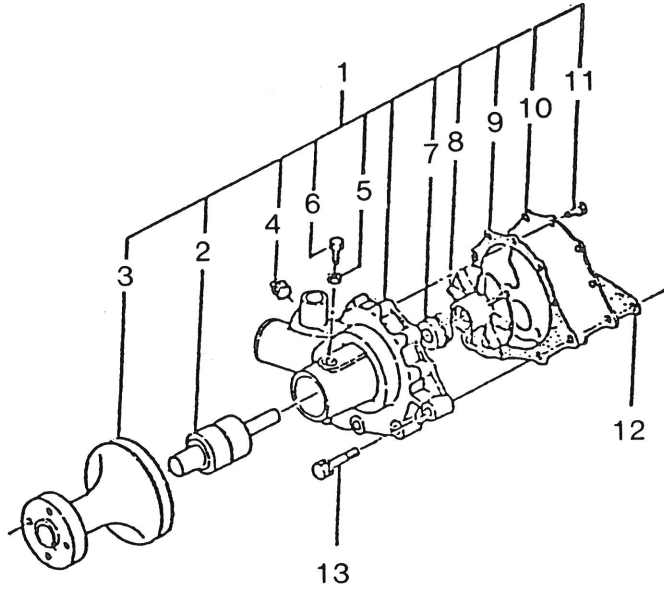
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
..	145016310	1	Seawater pump assembly, lip seal, replaced by 25-12057	-
..	145016800	1	Seawater pump assembly, ceramic seal, replaced by 25-12057	-
1	145136250	1	Casing for 145016800, ceramic seal pump	-
..	145136220	1	Casing for 145016310, lip seal pump	-
2	145626040	1	Shaft for 145016800, ceramic seal pump	-
..	145626030	1	Shaft for 1450165310, lip seal pump	-
3	145146190	1	Plate	-
4	165206250	1	Cover	-
5	145116140	1	Impeller	-
6	198636190	1	Oil seal for 145016800, ceramic seal pump	-
..	198636180	1	Oil seal for 145016310, lip seal pump	-
7	145156020	2	Bearing	-
8	036109004	1	Snap ring	-
9	034309035	1	Key	-
10	145996390	1	Gasket	-
11	199436310	6	Bolt	-
12	199346100	6	Lock washer	-
13	120296020	1	Cam	-
14	199486250	1	Screw	-
15	199616180	1	Pin	-
16A	145126020	1	Ceramic seal for seawater pump 145016800	-
16B	198636180	2	Lip seal for seawater pump 145016310	-
17	198436210	2	Plug	-

SEAWATER PUMP ASSEMBLY
Recent Style



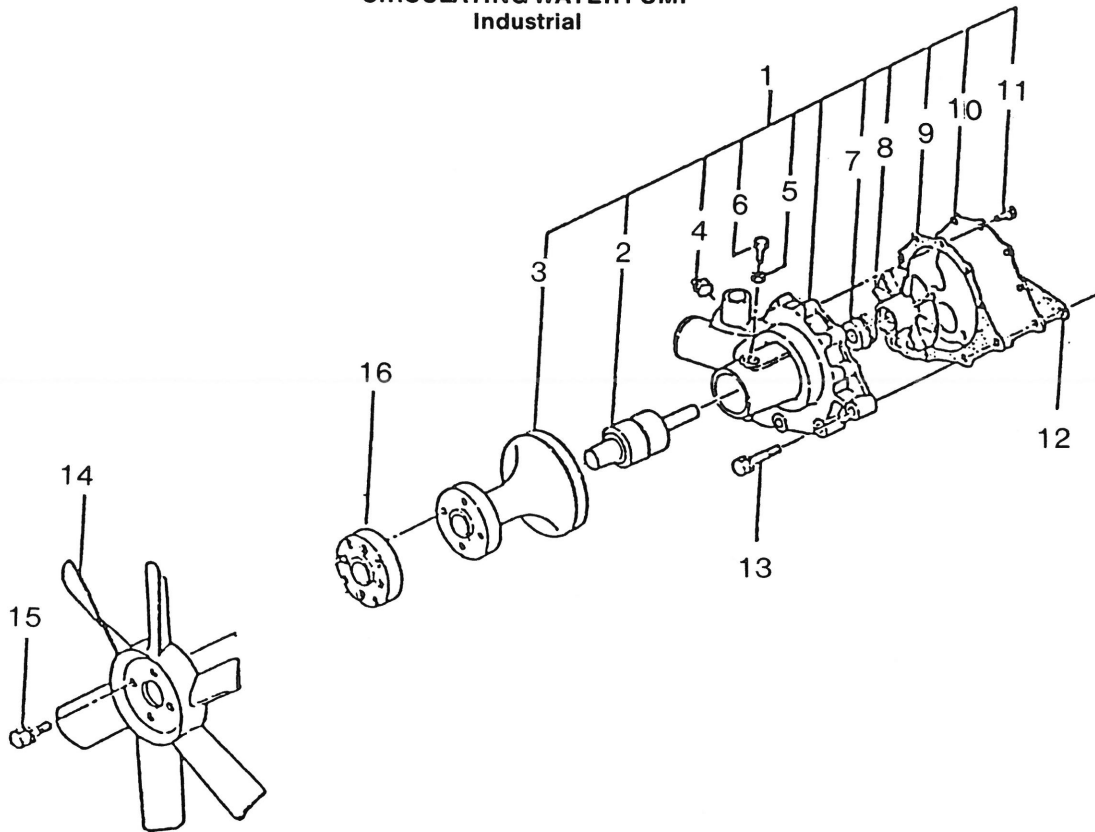
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
..	25-12057	1	Seawater pump assembly	-
1	25-12058	1	Seawater pump body	-
2	25-12059	1	Shaft	-
3	25-12060	1	Impeller	-
4	25-12061	1	Cam	-
5	25-12062	1	Wear plate	-
6	25-12063	1	End cover	-
7	25-12064	1	Bearing	-
8	25-12065	1	Lip seal	-
9	25-12066	1	Mechanical seal	-
10	25-12017	1	Spline seal	-
11	25-12067	1	O-ring	-
12	25-12068	1	Retaining ring	-
13	25-12069	1	Retaining ring	-
14	25-12070	1	Washer	-
15	25-12071	4	Pan head screw #10-32 x 3/8	-
16	25-12072	1	Hex head screw #10-32 x 3/8	-
17	25-12073	1	Split lock washer #10	-

CIRCULATING WATER PUMP
Marine



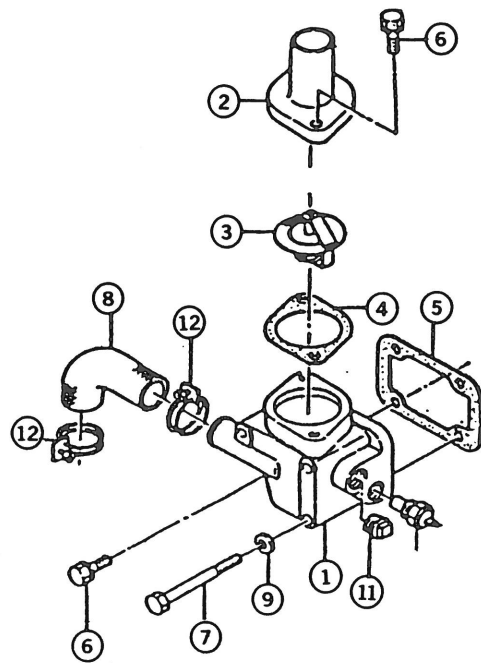
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	145016670	1	Water pump assembly	-
2	145156010	1	Water pump bearing	-
3	145336670	1	Fan pulley	-
4	064500030	1	Plug	-
5	020300006	1	Nut	-
6	199436040	1	Set screw	-
7	145126010	1	Mechanical seal	-
8	145116040	1	Water pump impeller	-
9	145996180	1	Gasket	-
10	145146220	1	Set plate	-
11	011140612	6	Bolt	-
12	145996190	1	Gasket	-
13	0113100840	6	Bolt	-

**CIRCULATING WATER PUMP
Industrial**



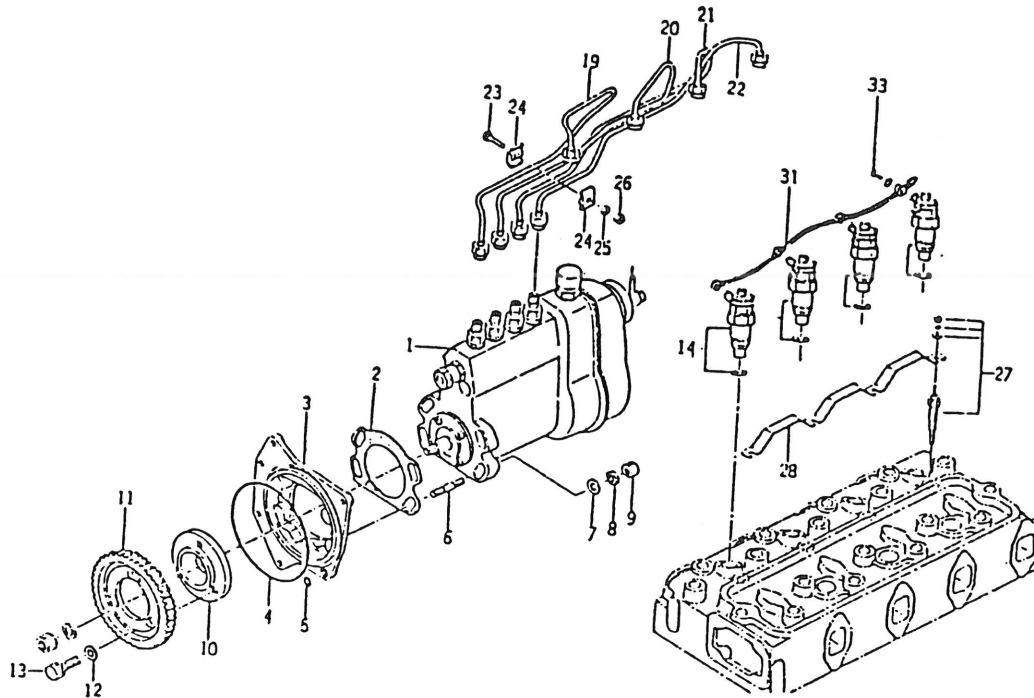
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	145016670	1	Circulating water pump assembly (NL 854B)	-
2	145156010	1	Water pump shaft	-
3	145336640	1	Fan pulley	-
4	064500030	1	Plug	-
5	020300006	1	Nut	-
6	199436040	1	Set screw	-
7	145126010	1	Mechanical seal	-
8	145116040	1	Water pump impeller	-
9	145996180	1	Gasket	-
10	145146080	1	Set plate	-
11	011140612	6	Bolt	-
12	145996190	1	Gasket	-
13	011310840	6	Bolt	-
14	145306530	1	Cooler fan, pusher, 6 blade	-
15	011300835	4	Bolt	-
16	145386460	1	Radiator fan adapter	-

**THERMOSTAT
Industrial**



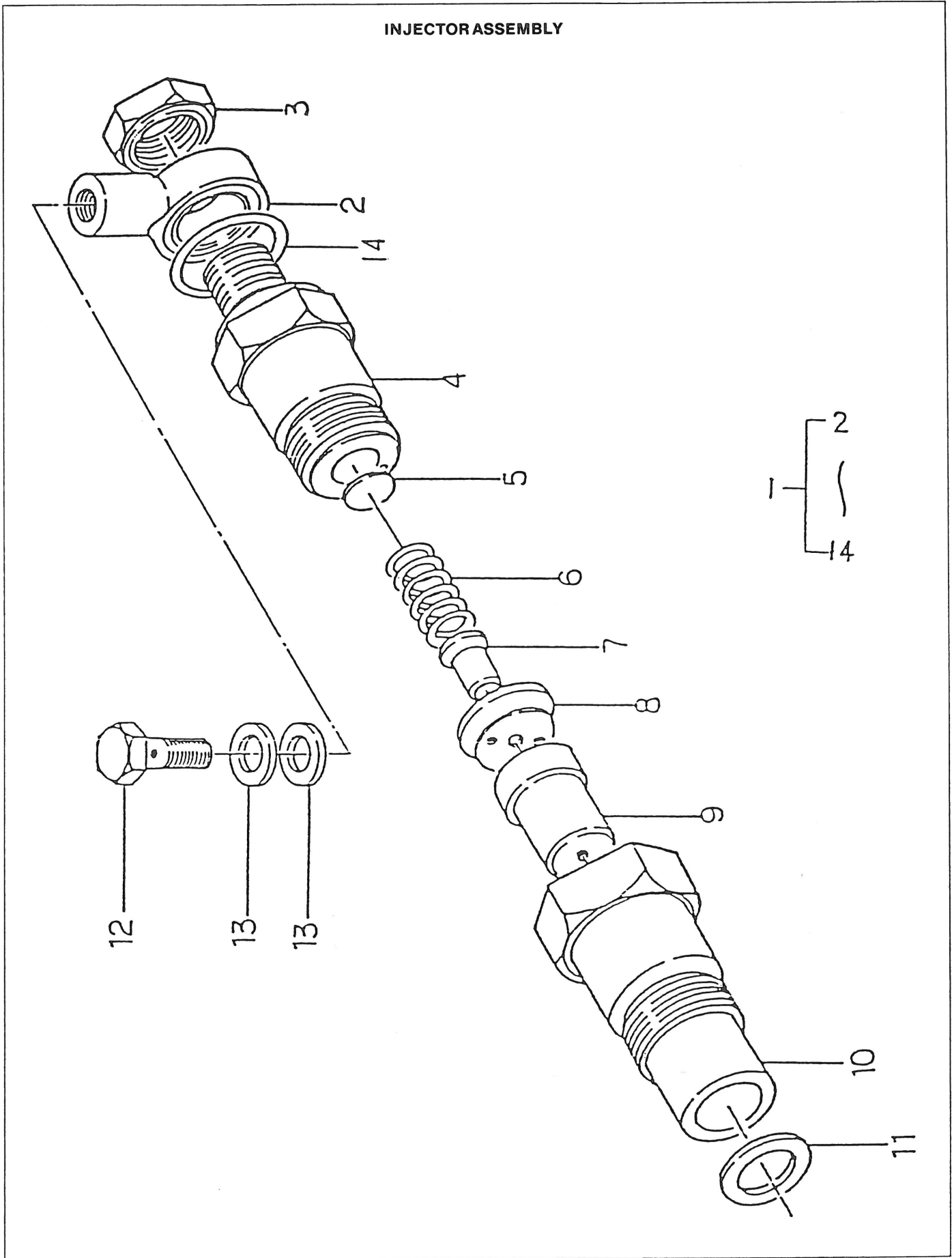
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	145216100	1	Thermostat case	-
2	145226010	1	Thermostat cover	-
3	145206011	1	Thermostat	-
4	145996030	1	Gasket	-
5	145996210	1	Gasket	-
6	011300825	3	Bolt	-
7	010100880	3	Bolt	-
8	145536120	1	Hose	-
9	027100008	3	Spring washer	-
10	385720030	1	Switch assembly - industrial	-
11	064500030	1	Plug	-
12	398750210	2	Hose clamp	-
..	067010033	2	Hose clamp	-

INJECTION PUMP



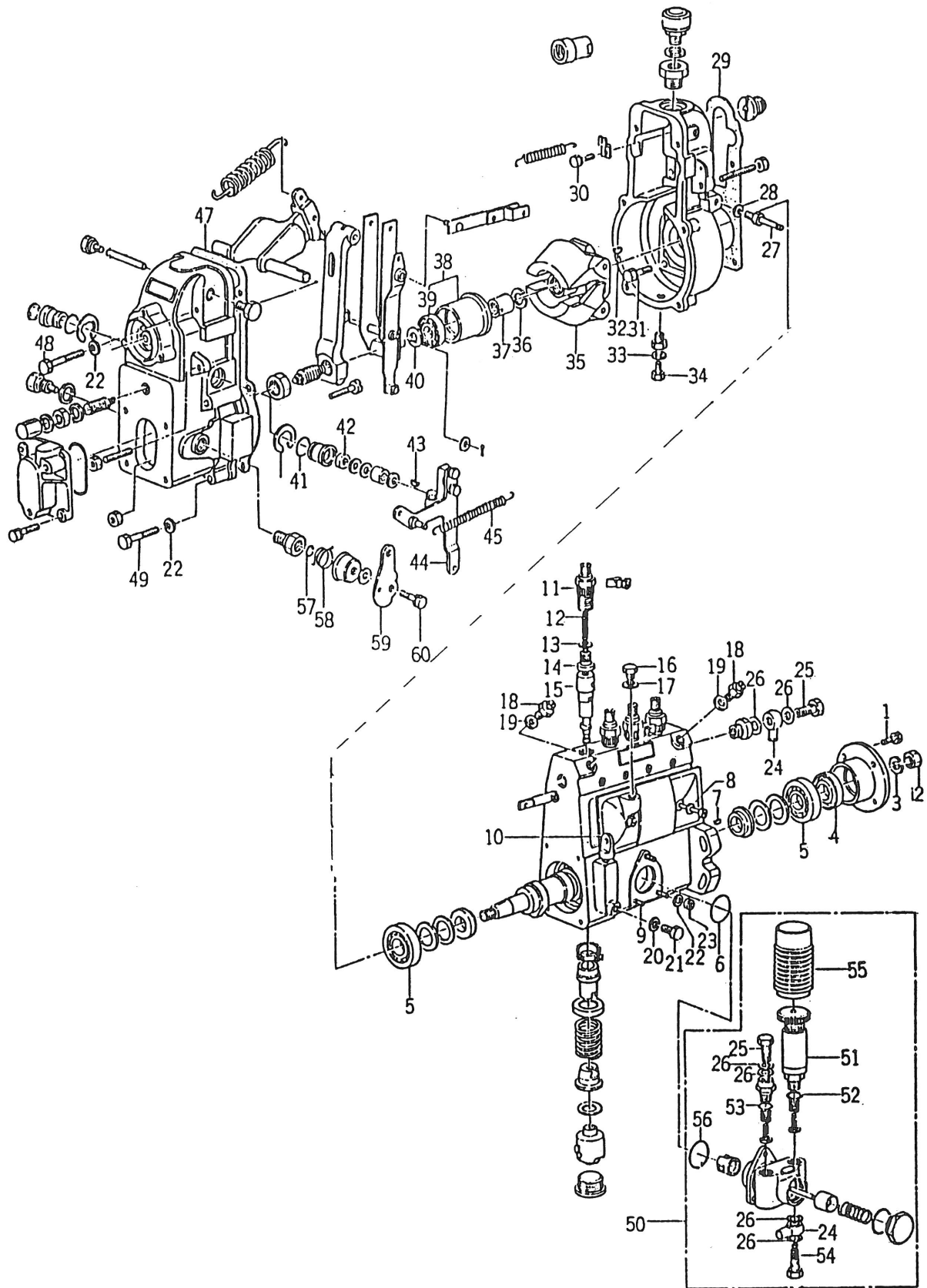
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	131016840	1	Injection pump assembly, variable speed (L 854 B)	-
..	131016950	1	Injection pump assembly, 1800 RPM, 3 - 5% (M - NL 854 B)	-
2	131996011	1	Gasket	-
3	131716090	1	Flange (blue)	-
..	131716110	1	Flange (white)	-
4	052301250	1	O-ring	-
5	052100100	1	O-ring	-
6	012111035	4	Stud bolt	-
7	026100010	4	Washer	-
8	027100010	4	Spring washer	-
9	020200010	4	Nut	-
10	131726050	1	Coupling	-
11	131636060	1	Injection pump gear	-
12	026100008	3	Washer	-
13	011300820	3	Bolt	-
14	131406200	4	Injector	-
19	131506550	1	Injection pipe, complete	-
20	131506560	1	Injection pipe, complete	-
21	131506570	1	Injection pipe, complete	-
22	131506580	1	Injection pipe, complete	-
23	010100625	3	Bolt	-
24	199106020	6	Clamp, complete	-
25	027100006	3	Spring washer	-
26	020100006	3	Nut	-
27	185366060	4	Glow plug	-
28	185376090	1	Connector	-
31	131606081	1	Steel leak-off line	-
33	131136300	4	Bolt, hollow	-

INJECTOR ASSEMBLY



INJECTOR ASSEMBLY				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	131406200	1	Injector assembly	-
2	131446032	1	Eye	-
3	131446006	1	Nut	-
4	131446033	1	Body	-
5	131436030	a/r	Shim 1.00mm	-
..	131436080	a/r	Shim 1.10mm	-
..	131436130	a/r	Shim 1.20mm	-
..	131436180	a/r	Shim 1.30mm	-
..	131436230	a/r	Shim 1.40mm	-
..	131436280	a/r	Shim 1.50mm	-
..	131436330	a/r	Shim 1.60mm	-
..	131436380	a/r	Shim 1.70mm	-
..	131436430	a/r	Shim 1.80mm	-
..	131436480	a/r	Shim 1.90mm	-
..	131436530	a/r	Shim 2.00mm	-
6	131446037	1	Spring	-
7	131446001	1	Push rod	-
8	131446003	1	Spacer	-
9	131416060	1	Nozzle	-
10	131446034	1	Nut nozzle	-
11	131426010	1	Gasket	-
12	131136300	1	Bolt	-
13	131426160	2	Gasket	-
14	131426150	1	Gasket	-

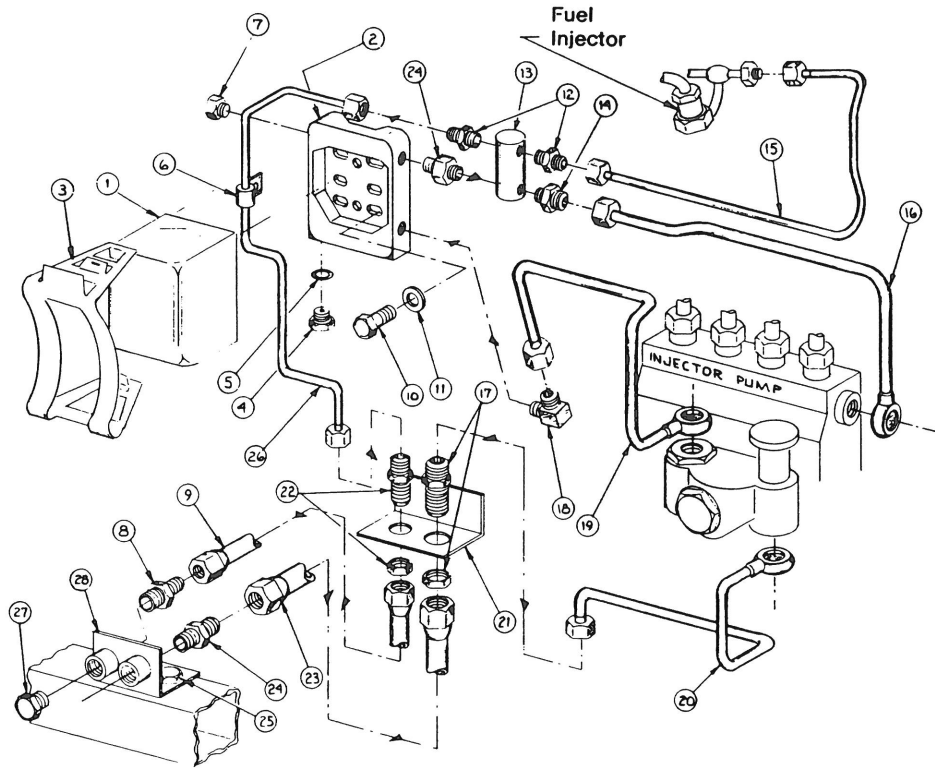
INJECTION PUMP ASSEMBLY



INJECTION PUMP ASSEMBLY				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	131016950	1	Injection pump assembly	-
1	011140614	3	Bolt	-
2	020100012	1	Nut	-
3	027100012	1	Spring washer	-
4	131296061	1	Oil seal	-
5	131296244	2	Bearing	-
6	131296303	1	O-ring	-
7	131296002	1	Key	-
8	131296222	2	Gasket	-
9	012100614	3	Stud bolt	-
10	131296039	1	Level gauge	-
11	131196020	4	Holder	-
12	131176010	4	Spring	-
13	131186020	4	Gasket	-
14	131156020	4	Delivery valve	-
15	131116320	4	Plunger assembly 854	-
15	131116330	1	Plunger assembly 854 A	-
16	131296235	1	Plug	-
17	131296255	1	Gasket	-
18	131296028	2	Bolt	-
19	131296255	2	Gasket	-
20	131296027	1	Gasket	-
21	131296026	1	Plug	-
22	027100006	9	Spring washer	-
23	020100006	3	Nut	-
24	131246090	2	Eye	-
25	130516016	2	Eye bolt	-
26	130516017	6	Gasket	-
27	131296250	1	Bolt	-
28	027100008	1	Spring washer	-
29	131296242	1	Gasket	-
30	011300816	1	Bolt	-
31	011140616	6	Bolt	-
32	131296002	1	Woodruff key	-
33	131426040	1	Gasket	-
34	131136050	1	Plug	-
35	131296239	1	Flyweight assembly	-
36	027100010	1	Spring washer	-
37	131296130	1	Nut	-
38	131296296	1	Sleeve	-
39	131296240	1	Bearing	-
40	131296133	a/r	Shim 0.20mm	-
..	131296134	a/r	Shim 0.30mm	-
..	131296135	a/r	Shim 0.40mm	-
40	131296136	a/r	Shim 1.00mm	-
41	131226040	2	O-ring	-
42	131296452	1	Oil seal	-
43	131296030	1	Woodruff key	-
44	131296258	1	Lever	-
45	131296259	1	Spring	-
46	131296462	2	Snap ring	-
47	131296243	1	Gasket	-
48	010100650	2	Bolt	-
49	010100640	4	Bolt	-
50	130506020	1	Feed pump assembly	-
51	130516014	1	Priming pump	-
52	130516011	1	Gasket	-
53	130516012	1	O-ring	-
54	130516015	1	Eye bolt	-
55	130516018	1	Cover	-
56	130516013	1	Snap ring	-
57	131226150	1	O-ring	-
58	131296545	1	Spring	-
59	131296544	1	Lever	-
60	011140620	1	Bolt	-

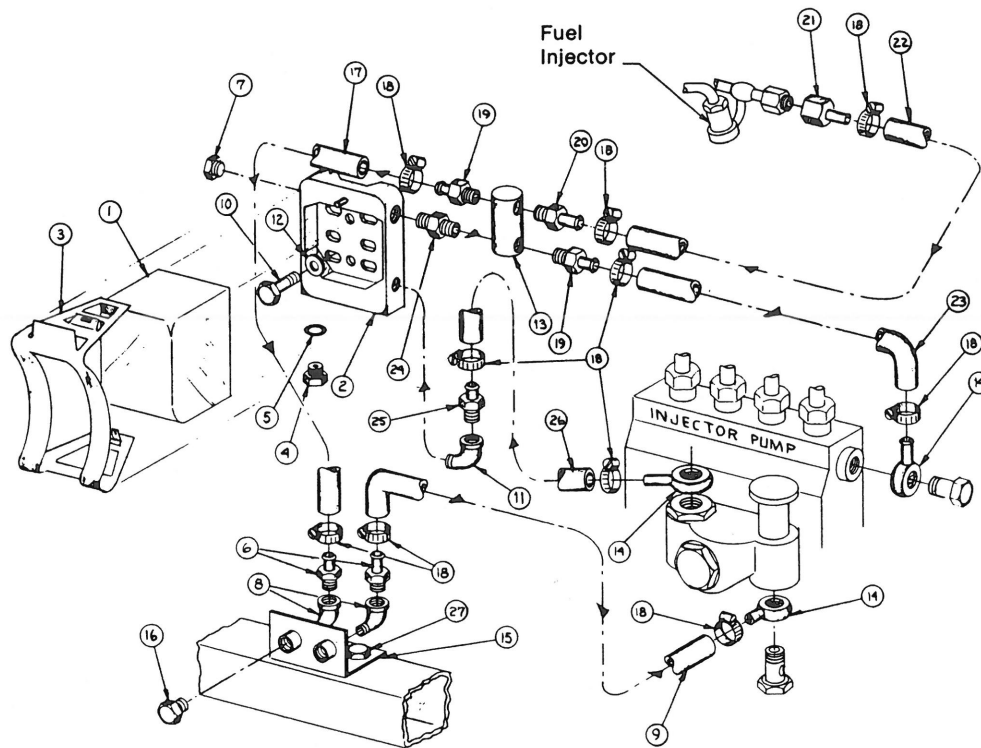
FUEL SYSTEM
M854 B

FUEL SYSTEM KIT
Marine — Clamp on Filter



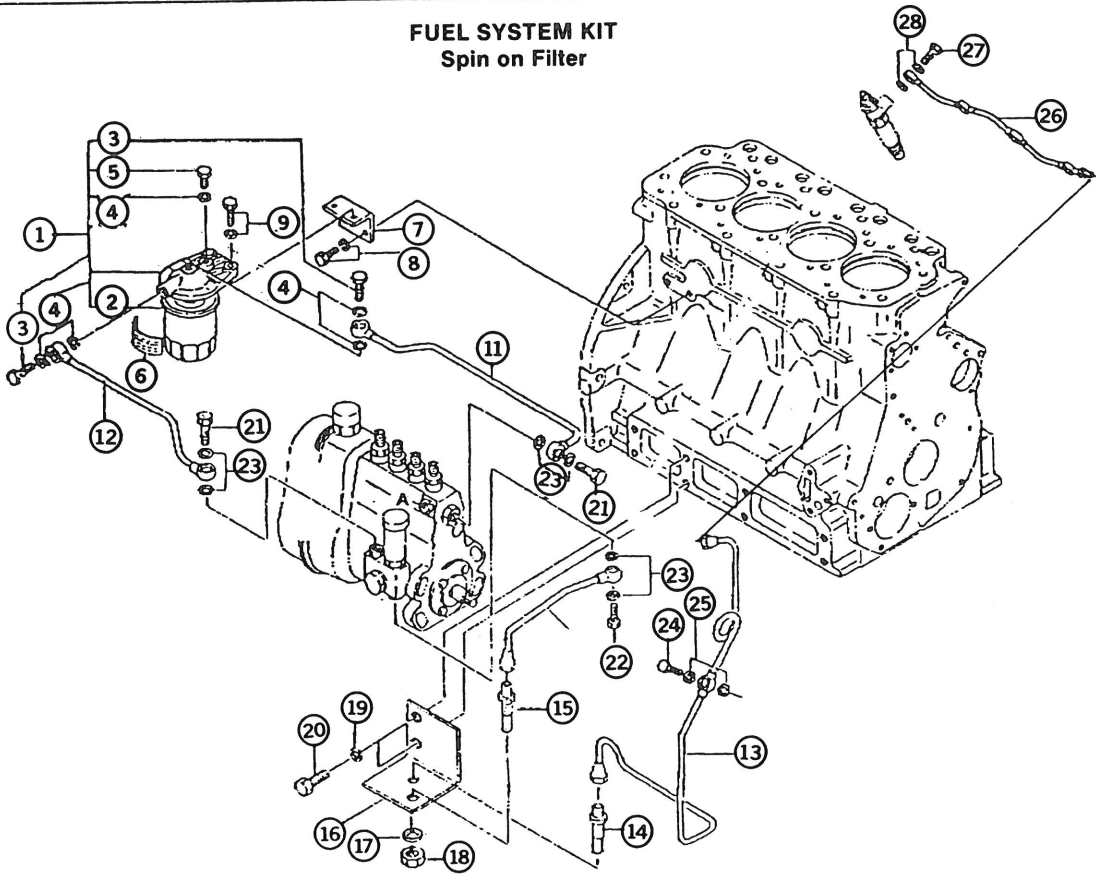
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	24-52254	1	Fuel filter element	-
2	24-52255	1	Fuel filter base	-
3	24-52256	1	Retaining spring	-
4	24-52257	1	Bleed screw 1/8 npt	-
5	24-52258	1	Bleed screw packing	-
6	19-52201	1	Clamp	-
7	21-00012	2	Brass plug 1/8 npt	-
8	21-52221	1	Fitting	-
9	18-52220	1	Hose assembly	-
10	12-00751	4	Cap screw hx. hd. M8-1.25 x 15mm	-
11	15-00701	4	Flat washer M8	-
12	21-52222	2	Fitting	-
13	21-52008	1	Relief valve assembly	-
14	21-52220	1	Fitting	-
15	27-52205	1	Tube assembly	-
16	27-52204	1	Tube assembly	-
17	21-52217	1	Bulkhead fitting	-
18	21-52218	1	Elbow 90°	-
19	27-52203	1	Tube assembly	-
20	27-52201	1	Tube assembly	-
21	23-52206	1	Bracket	-
22	21-52219	1	Bulkhead fitting	-
23	18-52220	1	Hose assembly	-
24	21-52221	1	Fitting	-
25	12-00030	2	Cap screw hx. hd. M6-1.0 x 15mm	-
26	27-52202	1	Tube assembly	-
27	21-31624	2	Brass pipe plug 1/4 npt	-
28	10-51099	1	Fuel manifold 1/4 npt	-

FUEL SYSTEM KIT
Industrial — Clamp on Filter



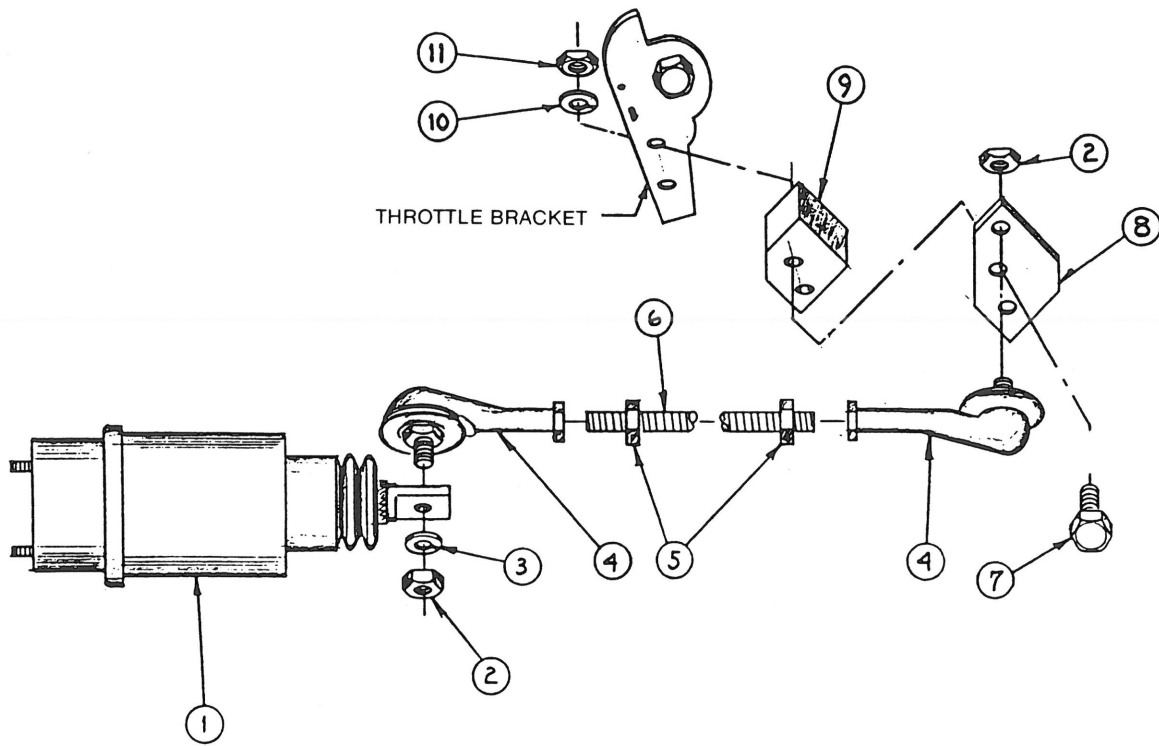
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	24-52254	1	Fuel filter element	-
2	24-52255	1	Fuel filter base	-
3	24-52256	1	Retaining spring	-
4	24-52257	1	Bleed screw 1/8 npt	-
5	24-52258	1	Bleed screw packing	-
6	21-52003	2	Male connector 1/4 npt x 20.5mm hb, brass	-
7	21-00012	2	Brass pipe plug 1/8 npt	-
8	21-51098	2	Street elbow 90° 1/4 npt	-
9	18-52225	1	Hose 10mm ID	-
10	12-00751	4	Cap screw hx. hd. M8-1.25 x 15mm	-
11	21-72044	1	Street elbow 90° 1/8 npt	-
12	15-00701	4	Flat washer M8	-
13	21-52007	1	Pressure relief valve	-
14	131246090	3	Banjo fitting	-
15	10-51099	1	Fuel manifold 1/4 npt	-
16	21-31624	2	Plug hx. hd. 1/4 npt brass	-
17	18-52221	1	Hose 7mm ID	-
18	19-00010	10	Hose clamp #10	-
19	21-52004	1	Male connector 1/8 npt x 10.5mm hb, brass	-
20	21-52005	1	Male connector 1/8 npt x 7mm hb, brass	-
21	21-52008	1	Female swivel 1/8 npt x 7mm hb, brass	-
22	18-52222	1	Hose 7mm ID	-
23	18-52223	1	Hose 10mm ID	-
24	21-72046	1	Nipple hx. 1/8 npt, brass	-
25	21-52004	1	Male connector 1/8 npt x 10.5mm hb, brass	-
26	18-52224	1	Hose 10mm ID	-
27	12-00030	2	Cap screw hx. hd. M6-1.0 x 15mm	-

FUEL SYSTEM KIT
Spin on Filter

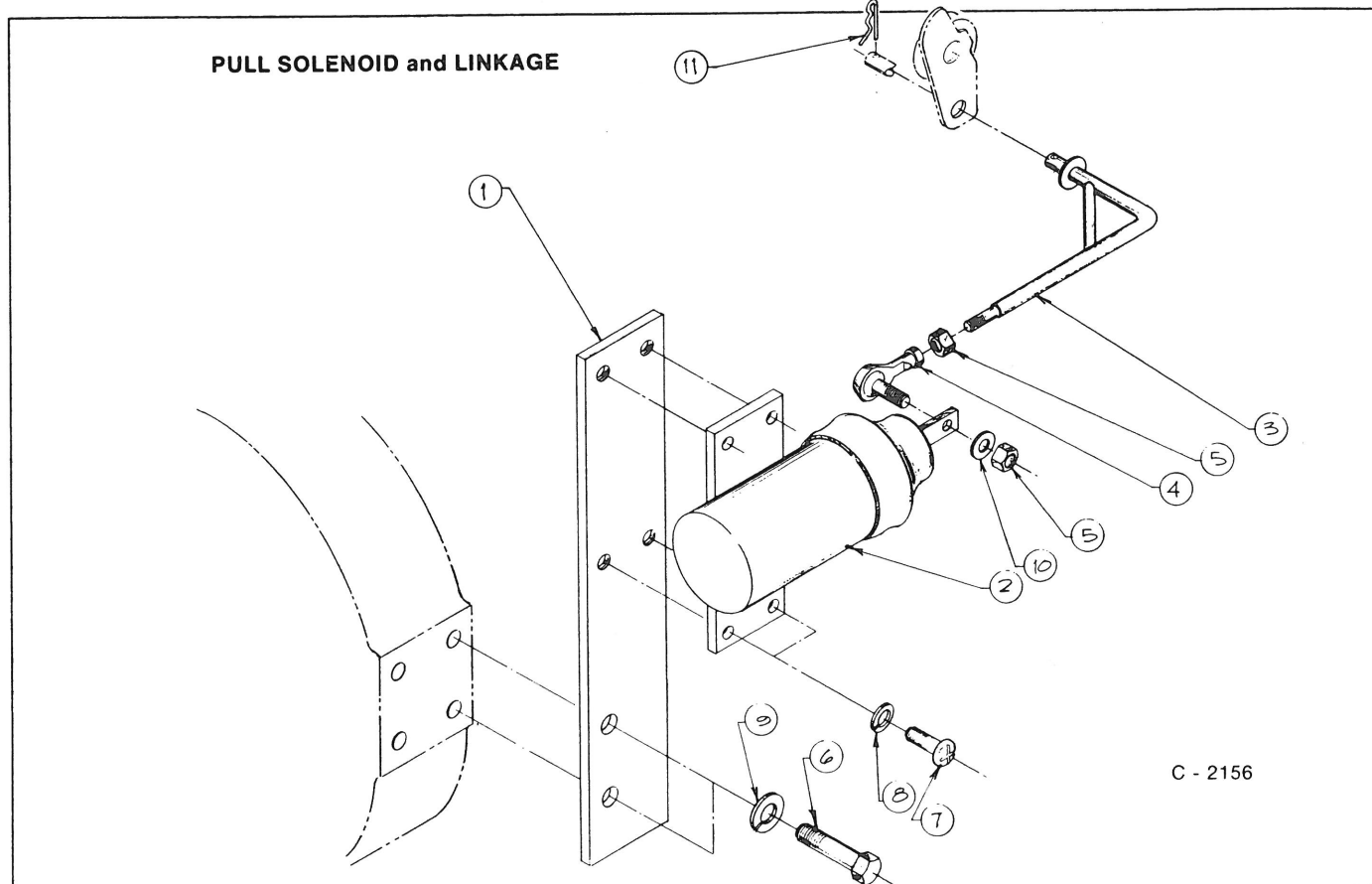


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	130306190	1	Fuel filter assembly	-
2	130366020	1	Cartridge	-
3	130436011	2	Joint bolt	-
4	130326015	5	Gasket	-
5	130396031	1	Plug	-
6	190196830	1	Caution Plate	-
7	130976320	1	Stay	-
8	011301016	2	Bolt	-
9	011301025	2	Bolt	-
10	130556520	1	Pipe	-
11	130556530	1	Pipe	-
12	130556540	1	Pipe	-
13	130556550	1	Pipe	-
14	130226040	1	Connector	-
15	130226060	1	Connector	-
16	130976300	1	Stay	-
17	027100012	1	Spring washer	-
18	020100012	1	Nut	-
19	027100014	2	Spring washer	-
20	010201425	2	Bolt	-
21	130516016	2	Eye bolt	-
22	130516015	1	Eye bolt	-
23	130516017	6	Gasket	-
24	198487100	1	Valve, complete	-
25	025100012	2	Seal washer	-
26	131606081	1	Pipe, return	-
27	131136300	4	Eye bolt	-
28	131426160	8	Gasket	-

PULL SOLENOID and LINKAGE

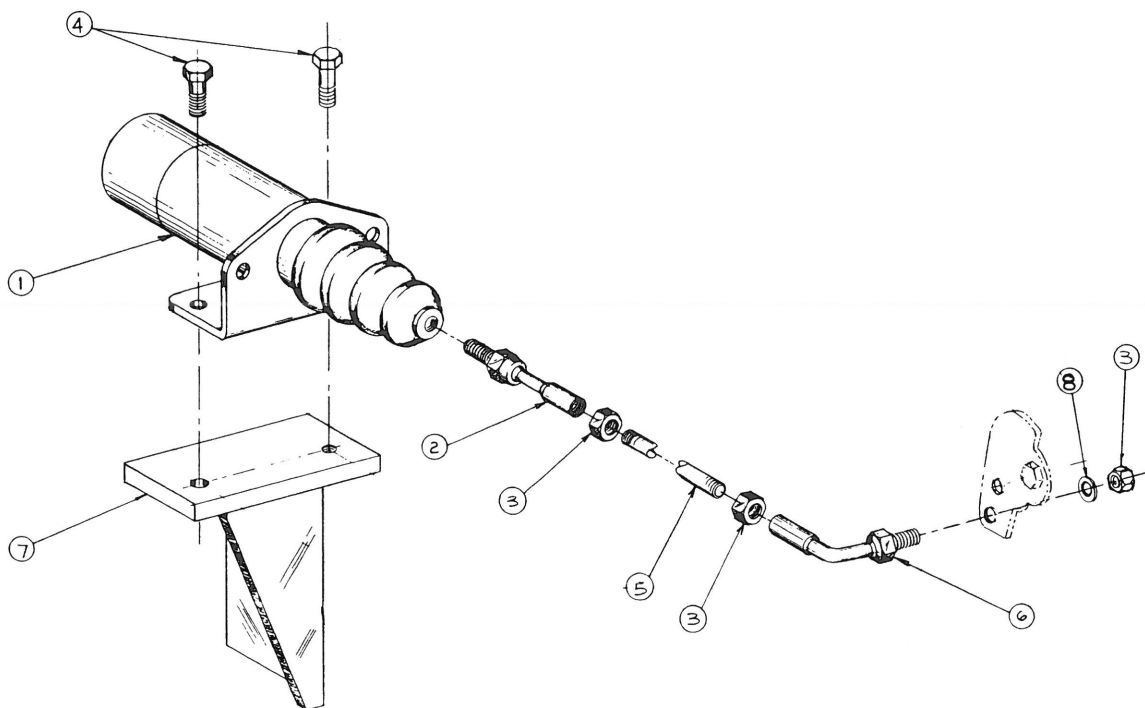


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-40078	1	Pull solenoid	—xxxx-3559
2	14-04401	2	Nut, M5-0.8	-
3	15-04400	1	Lock washer 5mm	-
4	00-52202	2	Ball joint	-
5	14-04401	2	Nut M5-0.8	-
6	13-52200	1	Control rod	—xxxx-3559
7	12-00031	2	Cap screw hx. hd. M6-1.0 x 25mm	-
8	23-52207	1	Plate	-
9	23-52208	1	Spacer	-
10	15-01132	2	Lock washer 6mm	-
11	14-01131	2	Nut M6-1.0	-



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	23-92204	1	Bracket, solenoid mounting	3560-xxxx—
2	22-52001	2	Pull solenoid, 12VDC	-
3	00-92202	1	Linkage, Pull	-
4	00-52203	1	Ball joint, 90 degree 6mm M x F	-
5	14-01131	2	Hx. hd. nut, 6mm	-
6	12-00311	2	Hx. hd. C.S. $\frac{3}{8}$ -16 N.C. x $\frac{3}{4}$ "	-
7	12-52201	4	Rd. Hd. mach. screw, M6-1.0 x 15mm	-
8	15-01132	4	Lockwasher, M6	-
9	15-00302	2	Lockwasher, $\frac{3}{8}$ "	-
10	15-00301	1	Flatwasher $\frac{3}{8}$ "	-
11	00-92203	1	Spring Pin	-

PULL SOLENOID and LINKAGE

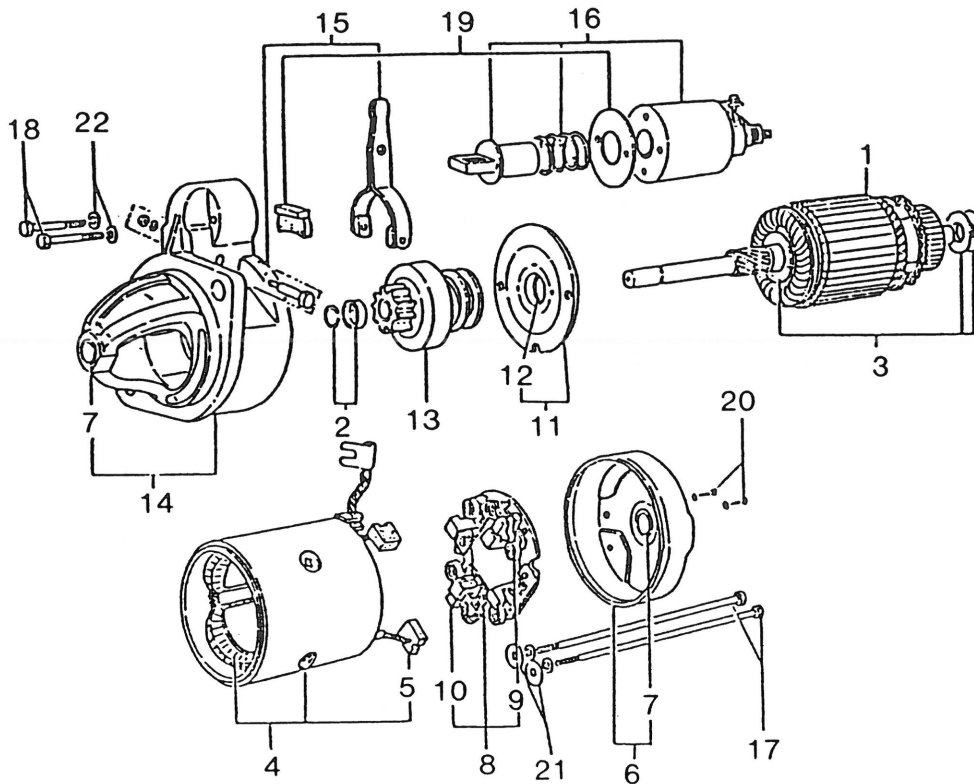


C-2219

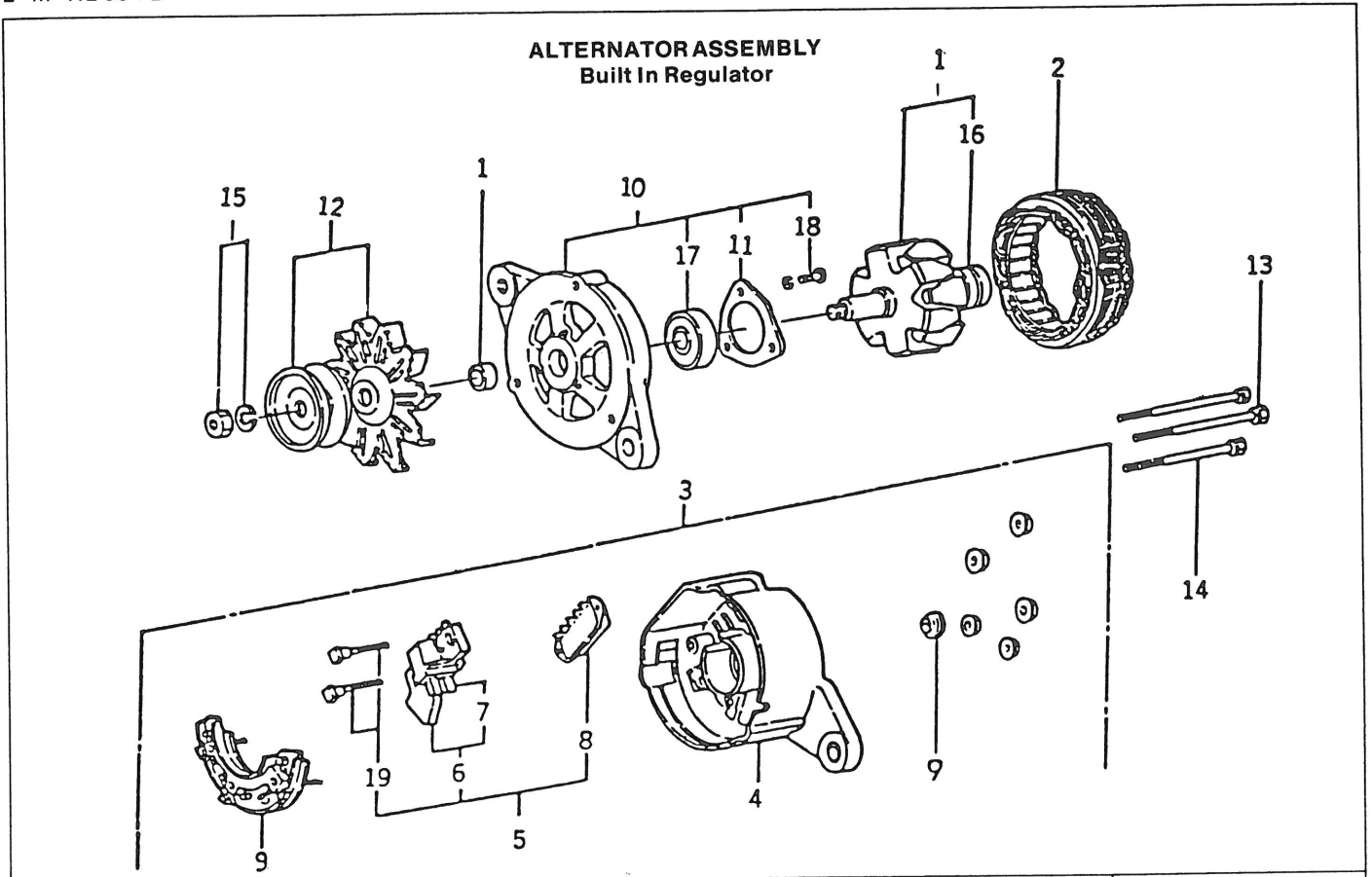
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-42054	1	Pull solenoid	-
2	00-42501	1	Ball joint	-
3	14-00121	3	Nut, ¼-28	-
4		2	Bolt	-
5	13-51005	1	Threaded rod ¼-28	-
6	00-42502	1	Ball joint	-
7	23-92200	1	Bracket	-
8	15-00102	1	Lockwasher	-

NOTES

STARTING MOTOR ASSEMBLY

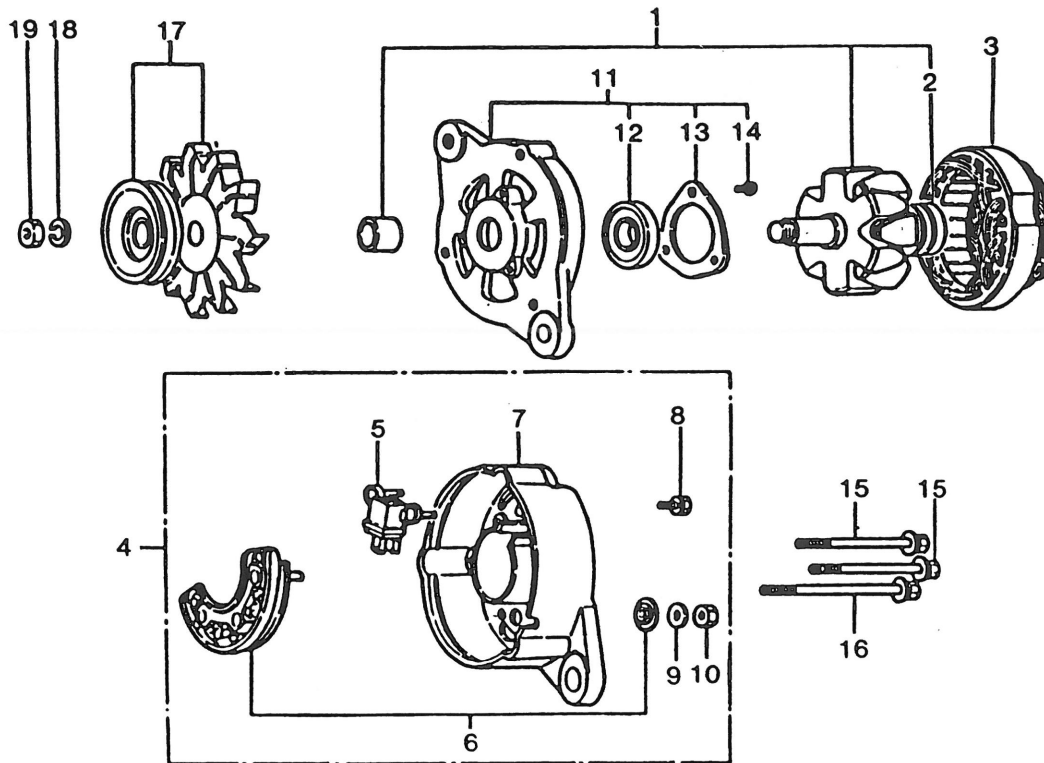


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
	185086141	1	Starting motor assembly, 12 volt	-
	22-42238	1	Starting motor assembly, 24 volt	-
1	185846186	1	Armature assembly	-
2	185846174	1	Pinion stopper set	-
3	185846010	1	Thrust washer kit	-
4	185846190	1	Field coil assembly	-
5	185461210	2	Brush	-
6	185846176	1	Rear cover assembly	-
7	185846177	2	Metal	-
8	185846188	1	Brush holder assembly	-
9	185416178	4	Brush spring	-
10	185416220	2	Brush	-
11	185846179	1	Center metal assembly	-
12	185846077	1	Metal	-
13	185866070	1	Pinion assembly	-
14	185846180	1	Gear case assembly	-
15	185846182	1	Shift lever set	-
16	185816070	1	Switch assembly, 12V	-
..	22-42239	1	Switch assembly, 24V	-
17	185846189	2	Through bolt	-
18	010100645	2	Bolt	-
19	185846183	1	Dust cover set	-
20	015140408	2	Screw	-
21	185846185	2	Washer	-
22	027100006	2	Spring washer	-



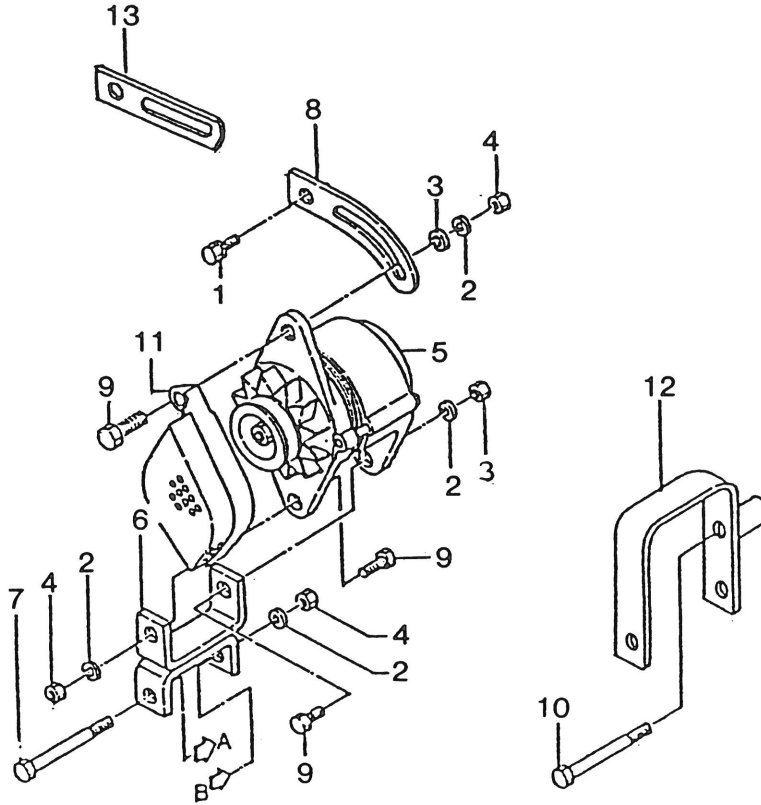
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
	185046130	1	Alternator assembly	xxxx - 3560 -
1	185446175	1	Rotor assembly	-
2	1854461176	1	Stator assembly	-
3	185446173	1	Rear cover assembly	-
4	185446174	1	Rear cover	-
5	185446179	1	Brush regulator assembly	-
6	185416290	1	Brush assembly	-
7	185416280	2	Brush	-
8	185446180	1	IC regulator assembly	-
9	185446172	1	Diode assembly	-
10	185426090	1	Front cover assembly	-
11	185446151	1	Bearing retainer	-
12	185436110	1	Pulley assembly	-
13	185446170	2	Through bolt	-
14	185446169	1	Through bolt	-
15	185446111	1	Pulley nut assembly	-
16	040146201	1	Ball bearing	-
17	040146202	1	Ball bearing	-
18	015140412	3	Screw	-
19	185446181	2	Bolt	-

ALTERNATOR ASSEMBLY

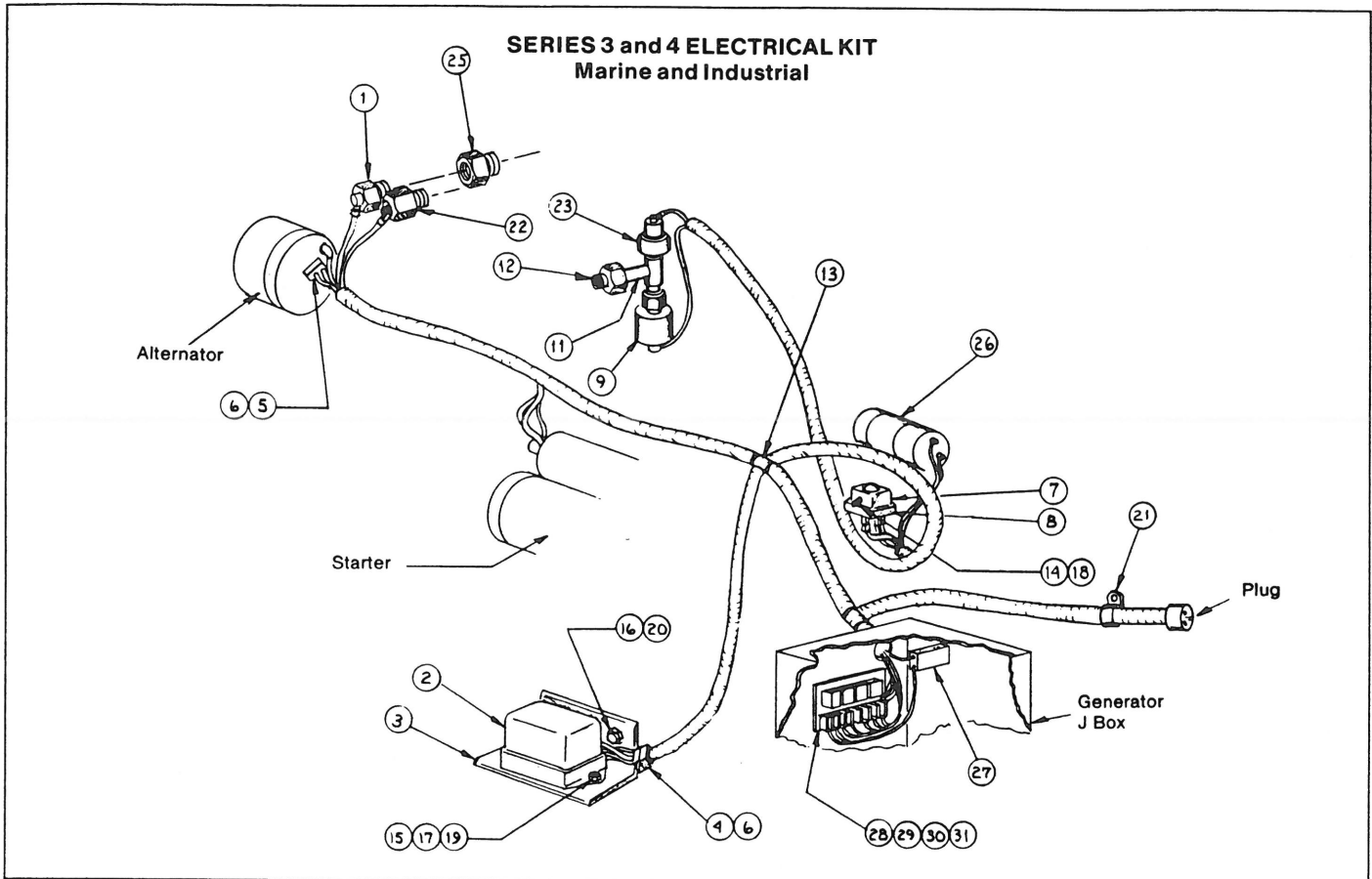


KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	185046150	1	Alternator assembly	-
2	185446191	1	Rotor assembly	-
3	040146201	1	Bearing	-
4	185446192	1	Stator assembly	-
5	185446193	1	Rear cover assembly	-
6	185416340	1	Brush assembly	-
7	185446195	1	Diode assembly	-
8	185446194	1	Rear cover	-
9	011150514	1	Bolt	-
10	026100005	5	Washer	-
11	020100005	5	Nut	-
12	185426090	1	Front cover assembly	-
13	185446178	1	Bearing	-
14	185446151	1	Retainer	-
15	015140412	3	Screw	-
16	185446170	2	Through bolt	-
17	185446169	1	Through bolt	-
18	185436110	1	Pulley assembly	-
19	027100014	1	Spring washer	-
19	020109028	1	Nut	-

ALTERNATOR ATTACHING KIT



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	011300820	1	Bolt	-
2	027100008	4	Spring washer	-
3	026100008	2	Washer	-
4	020100008	3	Nut	-
5	185046150	1	Alternator assembly	- xxxx - 3559
5	185046130	1	Alternator assembly (built in regulator)	xxxx - 3560 -
6	185706280	1	Holder, complete NL 854 B	-
7	010110885	1	Bolt	-
8	185726200	1	Adjusting plate NL 854 B	-
9	010109108	3	Bolt	-
10	010100855	1	Bolt M 854 B	-
11	175606060	1	Cover (blue)	-
11	175606170	1	Cover (white)	-
12	185706270	1	Holder, complete M 854 B	-
13	185726290	1	Adjusting plate M 854 B	-



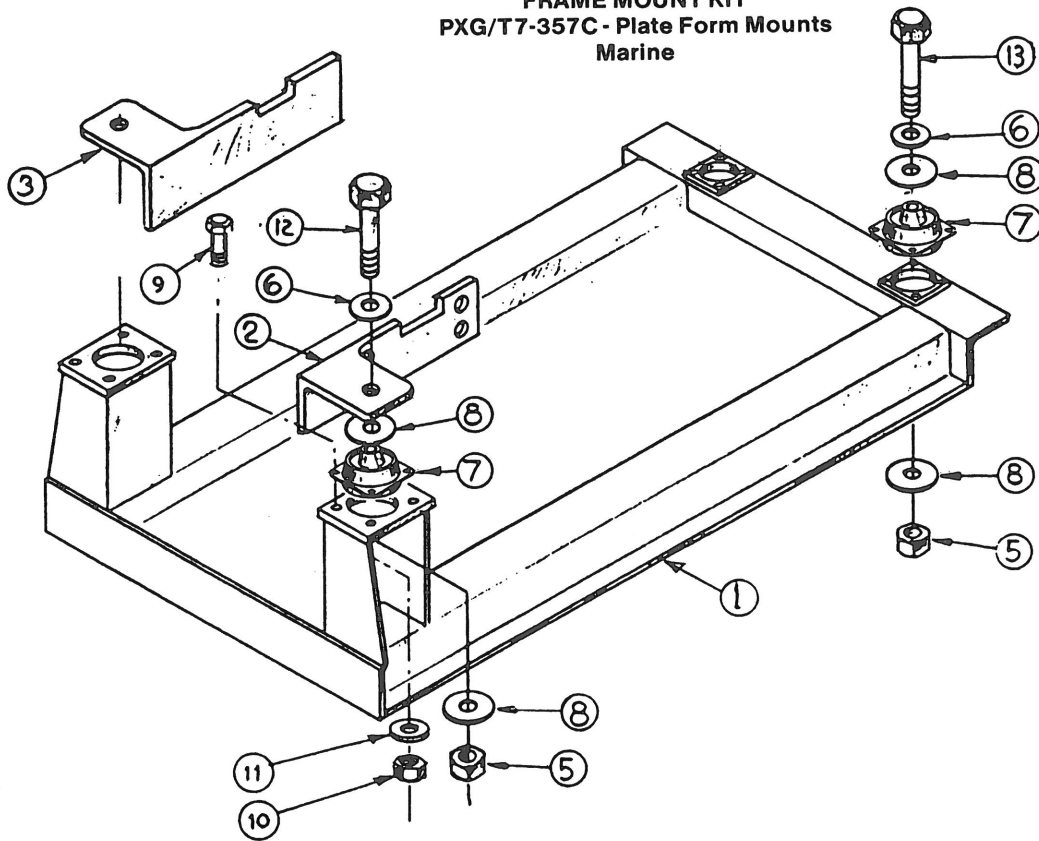
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-42232	1	Water temperature sender	- xxxx - 1761
..	22-40087	1	Water temperature sender	xxxx - 1762 — 2808
..	22-40176	1	Water temperature sender	xxxx - 2809 —
2	22-42237	1	Voltage regulator	- xxxx - 3559
3	23-44239	1	Voltage regulator bracket	- xxxx - 3559
4	22-42235	1	Plastic connector	- xxxx - 3559
5	22-41907	1	Plastic connector	-
6	00-42000	8	Spade terminals	-
7	22-41680	1	Relay (push-in style, early)	- xxxx - 1418
8	22-41032	1	Relay socket (push-in style)	-
..	22-40077	1	Relay	xxxx - 1419 —
9	22-42805	1	Oil pressure switch	- xxxx - 1761
10	21-42230	1	Black pipe tee 1/8" npt	-
11	21-52201	1	Black pipe nipple 1/8" npt x 1 1/2"	-
12	22-40919	1	Oil pressure orifice	-
13	22-43101	1	Wire harness (marine)	- xxxx - 2808
..	22-42008	1	Wire harness (industrial)	- xxxx - 2808
..	22-42044	1	Wire harness (L - M - NL)	xxxx - 2809 —
14	12-00015	1	Cap screw #10 - 32 x 3/8"	xxxx - 2808
15	12-00111	2	Cap screw 1/4" x 3/4"	- xxxx - 3559
16	12-01401	2	Cap screw 14mm x 20mm	- xxxx - 3559
17	14-00111	2	Nut 1/4"	- xxxx - 3559
18	15-00033	1	Lock washer #10	-
19	15-00102	2	Lock washer 1/4"	- xxxx - 3559
20	15-00914	2	Lock washer 14mm	- xxxx - 3559
21	19-92200	1	Adelle clamp	-
22	22-42225	1	Water temperature switch 95°C (marine only)	-
..	385720030	1	Water temperature switch 110°C (industrial)	-
23	22-40086	1	Oil pressure sender	xxxx-1762—2808
..	22-40177	1	Oil pressure sender	xxxx - 2809 —
24	22-40928	1	Wire harness extension	-
25	21-00010	1	Bushing 3/8" npt x 1/4" npt	-
26	22-40078	1	Pull solenoid	-
27	22-42043	2	Circuit breaker, 10 amp	-
28	28-42001	1	Mounting plate, terminal board	-
29	22-42045	1	Terminal board	-
30	22-42046	4	Relay base	-
31	22-42047	4	Relay 12V DC	-

GASKET SETS
NL 854 B

GASKET SET – Industrial				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	165996032	1	Front plate	-
2	110996421	1	Bearing cover	-
3	110996450	1	Oil pan	-
4	140996040	1	Suction filter holder	-
5	111146733	1	Head gasket, thickness = 1.5mm	-
..	111146783	1	Head gasket, thickness = 1.7mm	-
6	120406040	8	Valve guide seal	-
7	111996230	1	Head cover	-
8	110996460	1	Breather	-
9	145996210	1	Thermostat case	-
10	145996030	1	Thermostat cover	-
11	135996270	4	Inlet manifold	-
12	135996280	4	Exhaust manifold	-
13	314990012	1	Muffler	-
14	165996290	1	Gear case	-
15	120996010	1	Tachometer plug	-
16	198996020	2	Tachometer plug	-
17	165996370	1	Adjust cover	-
18	165996050	2	Pump cover	-
19	140996090	1	Oil filter holder	-
20	110996150	1	Cylinder block	-
21	131996011	1	Injection pump	-
22	131426010	4	Injector	-
..	131426160	8	Injector	-
23	145996180	1	Water pump case	-
24	145996190	1	Water pump set plate	-
25	025100008	1	Gauge holder seal washer	-
26	198996070	4	Head cover seal washer	-
27	198636040	1	Front oil seal	-
28	198636110	1	Rear oil seal	-
29	052109039	8	Cylinder liner o-ring	-
30	052100180	1	Suction filter holder o-ring	-
31	052100400	2	Oil filter cap o-ring	-
32	052301250	1	Injection pump o-ring	-
33	052100100	1	Injection pump o-ring	-
34	199316021	1	Flywheel lock washer	-
35	199316021	1	Lock washer	-
36	195906510	1	Gasket kit, complete industrial	-

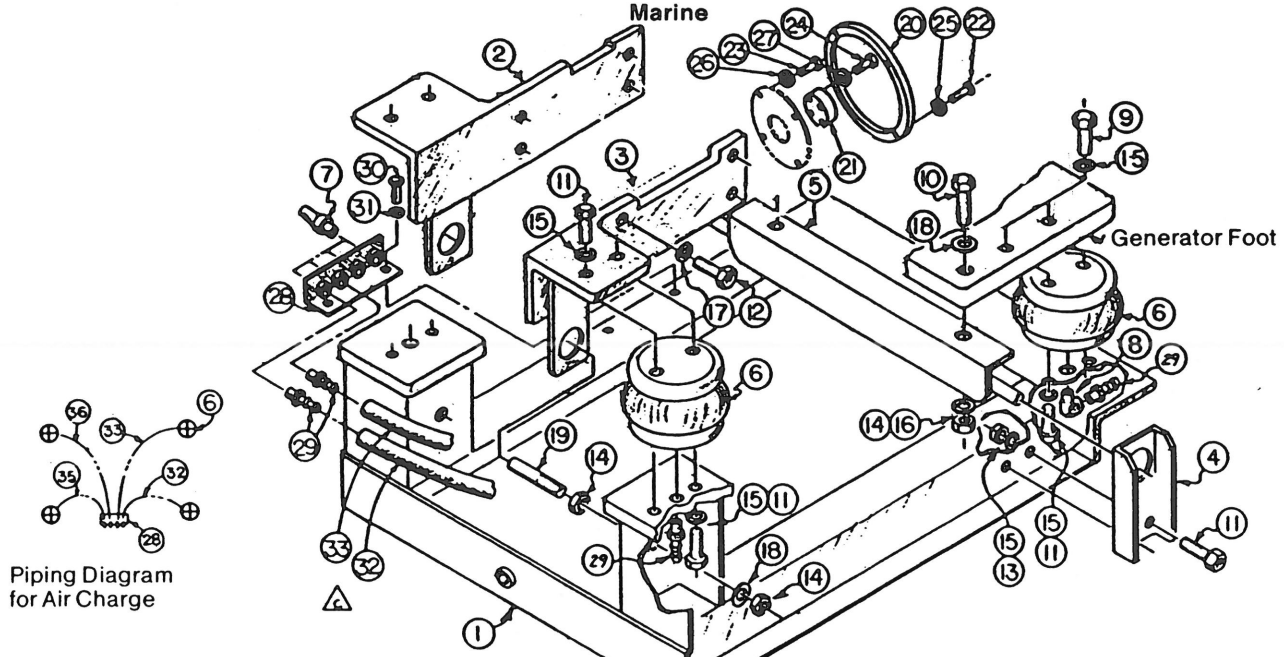
GASKET SET — Marine				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	165996032	1	Front plate	-
2	110996421	1	Bearing cover	-
3	110996450	1	Oil pan	-
4	140996040	1	Suction filter holder	-
5	111146733	1	Head gasket, thickness = 1.5mm	-
..	111146783	1	Head gasket, thickness = 1.7mm	-
6	120406040	8	Valve guide seat	-
7	111996230	1	Head cover	-
8	110996460	1	Breather	-
9	135996300	1	Thermostat housing	-
10	135996270	4	Inlet manifold	-
11	135996280	4	Exhaust manifold	-
12	314990030	1	Elbow	-
13	165996290	1	Gear case	-
14	120996010	1	Tachometer plug	-
15	198996020	2	Tachometer plug	-
16	165996370	1	Adjust cover	-
17	165996050	2	Pump cover	-
18	140996090	1	Oil filter holder	-
19	110996150	1	Cylinder block	-
20	131996011	1	Injection pump	-
21	131426010	4	Injector	-
..	131426160	8	Injector	-
22	145996180	1	Water pump case	-
23	145996190	1	Water pump set plate	-
24	340990010	1	Seawater pump	-
25	052100008	1	Gauge holder seal washer	-
26	198996070	4	Head cover seal washer	-
27	198636040	1	Front oil seal	-
28	198636010	1	Rear oil seal	-
29	052109039	8	Cylinder liner o-ring	-
30	052100180	1	Suction filter holder o-ring	-
31	052100400	1	Oil filter cap o-ring	-
32	052301250	1	Injection pump o-ring	-
33	052100100	1	Injection pump o-ring	-
34	199316021	1	Lock washer	-
35	195906520	1	Gasket kit, complete marine	-

FRAME MOUNT KIT
PXG/T7-357C - Plate Form Mounts
Marine



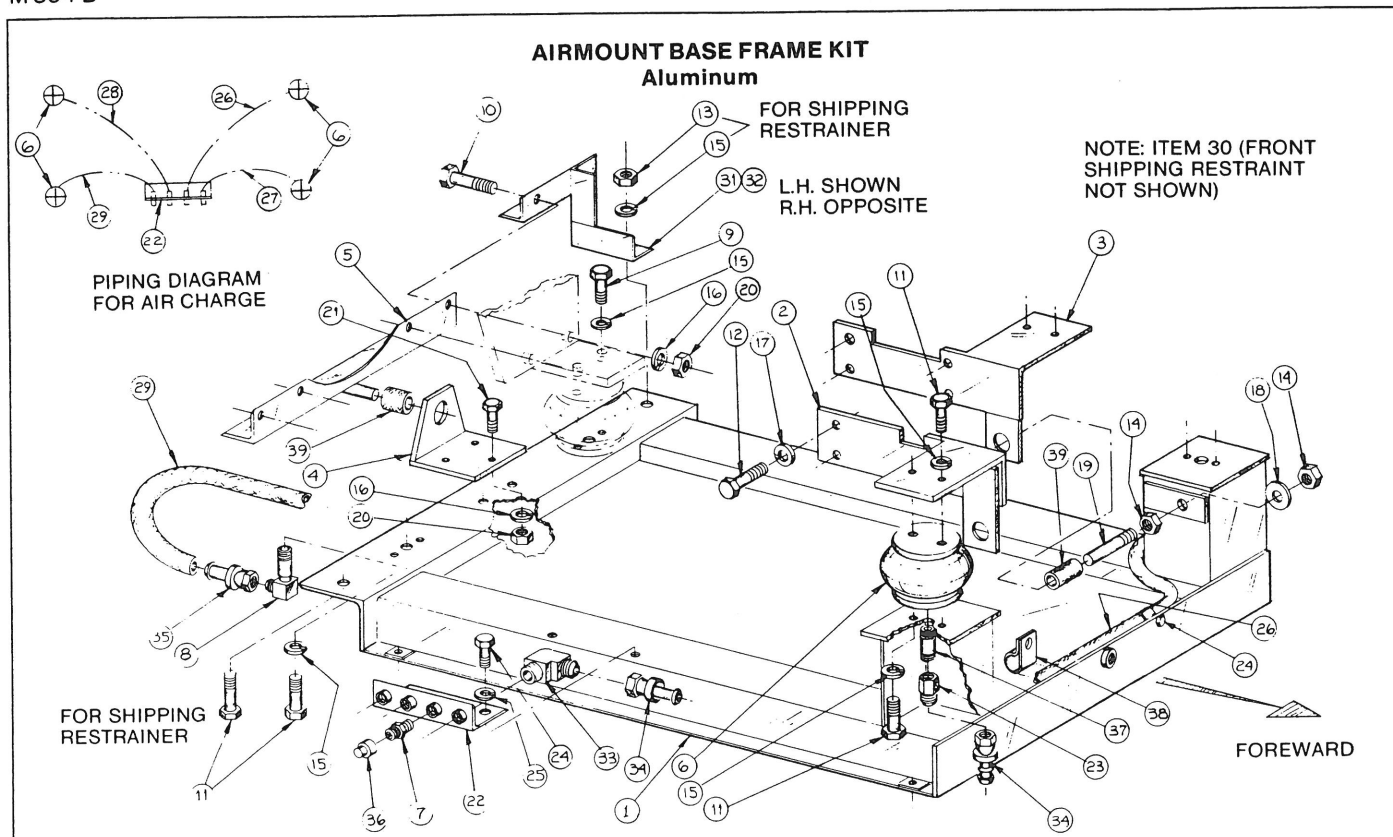
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-82215	1	Base frame	-
2	23-82254	1	Mounting foot, left	-
3	23-82255	1	Mounting foot, right	-
5	14-00412	4	Nut hx. 1/2" nylock	-
6	15-00501	4	Flat washer 1/2"	-
7	33-83106	4	Shock mount	-
8	15-00020	8	Snubbing washer	-
9	12-00212	16	Cap screw hx. hd. 5/16-18 x 1"	-
10	14-00213	16	Nut, hx. 5/16-18	-
11	15-70000	16	Lock washer 5/16"	-
12	12-00500	2	Cap screw hx. hd. 1/2-13 x 4" (front)	-
13	12-01510	2	Cap screw hx. hd. 1/2-13 x 4 1/2" (back)	-

AIRMOUNT FRAME KIT
L 360, L 361 - Lima Generator



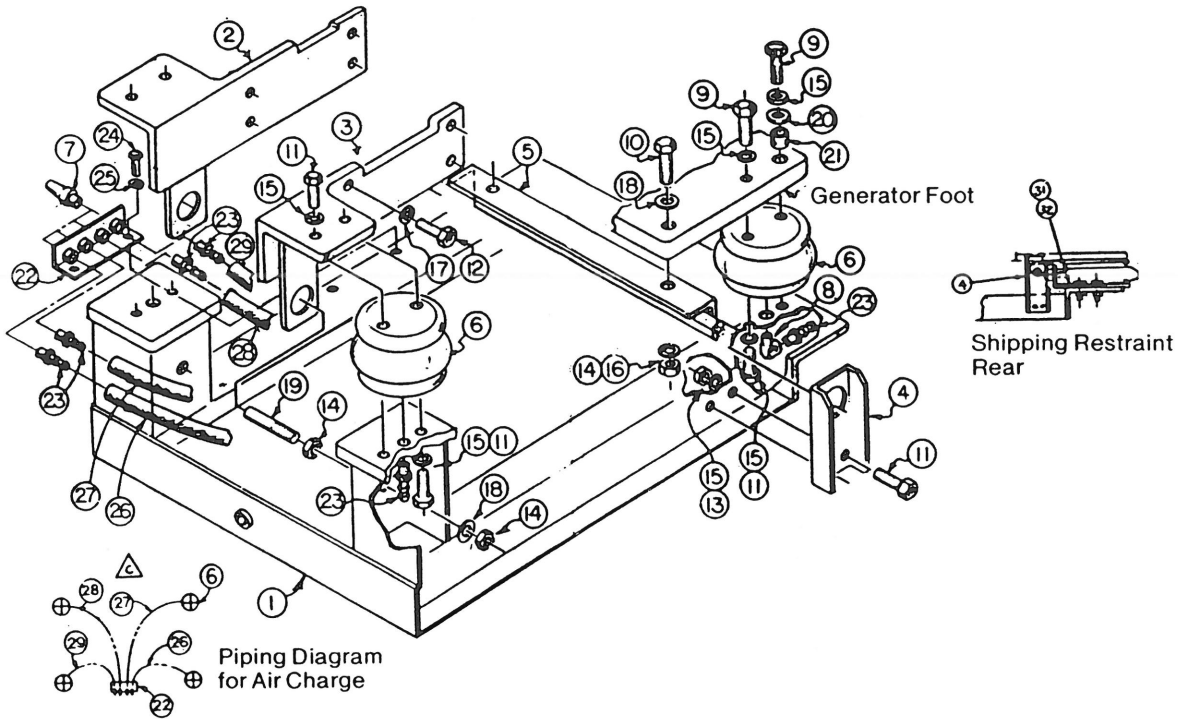
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-82206	1	Base frame	-
2	23-82206	1	Right mounting foot	-
3	23-82207	1	Left mounting foot	-
4	23-83104	2	Rear restrainer eye	-
5	23-82208	1	Restrainer bar	-
6	33-82002	4	Airmount	-
7	21-80001	4	Air fill valve 1/4" npt	-
8	21-72202	2	Elbow 90° street 1/4" npt	-
9	12-00312	4	Cap screw hx. hd. 3/8-16 x 1"	-
10	12-00514	2	Cap screw hx. hd. 1/2-13 x 1 1/2"	-
11	12-00311	16	Cap screw hx. hd. 3/8-16 x 3/4"	-
12	12-00953	8	Cap screw hx. hd. 12 x 30mm	-
13	14-00311	4	Hx. nut 3/8-16"	-
14	14-00511	6	Hx. nut 1/2-13"	-
15	15-00302	20	Lock washer 3/8"	-
16	15-00502	2	Lock washer 1/2"	-
17	15-09012	8	Lock washer 12mm	-
18	15-00501	4	Flat washer 1/2"	-
19	23-82000	2	Restrainer pin 1/2-13 x 3"	-
20	31-50011	1	Adapter SAE 3 to 5 C-106	-
21	34-60005	1	Hub spacer	-
22	12-00313	8	Cap screw hx. hd. 3/8-16 x 1 1/4"	-
23	12-00211	6	Cap screw hx. hd. 5/16-18 x 3/4"	-
24	12-00414	6	Cap screw hx. hd. 7/16-4 x 1 1/2"	-
25	15-00302	8	Lock washer 5/8"	-
26	15-00202	6	Lock washer 5/16"	-
27	15-00402	6	Lock washer 7/16"	-
28	10-80000	1	Air charge manifold	-
29	21-51044	6	Male connector 1/4" npt x 1/4" hb	-
30	12-00111	2	Cap screw hx. hd. 1/4-20 x 3/4"	-
31	15-00102	2	Lock washer 1/4"	-
32	18-91600	1	Hose 1/4" ID x 32" left front	-
33	18-51001	1	Hose 1/4" ID x 36" right front	-
34	23-71006	1	Shipping restraint	-
35	18-52207	1	Hose 1/4" ID x 24" right rear	-
36	18-73700	1	Hose 1/4" ID x 27" left rear	-
37	23-82211	1	Shipping restraint bracket left rear	-
38	23-82212	1	Shipping restraint bracket right rear	-
39	21-80002	2	Female swivel fitting 1/4" tube x 1/4" hb steel	-

BASE FRAME AND MOUNTING
M854 B



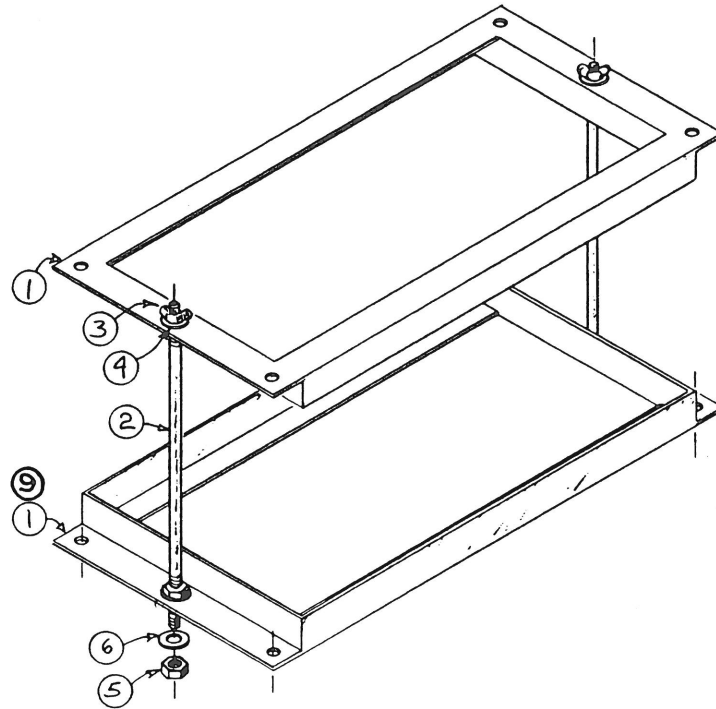
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-82219	1	Base frame	-
2	23-82206	1	Right mounting foot	-
3	23-82207	1	Left mounting foot	-
4	23-82216	2	Rear restrainer eye	-
5	23-82215	1	Restrainer bar	-
6	33-82002	4	Airmount	-
7	21-80001	2	Air fill valve 1/4" npt	-
8	21-74402	2	Elbow 90° street 1/4" npt	-
9	12-00312	4	Cap screw hx. hd. 3/8-16 x 1"	-
10	12-00214	4	Cap screw hx. hd. 5/16-18 x 1 1/2"	-
11	12-00311	14	Cap screw hx. hd. 3/8-16 x 3/4"	-
12	12-00953	8	Cap screw hx. hd. M12-1.75 x 30mm	-
13	14-00311	2	Hx. nut 3/8-16"	-
14	14-00511	4	Hx. nut 1/2-13"	-
15	15-00302	18	Lock washer 3/8"	-
16	15-70000	4	Lock washer 5/16"	-
17	15-09012	3	Lock washer 12mm	-
18	15-00501	2	Flat washer 1/2"	-
19	23-82000	2	Restrainer pin 1/2-13 x 3"	-
20	14-00213	7	Hex nut, 5/16-18"	-
21	12-00209	3	Cap screw hx. hd. 5/16-18 x 3/4"	-
22	10-80000	1	Manifold, air charger	-
23	21-61020	2	Female connector 1/4 npt x 1/4-37T	-
24	12-00111	4	Cap screw hx. hd. 1/4-20 x 3/4"	-
25	15-00102	2	Lock washer 1/4"	-
26	18-51001	1	Hose 1/4 ID x 36" (R.F.)	-
27	18-91600	1	Hose 1/4 ID x 32" (L.F.)	-
28	18-73700	1	Hose 1/4 ID x 27" (L.R.)	-
29	18-52207	1	Hose 1/4 ID x 24" (R.R.)	-
30	23-71006	1	Front restraining bar (shipping)	-
31	23-82218	1	Bracket, shipping restraint (rear R.R.)	-
32	23-82217	1	Bracket, shipping restraint (L.R.)	-
33	21-71044	4	Elbow 90° 1/4 npt x 1/4-45T	-
34	21-71045	8	Swivel, 1/4 HB x 1/4-45FSW	-
35	21-80002	2	Fitting, female swivel 1/4-37T x 1/4HB STL	-
36	21-80003	4	Air valve cap, metal	-
37	21-00201	2	Nipple close, 1/4 npt x 1 1/8"	-
38	19-43201	2	Adelle clamp	-
39	MOA	3	Hose, 1/2 ID x 2"	-

AIRMOUNT FRAME KIT
PXG - 301/L 280/T7-357C
Marine



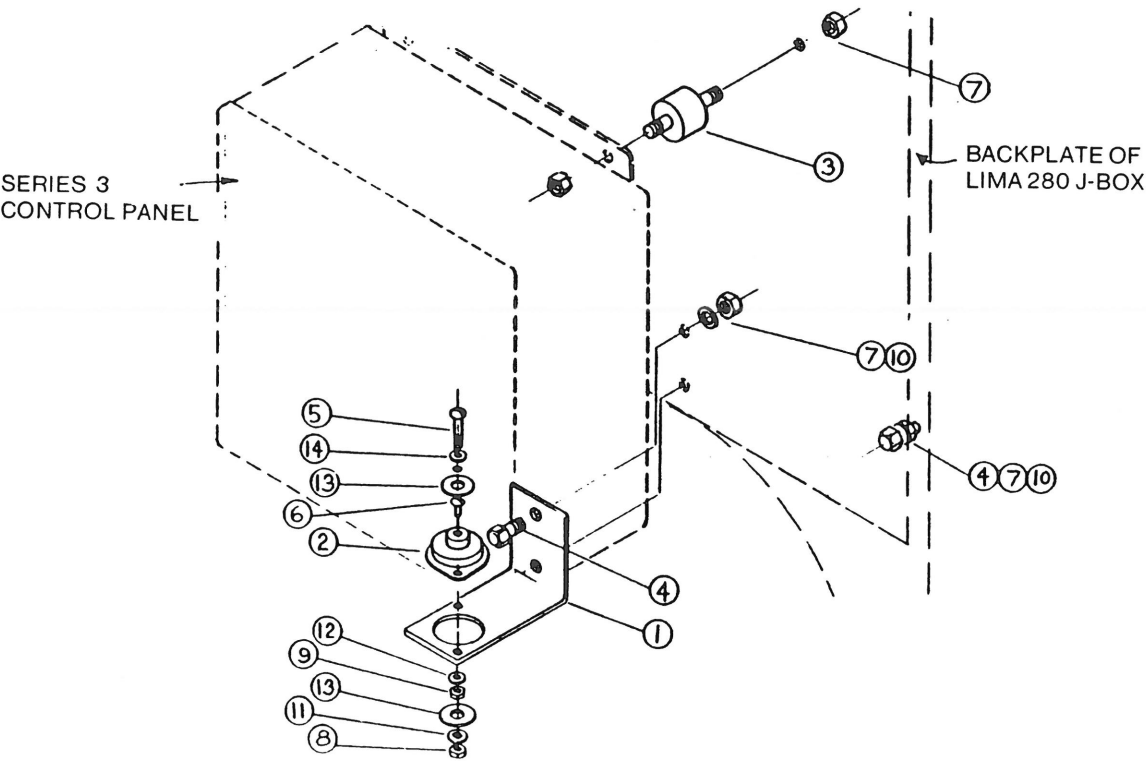
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-82205	1	Base frame	-
2	23-82206	1	Right mounting foot	-
3	23-82207	1	Left mounting foot	-
4	23-83104	2	Rear restrainer eye	-
5	23-81010	1	Restrainer bar	-
6	33-82002	4	Airmount	-
7	21-80001	4	Air fill valve 1/4" npt	-
8	21-74403	2	Elbow 90° 1/4" npt x 1/4" tube	-
9	12-00313	4	Cap screw hx. hd. 3/8-16 x 1 1/4"	-
10	12-00514	2	Cap screw hx. hd. 1/2-13 x 1 1/2"	-
11	12-00311	16	Cap screw hx. hd. 3/8-16 x 3/4"	-
12	12-00953	8	Cap screw hx. hd. 12mm x 30mm	-
13	14-00311	4	Hx. nut 3/8-16"	-
14	14-00511	6	Hx. nut 1/2-13"	-
15	15-00302	20	Lock washer 3/8"	-
16	15-00502	2	Lock washer 1/2"	-
17	15-09012	8	Lock washer 12mm	-
18	15-00502	4	Flat washer 1/2"	-
19	23-82000	2	Restrainer pin 1/2-13 x 3"	-
20	15-00301	2	Flat washer 3/8"	-
21	21-00017	2	Spacer 3/8" sch. 80 x 5/8" lg	-
22	10-80000	1	Air charger manifold	-
23	21-52208	2	Male connector 1/4" npt x 1/4" tube	-
24	12-00111	2	Cap screw hx. hd. 1/4-20 x 3/4"	-
25	15-00102	2	Lock washer 1/4"	-
26	18-51001	1	Hose 1/4 ID x 36" right front	-
27	18-91600	1	Hose 1/4 ID x 32" left front	-
28	18-73700	1	Hose 1/4" ID x 27" left rear	-
29	18-52207	1	Hose 1/4 ID x 24" right rear	-
30	23-71006	1	Front restraining bar (shipping)	-
31	23-82211	1	Shipping restrainer bracket left rear	-
32	23-82212	1	Shipping restraining bracket right rear	-
33	21-71044	4	Elbow 90° 1/4" npt x 1/4" tube	-
34	21-71045	6	Fembal swivel 1/4" hb x 1/4"	-
35	21-80002	2	Female swivel fitting 1/4" tube x 1 1/4" hb, steel	-

BATTERY RACK ASSEMBLY
Industrial



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	00-41034	2	Hold down base frame	-
2	13-70000	2	Tie down rod 1/4" - 20 x 10"	-
3	14-21618	2	Wing nut 1/4" - 20	-
4	15-00111	2	Flat washer 1/4"	-
5	14-00111	4	Nut 1/4" - 20	-
6	15-00102	4	Lock washer 1/4"	-
7	00-71014	1	Cable, positive, 48"	-
8	00-71013	1	Cable, negative, 48"	-
9	00-40005	1	Board, GP27 battery base	-

**CONTROL PANEL MOUNT
Series 3**



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	23-92010	1	Control panel support bracket	-
2	33-83102	1	Plate form mount	-
3	33-83101	2	Sandwich mount	-
4	12-00100	8	Cap screw hx. hd. 1/4" x 1/2"	-
5	12-00009	1	Machine screw #8 - 32 x 1/4"	-
6	12-00012	2	Machine screw #6 - 32 x 1/2"	-
7	14-00111	12	Nut hx hd. 1/4"	-
8	14-00000	1	Nut hx. hd. #8 - 32	-
9	14-00002	2	Nut hx. hd. #6 - 32	-
10	15-00102	8	Lock washer 1/4"	-
11	15-00000	1	Lock washer #8	-
12	15-00009	3	Lock washer #6	-
13	15-00017	2	Snubbing washer	-
14	15-00001	1	Flat washer #8	-

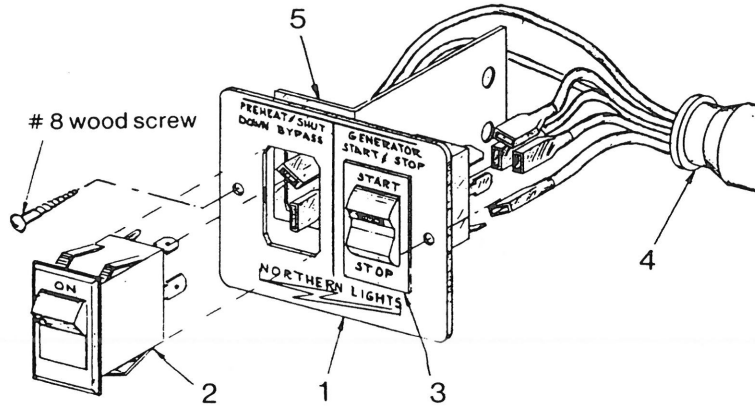
ACCESSORIES AND OPTIONAL EQUIPMENT
M - NL 854 B

BELT GUARD KIT				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	00-72200	1	Belt guard	-
2	13-72202	2	Threaded rod, 8mm x 1.25 mm x 6½", length	-
3	13-72200	1	Threaded rod, 8mm x 1.25mm x 3½", length	-
4	14-00711	9	Nut, 8mm x 1.25mm	-
5	15-00702	6	Lock washer, 8mm	-
6	15-00701	9	Flat washer, 8mm	-
7	00-02001	1	Alternator guard (not shown)	-

M - NL 854 B

SERIES 1-B CONTROL PANEL				
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-90007	1	Switch, preheat/shutdown-bypass	-
2	22-90008	1	Switch, engine control	-
3	28-90003	1	Face plate, Series 1-B	-
4	22-90009	1	Hour meter	-
5	22-40019	1	Wire harness	-
..	22-90006	1	Control panel, complete, Series 1-B	-

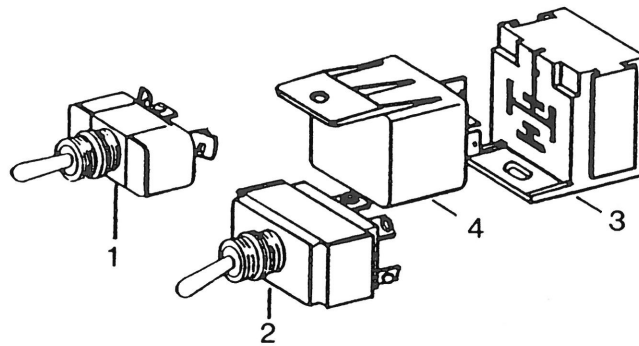
**SERIES 1 CONTROL PANEL
Recent Style**



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	00-40013	1	Series 1 control panel plate	-
2	22-90007	1	Switch, preheat/shutdown-bypass	-
3	22-90008	1	Engine control switch	-
4	22-90009	1	Wire harness	-
5	23-70009	1	Strain relief bracket	-
...	22-90005	1	Series 1 control panel, complete	-

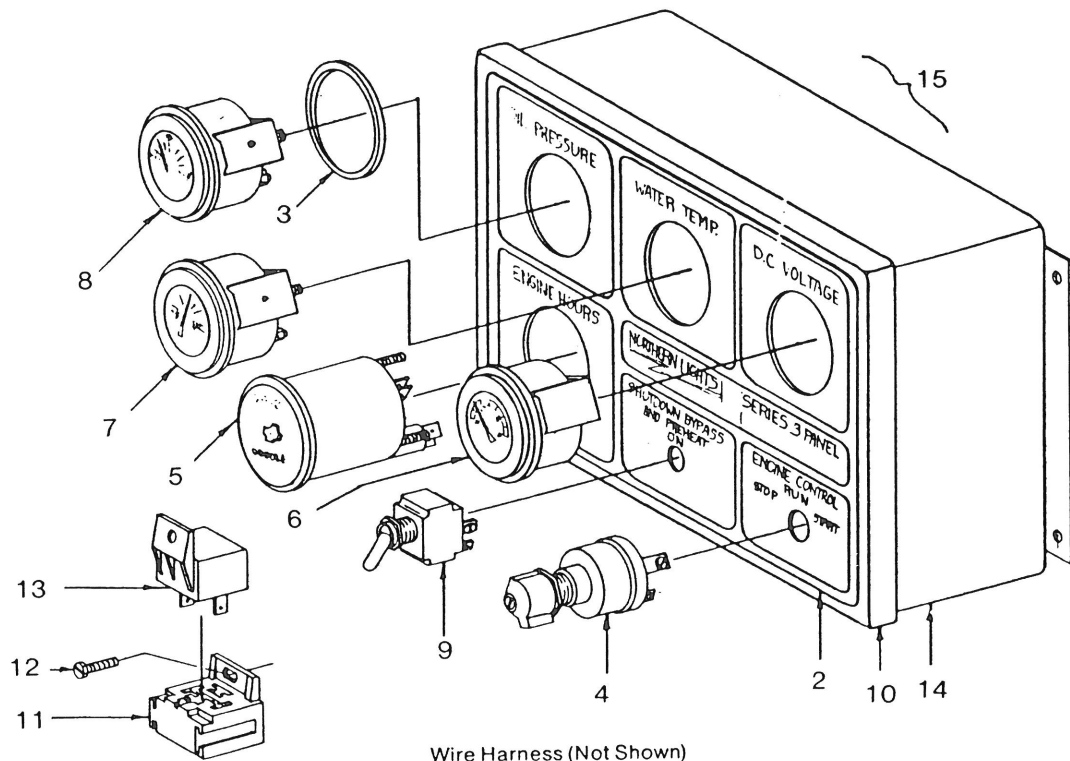
M - NL 854 B

**SERIES 1 CONTROL PANEL
Early Style**



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-41052	1	Engine control switch	-
2	22-41045	1	Shutdown-bypass switch	-
3	22-41032	1	Relay socket	-
4	22-41680	1	Relay	-
5	22-42002	1	Wire harness (not shown)	-

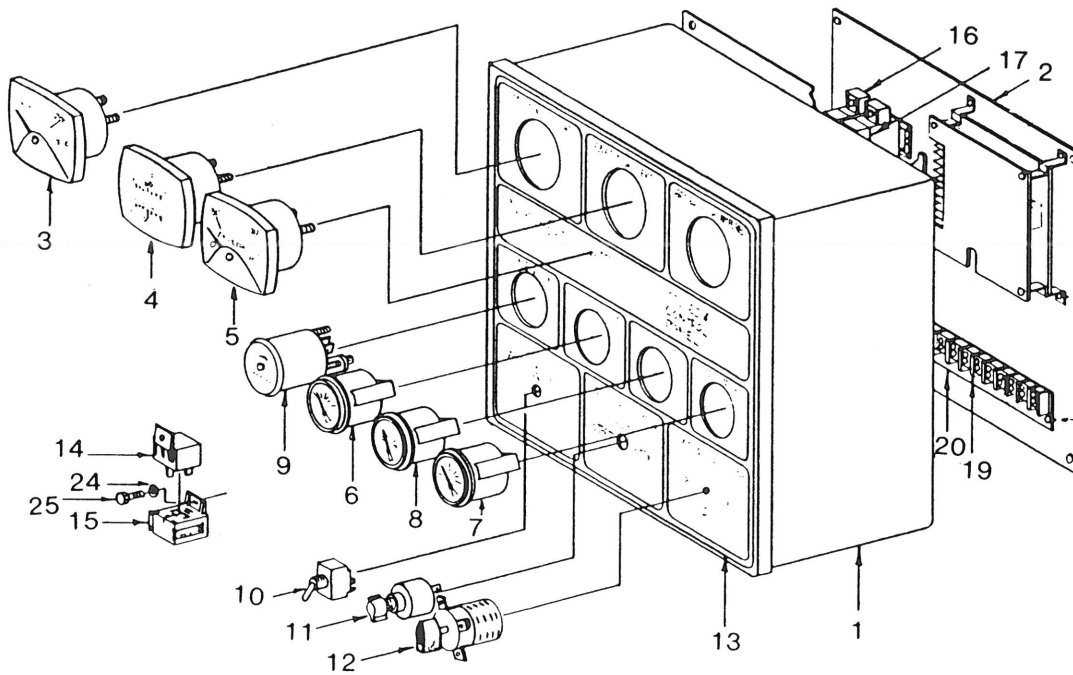
SERIES 3 CONTROL PANEL
Marine and Industrial



Wire Harness (Not Shown)

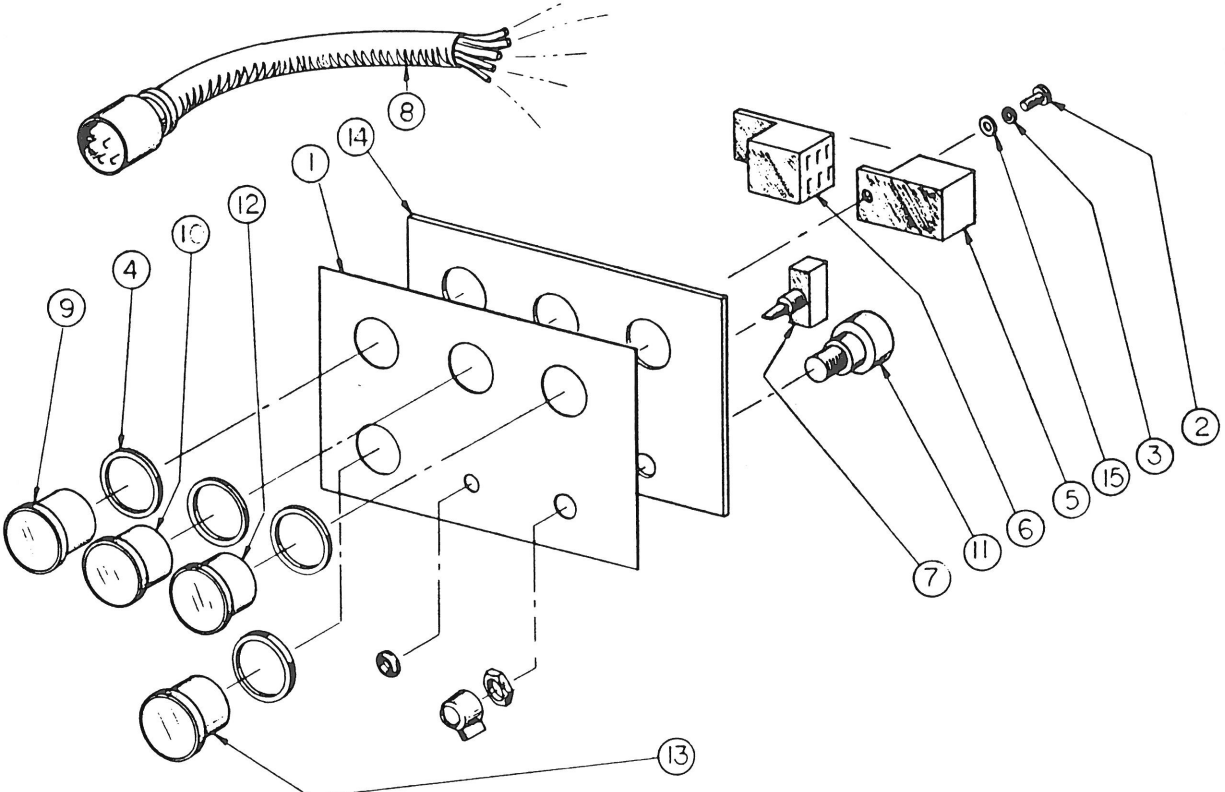
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	22-42055	1	Wire harness (not shown)	-
2	00-91018	1	Decal	-
3	16-01001	4	O-ring	-
4	37-91005	1	Engine control switch	-xxxx-1761
..	22-40089	1	Engine control switch	xxxx-1762-2808
..	22-41051	1	Engine control switch, toggle	xxxx-2809-
5	37-91059	1	Engine hour meter, VDO	-xxxx-1761
..	37-40005	1	Engine hour meter, FD	xxx-1762-2808
..	37-90007	1	Engine hour meter, Yazaki	xxxx-2809-
6	37-91058	1	DC voltage meter, VDO	-xxxx-1761
..	37-40004	1	DC voltage meter, FD	xxxx-1762-2808
..	37-90005	1	DC voltage meter, Yazaki	xxxx-2809-
7	37-91052	1	Water temperature gauge, VDO	xxxx-1761-
..	37-40003	1	Water temperature gauge, FD	xxx-1762-2808
..	37-90008	1	Water temperature gauge, Yazaki	xxxx-2809-
8	37-91051	1	Oil pressure gauge, VDO	-xxxx-1761
..	37-40002	1	Oil pressure gauge, FD	xxxx-1762-2808
..	37-90006	1	Oil pressure gauge, Yazaki	xxxx-2809-
9	22-41045	1	Shutdown-bypass switch	-
10	28-90001	1	Face plate (flush panel)	-
11	22-41032	1	Relay base	-
12	12-00006	1	Screw	-
13	22-41680	1	Relay	-xxxx-1761
..	22-40088	1	Relay	xxxx-1762-
14	39-41000	1	Enclosure 10" x 8" x 4"	-
15	22-92000	1	Standard control panel, complete, VDO gauges	-xxxx-1761
..	22-92019	1	Standard control panel, complete, FD gauges	xxxx-1762-2808
..	22-90040	1	Standard control panel, complete, Yazaki gauges	xxx-2809-
..	22-92011	1	Flush mount control panel, complete, VDO gauges	-xxxx-1761
..	22-90041	1	Flush mount control panel, complete, Yazaki gauges	xxx-2809-
..	22-91049	1	Dual station control panel, complete, VDO gauges	-xxxx-1761

SERIES 4 CONTROL PANEL
Marine and Industrial



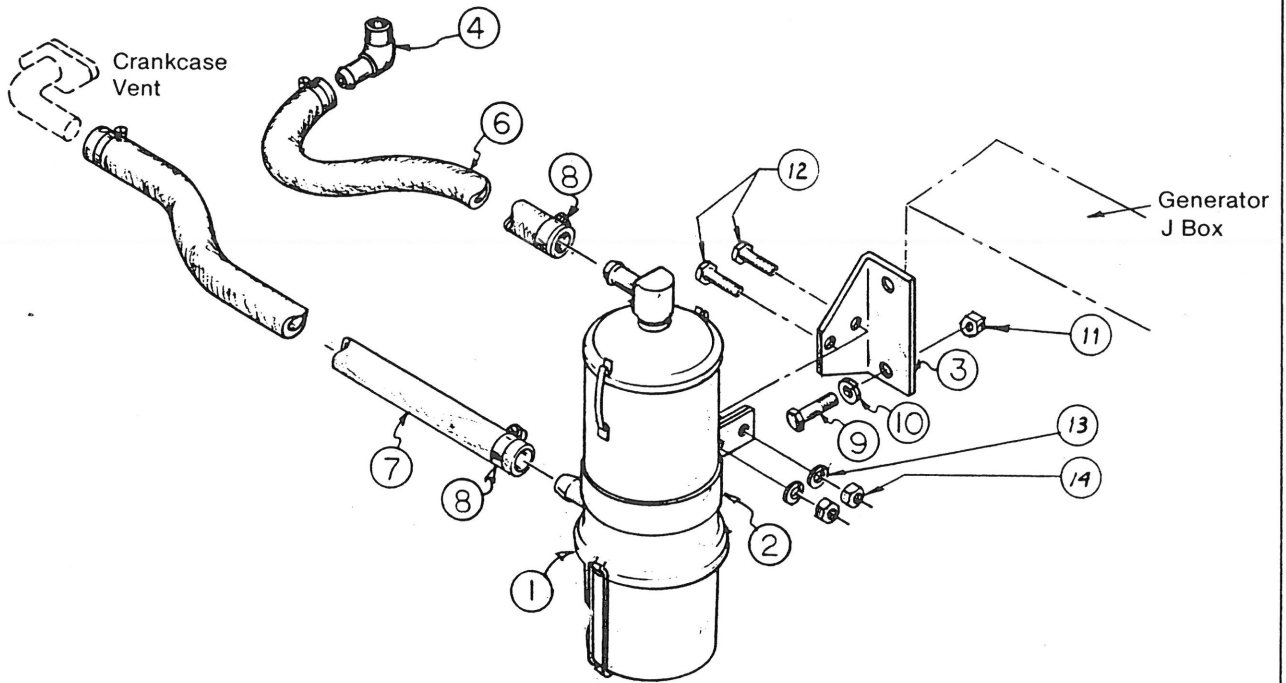
KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	39-41006	1	Enclosure 16" x 14" x 8"	-
2	39-41001	1	Enclosure plate	-
3	s7-91020	1	AC voltmeter	-
4	37-91022	1	Frequency meter	-
5	37-91010	1	AC ammeter	-
6	37-91051	1	Oil pressure gauge, VDO	-
..	37-40002	1	Oil pressure gauge, FD	-
..	37-90006	1	Oil pressure gauge, Yazaki	-
7	37-91052	1	Water temperature gauge, VDO	-
..	37-40003	1	Water temperature gauge, FD	-
..	37-90008	1	Water temperature gauge, Yazaki	-
8	37-91058	1	DC voltmeter, VDO	-
..	37-40004	1	DC voltmeter, FD	-
..	37-90005	1	DC voltmeter, Yazaki	-
9	37-91059	1	Engine hour meter, VDO	-
..	37-40005	1	Engine hour meter, FD	-
..	37-90007	1	Engine hour meter, Yazaki	-
10	22-41045	1	Shutdown-bypass switch	-
11	37-91055	1	Engine control switch, single station, rotary (L - M - NL)	-
..	22-41051	1	Engine control switch, dual station, toggle (L - M - NL)	-
12	22-41035	1	Ammeter switch	-
13	00-91015	1	Decal, Series 4 control panel	-
14	22-41680	1	Relay	-
15	22-41032	1	Relay socket	-
16	22-41036	1	Fuse holder assembly	-
17	22-41061	2	Fuses, 1 amp for generator instruments and regulator	-
19	22-41069	1	22 connector terminal board	-
20	22-41040	1	Number strip	-
21	12-00006	4	Screw 8-32 x 1/2"	-
22	15-00000	8	Lock washer #8	-
23	12-00005	2	Screw 8-32 x 3/4"	-
24	15-00032	1	Flat washer #10	-

FLUSH MOUNT SERIES 3 PANEL KIT



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	00-91018	1	Label, Series 3 panel	-
2	12-00006	1	Machine screw #8-32 x 1/2" bevel head	-
3	15-00000	1	Lock washer #8	-
4	16-01001	4	O-ring 1 3/4" ID square cut	-
5	22-41032	1	Relay socket	- xxxx - 2808
6	22-41680	1	Relay	- xxxx - 2808
7	22-41045	1	Toggle switch	-
8	22-42005	1	Wire harness, Series 3 control panel	-
9	37-91051	1	Oil pressure gauge, VDO	-
..	37-40002	1	Oil pressure gauge, FD	-
..	37-90006	1	Oil pressure gauge, Yazaki	-
10	37-91052	1	Water temperature gauge, VDO	-
..	37-40003	1	Water temperature gauge, FD	-
..	37-90008	1	Water temperature gauge, Yazaki	-
11	37-91055	1	Engine control switch, rotary	- xxxx - 2808
..	22-40089	1	Engine control switch, rotary	-
..	22-41051	1	Engine control switch, dual station, toggle (L - M - NL)	-
12	37-91058	1	Voltmeter, 12 VDC, VDO	-
..	37-40004	1	Volt meter, 12 VDC, FD	-
..	37-90005	1	Voltmeter, 12 VDC, Yazaki	-
13	37-91059	1	Hour meter, VDO	-
..	37-40005	1	Hour meter, FD	-
..	37-90007	1	Hour meter, Yazaki	-
14	28-90001	1	Series 3 flush panel plate	-
15	15-00001	1	Flat washer #8	-
16	22-92011	1	Control panel, complete, VDO gauges	-
..	22-92022	1	Control panel, complete, FD gauges	-
..	22-90041	1	Control panel, complete, Yazaki gauges	-

CRANKCASE VENT FILTER KIT
Marine



KEY	PART NUMBER	QTY.	DESCRIPTION	SERIAL NUMBER
1	24-71003	1	Crankcase vent filter assembly	-
2	24-71004	1	Band filter bracket	-
3	23-02201	1	Filter mounting bracket	-
4	21-12054	1	Elbow 1/2" npt x 3/8" hose barb	-
6	18-00005	1	Hose 3/8" ID x 24"	-
7	18-02200	1	Hose 3/8" ID x 29"	-
8	19-00008	4	Hose clamp #8	-
9	12-00311	2	Cap screw hx. hd. 3/8-16 x 3/4"	-
10	15-00302	2	Lock washer 3/8"	-
11	14-00311	1	Hx. nut 3/8-16	-
12	12-00111	2	Cap screw hx. hd. 1/4-20 x 3/4"	-
13	15-00102	2	Lock washer 1/4"	-
14	14-00111	2	Hx. nut 1/4-20	-

NOTES